

University of Tennessee, Chattanooga

2025-2026 Undergraduate Catalog

Course Descriptions

[Contract All Courses](#) |

Courses certified as satisfying General Education Requirements are identified in the course title with a two letter category abbreviation. General Education categories are listed below.

[Writing and Communication \(WC\)](#) [Humanities and Fine Arts \(HF\)](#) [Natural Science \(LL, LC & LB, NL\)](#)

[Behavioral and Social Science \(SB\)](#) [Quantitative Reasoning \(QR\)](#) [Individual and Global Citizenship \(CZ\)](#)

Chemistry

CHEM 3720 - Physical Chemistry: Quantum Mechanics and Spectroscopy

(3) Credit Hours

Examines quantum mechanics and spectroscopy with applications to physical and chemical properties of matter. Lecture 3 hours. Prerequisites: [CHEM 3020](#) and [CHEM 3020L](#) with a minimum grade of C, or Department Head approval; [CHEM 3210](#) and [CHEM 3210L](#) with minimum grades of C; [MATH 1960](#) with a minimum grade of C; [PHYS 1040](#) and [PHYS 1040L](#) with minimum grades of C or [PHYS 2310](#) and [PHYS 2310L](#) with minimum grades of C; or Department Head approval. Pre or Corequisites: [CHEM 3720L](#) with a minimum grade of C or Department Head approval.

CHEM 3720L - Physical Chemistry: Quantum Mechanics and Spectroscopy Laboratory

(1) Credit Hours

Laboratory experience to support and enhance topics covered in CHEM 3720. Laboratory 3 hours. Prerequisites: [CHEM 3210](#) and [CHEM 3210L](#) with minimum grades of C; [CHEM 3020](#) and [CHEM 3020L](#) with minimum grades of C; [MATH 1960](#) with a minimum grade of C; [PHYS 1040](#) and [PHYS 1040L](#) with minimum grades of C or [PHYS 2310](#)

and [PHYS 2310L](#)

with minimum grades of C; or Department Head approval. Pre or Corequisites: [CHEM 3720](#)

with a minimum grade of C or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 3820 - Chemical Literature

(1) Credit Hours

Surveys the primary, secondary, and tertiary sources of chemical information with weekly individual assignments in the use of these sources. Pre or Corequisites: [ENGL 2820](#)

or [STEM 2020](#)

or Department Head approval.

CHEM 3900R - Internship Experience

(1-6) Credit Hours

An individualized field experience in a chemistry career-relevant setting providing students with the opportunity to apply theory, expand knowledge, determine additional learning needs, explore careers, and develop a public awareness and an appreciation of diversity. Required modules/seminars provide a theoretical basis for learning and integrating the internship. May be repeated to a maximum of 12 hours with approval. Clinical 3 clock hours per credit hour. Prerequisites: Completion of two 3000- or 4000-level courses in Chemistry. Students must also submit a course application with field supervisor, faculty supervisor, and Department Head. Satisfactory/No Credit.

CHEM 3999R - Group Studies

(1-9) Credit Hours

On demand. Prerequisites: Department Head approval. Department may have additional prerequisite requirements.

CHEM 4030 - Advanced Organic Chemistry

(4) Credit Hours

Studies advanced concepts of organic chemistry upon which modern organic chemistry is developed. Kinetics, thermodynamics, multistep synthesis, molecular orbital concepts and orbital symmetry, and molecular structure determination by modern physical methods are emphasized. Lecture 3 hours, laboratory 3 hours. Prerequisites: [CHEM 3020](#)

and [CHEM 3020L](#)

with minimum grades of C or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4040 - Polymer Chemistry

(4) Credit Hours

This course explores the fundamentals of polymer synthesis, characterization, and properties, with a focus on structure-property relationships in polymers and the characteristics of macromolecules that are distinct from small

molecules. Spring semester, every other year in even numbered years. Lecture 3 hours, laboratory 3 hours. Prerequisites: [CHEM 3020](#) and [CHEM 3020L](#) with minimum grades of C or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4220 - Methods of Environmental Analysis

(4) Credit Hours

Focuses on advanced theory and practice of environmental analytical chemistry including sampling techniques and instrumental approaches to separation and analysis of real world samples. Lecture 3 hours, laboratory 3 hours. Prerequisites: [CHEM 3210](#) with a minimum grade of C, [CHEM 3020](#) and [CHEM 3020L](#) with minimum grades of C; [MATH 1830](#) with a minimum grade of C or [MATH 1950](#) with a minimum grade of C; or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4230 - Instrumental Analysis

(4) Credit Hours

Examines the theory and use of infrared and ultraviolet spectroscopy, nuclear magnetic resonance, atomic absorption, gas chromatography, thermal analysis, electrochemical analysis, and other instrumental methods of characterizing chemical structure. Lecture 3 hours, laboratory 3 hours. Prerequisites: [CHEM 3210](#), [CHEM 3020](#) and [CHEM 3020L](#) with minimum grades of C; [PHYS 1040](#) and [PHYS 1040L](#) with minimum grades of C or [PHYS 2310](#) and [PHYS 2310L](#) with minimum grades of C; or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4320 - Advanced Inorganic Chemistry

(4) Credit Hours

Advanced theories of bonding and structure in inorganic chemistry with emphasis on ligand field theory, bioinorganic chemistry, and organometallic chemistry. Spring semester. Lecture 3 hours, laboratory 3 hours. Prerequisites: [CHEM 3310](#) and [CHEM 3710](#) with minimum grades of C, [PHYS 1040](#) and [PHYS 1040L](#) with minimum grades of C or [PHYS 2310](#) and [PHYS 2310L](#) with minimum grades of C; or Department Head approval. Pre or Corequisites: [MATH 2200](#) with a minimum grade of C or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4410 - Organometallic Chemistry of the Transition Metals

(4) Credit Hours

A detailed look at transition metal organometallic chemistry. Emphasis on the interrelationship of structure/bonding and ligand identity with reactivity. Selected applications of organometallic complexes in organic synthesis and industrial catalysis will also be explored. Fall semester. Lecture 3 hours, laboratory 3 hours. Prerequisites: [CHEM 3020](#) and [CHEM 3020L](#) with minimum grades of C; or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4510 - Biochemistry

(3) Credit Hours

Surveys the chemical aspects of protein and enzyme function, bioenergetics, metabolism, photosynthesis, nucleic acid function, and protein biosynthesis. Fall and Spring semesters. Prerequisites: [CHEM 3020](#) with a minimum grade of C or Department Head approval.

CHEM 4530 - Proteins and Nucleic Acids

(4) Credit Hours

Designed for students interested in advanced studies in biochemistry, molecular biology, and related medical sciences. Lectures will extensively cover material such as biochemical reactions, amino acid and peptide metabolism, protein function, nucleic acid base metabolism, nucleic acid function, and enzyme kinetics. The laboratory will be an introduction to modern biochemical techniques. Spring semester. Lecture 3 hours, laboratory 3 hours. Prerequisites: [BIOL 3250](#), [CHEM 3710](#) and [CHEM 4510](#) with minimum grades of C in each course or Department Head approval. Corequisite: CHEM 4530L or Department Head approval. Laboratory/studio course fee will be assessed.

CHEM 4830R - Seminar

(1) Credit Hours

This participation seminar is based on student papers, student presentations, invited speakers, and other activities. Maximum credit 2 hours. Pre or Corequisites: [CHEM 3820](#) and 24 additional credit hours of chemistry or Department Head approval.

CHEM 4995R - Departmental Thesis

(1-3) Credit Hours

A two-semester research or creative project resulting in a thesis under the supervision of a faculty member and with the approval of the Honors College. On demand. Prerequisites: Student must coordinate with Honors College to submit a

Thesis Contract to get registered for this course. Restricted to Sophomore standing or higher. Laboratory/studio course fee will be assessed.

CHEM 4997R - Research

(1-9) Credit Hours

Enables students to conduct independent research. On demand. Prerequisites: Student must coordinate with a specific faculty member to complete the Research contract to get registered for the course. Restricted to Sophomore standing or higher. Laboratory/studio course fee will be assessed.

CHEM 4998R - Individual Studies

(1-9) Credit Hours

Enables students to study selected topics in depth. On demand. Prerequisites: Student must coordinate with a specific faculty member to complete the Individual Studies contract to get registered for the course. Restricted to Sophomore standing or higher.

CHEM 4999R - Group Studies

(1-9) Credit Hours

Department may have additional prerequisite requirements. On demand. Prerequisites: Department Head approval.

Civil Engineering

ENCE 1010 - Introduction to Civil Engineering

(2) Credit Hours

This course is a cross section of topics in contemporary civil engineering disciplines, with emphasis on the tools of engineering problem solving. Students are taught to work in teams and introduced to the design process and to several tools necessary in a civil engineering career. In this course they develop an appreciation of professional topics to include: ethics, respecting others, scheduling, evaluating risk, and professional societies. In addition to regular lectures and project exercises, the course includes guest speakers and class demonstrations. Differential course fee will be assessed.

ENCE 1020 - Introduction to Engineering Graphics

(1) Credit Hours

An introduction to engineering graphics and design, offering hands-on instruction in the use of an industry-leading computer-aided design software system to produce two- and three-dimensional drawings. Topics include the fundamentals of engineering graphics and design, geometric construction, the engineering design process, and drawing composition with emphasis on industry practice. Differential course fee will be assessed.

ENCE 1040 - Vector Statics

(3) Credit Hours

Vector statics operations and applications; particle equilibrium, force system resultants, equilibrium of a rigid body. Structural analysis; trusses, solution techniques. Center of gravity and centroid. Internal forces. Friction. Moments of inertia. Elasticity. Fall and Spring semesters. Lecture 3 hours. Prerequisites: [ENME 1030](#) with a minimum grade of C or Department Head approval. Pre or Corequisites: MATH 1920 or [MATH 1960](#) or Department Head approval. Differential course fee will be assessed.

ENCE 1999R - Special Projects

(1-9) Credit Hours

Individual or group projects. On demand. Prerequisites: Department Head approval. Differential course fee will be assessed.

ENCE 2010 - Introduction to Environmental Engineering

(3) Credit Hours

Basic concepts of environmental engineering, local and global environmental issues, scientific, social, ethical, regulations and public policy on environmental protection. Introduction to the scientific and engineering principles needed to analyze and solve environmental engineering problems. Prerequisites: [MATH 1960](#) and [CHEM 1110](#) and [CHEM 1110L](#), or Department Head approval. Differential course fee will be assessed.

ENCE 2010L - Environmental Engineering Laboratory

(1) Credit Hours

Will demonstrate design and conduct laboratory experiments to understand the fundamental principles of chemical, physical, and biological processes in water and wastewater engineering applications. Fall semester. Corequisites: [ENCE 2010](#) or Department Head approval. Laboratory/studio course fee will be assessed. Differential course fee will be assessed.

ENCE 2110 - Pollution Controls

(3) Credit Hours

The emergence and solution of pollution problems. Discussion of fundamental ideas and policies contributing to pollution problems. Pollution is examined from industrial, political, and social perspectives. Included are role-playing experiences designed to illustrate the effects of various policies on the quality of life in a simulated community. Fall semester. Lecture 3 hours. Restricted to Sophomore standing or higher. Differential course fee will be assessed.

ENCE 2220 - Probability and Statistics for Engineering (QR)

(3) Credit Hours

Introduction to probability and statistical methods with direct application to engineering problem solving. Discrete and continuous distributions, numerical measures, elementary sampling, point estimation, interval estimation, design of experiments, and hypothesis testing. Pre or Corequisites: [MATH 1960](#) or Department Head approval. Differential course fee will be assessed.

General Education Category: Quantitative Reasoning

ENCE 2460 - Mechanics of Materials

(3) Credit Hours

Stress-strain concepts and relations. Bending, shear, torsion, and deflections. Euler columns, repeated loading and connections. Fall and Spring semesters. Prerequisites: [ENCE 1040](#) with a minimum grade of C and [MATH 1960](#) or Department Head approval. Pre or Corequisites: [ENCE 2460L](#) or [ENME 2460L](#) or Department Head approval. No credit in both ENCE 2460 and [ENME 2460](#). Differential course fee will be assessed.

ENCE 2460L - Mechanics of Materials Laboratory

(1) Credit Hours

Principles applied in various lab activities include the stress and deformation of solid bodies subjected to uniaxial, bending and torsional loads. Individual and team projects include designing, building, testing, and evaluating structures. Written engineering communications, engineering ethics and professional responsibility. Fall and Spring semesters. Laboratory 3 hours. Prerequisites: [ENGL 1020](#) or Department Head approval. Pre or Corequisites: [ENCE 2460](#) or [ENME 2460](#) or Department Head approval. May be registered as [ENME 2460L](#). No credit in both ENCE 2460L and ENME 2460L. Laboratory/studio course fee will be assessed. Differential course fee will be assessed.

ENCE 2530 - Computer Applications in Civil Engineering

(2) Credit Hours

Development of fundamental computer skills related to civil and environmental engineering. Introduction of advanced office suites skills. Development of essential programming skills to efficiently solve real-world civil engineering problems. Applications of geographic information system for developing and managing infrastructure. Modern computer technology impact on civil engineering. Fall and Spring semesters. Lecture 1 hour, laboratory 1 hour. Corequisites: [ENCE 2460](#) or Department Head approval. Differential course fee will be assessed.

ENCE 2620 - Introduction to Geomatics

(3) Credit Hours

The art, science, and technologies used in the determination of positions above, on, or beneath the earth's surface. Fundamental concepts and practices of surveying, theory of measurements and field notes; methods of obtaining horizontal and vertical distances; methods of obtaining angles and directions; use of levels, transits, theodolites, and total stations; construction surveying, curves, and volumes. Global Navigation Satellite Systems; using maps and geographic information systems to turn survey data into useful information. Spring semester. Lecture 3 hours, laboratory 3 hours. Prerequisites: [ENCE 1020](#) or [ENME 1011](#) with a minimum grade of C or Department Head approval. Corequisites: [ENCE 2620L](#) or Department Head approval. Differential course fee will be assessed.

ENCE 2620L - Introduction to Geomatics Laboratory

(1) Credit Hours

Students in small teams perform field exercises that are designed to illuminate fundamental surveying concepts that are introduced in the lectures. Field exercises include basic surveying techniques (distance and differential leveling with autolevel), as well as error analysis. Additionally, the collection of topographic and control data by electronic total station and data logger, using a GPS receiver to establish precise tie to a regional coordinate system, will be addressed. A number of lab exercises are directed at helping students to gain a good understanding of the trigonometry behind standard surveying techniques, and the conversion of angle and distance measurements to x-y-z coordinates. Spring semester. Laboratory 3 hours. Prerequisites: [ENCE 1020](#) or [ENME 1011](#) with a minimum grade of C, or Department Head approval. Corequisites: [ENCE 2620](#) or Department Head approval. Laboratory/studio course fee will be assessed. Differential course fee will be assessed.

ENCE 2999R - Group Studies

(1-9) Credit Hours

On demand. Prerequisites: Department Head approval. Department may have additional prerequisite requirements. Differential course fee will be assessed.

ENCE 3380 - Water Resources Engineering

(3) Credit Hours

Fundamentals and practices of water resources engineering. Water resources engineering processes in the theoretical and applied realm in the fields of closed conduit (pipe) flow, open channel flow, surface water hydrology, and watershed processes. Application of probability and statistical concepts used in the analysis and design of simple hydraulic and hydrologic systems. Spring semester. Prerequisites: [ENCE 2010](#) or [ENCH 3310](#), [ENME 3070](#) with a C or better or Department Head approval. Differential course fee will be assessed.

ENCE 3500 - Civil Engineering Materials

(3) Credit Hours

Physical and mechanical properties of materials used in construction. Behavior of materials and structures under load. Testing standards, aggregates, cements, concretes, asphalt, properties of wood. Fall semester. Lecture 3 hours. Prerequisites: [ENCE 2460](#) and [ENCE 2460L](#) with minimum grades of C or Department Head approval. Corequisites: [ENCE 3500L](#) or Department Head approval. Differential course fee will be assessed.

ENCE 3500L - Civil Engineering Materials Laboratory

(1) Credit Hours

Laboratory exercise in CE Materials to support and enhance topics covered in [ENCE 3500](#). Fall semester. Laboratory 3 hours. Prerequisites: [ENCE 2460](#) and [ENCE 2460L](#) with minimum grades of C, or Department Head approval. Corequisites: [ENCE 3500](#) or Department Head approval. Laboratory/studio course fee will be assessed. Differential course fee will be assessed.

ENCE 3520 - Engineering Economy

(3) Credit Hours

Economic decision making for engineering systems. Choice of alternatives by equivalent annual cost, rate-of-return, present worth, and benefit-cost methods. Tax influences, statistical decision making, replacement policy. Fall, Spring, and Summer semesters. Lecture 3 hours. Prerequisites: [ENCE 2220](#) with a minimum grade of C or [DATA 2130](#) and MATH 1910 or [MATH 1950](#) with minimum grades of C or Department Head approval. Differential course fee will be assessed.

ENCE 3610 - Soil Mechanics

(3) Credit Hours

Geological overview, soil composition, soil type and structure, index properties, classification, site investigation, subsurface flow, flow nets, drainage, subsurface stresses, settlement, shear strength, and slope stability. Spring semester. Lecture 3 hours. Prerequisites: [ENCE 2460](#) and [ENCE 2460L](#) with minimum grades of C or Department Head approval. Corequisites: [ENCE 3610L](#) or Department Head approval. Differential course fee will be assessed.

ENCE 3610L - Soil Mechanics Laboratory

(1) Credit Hours

Students in small teams perform hands-on experiments that are designed to illuminate fundamental soil mechanics concepts that are introduced in the lectures. Laboratory exercises include particle size distribution, Atterberg limits, soil classification, water content, consolidation test, permeability tests, compaction tests, procedures, analysis, and sampling practices. Spring semester. Laboratory 3 hours. Prerequisites: [ENCE 2460](#) and [ENCE 2460L](#) with minimum grades of C. Corequisites: [ENCE 3610](#) or Department Head approval. Laboratory/studio course fee will be assessed. Differential course fee will be assessed.

ENCE 3620 - Transportation Engineering I

(3) Credit Hours

Introduction to transportation engineering with specific emphasis on the planning, design, operation, and construction of highway facilities. Fall semester. Lecture 3 hours. Prerequisites: [ENCE 2220](#) and [ENCE 2620](#) with minimum grades of C or Department Head approval. Differential course fee will be assessed.

ENCE 3640 - Structural Analysis I

(3) Credit Hours

Determination of internal forces and deflection in statically determinate trusses, beams, and frames. Introduction to analysis of statically indeterminate structures. Fall semester. Lecture 3 hours. Prerequisites: [ENCE 2460](#) and [ENCE 2460L](#) with minimum grades of C or Department Head approval. Differential course fee will be assessed.

ENCE 3680 - Design of Concrete Structures

(3) Credit Hours

Design of concrete beams in flexure and shear, one-way slabs, T-beams, doubly reinforced beams, columns, development lengths, and serviceability based on the ACI Codes of Practice. Computer applications used as applicable. Spring semester. Lecture 3 hours. Prerequisites: [ENCE 3640](#) with a minimum grade of C or Department Head approval. Differential course fee will be assessed.

ENCE 3850 - Interdisciplinary Design Project I

(3) Credit Hours

First semester of the capstone interdisciplinary group design project in which students use their discipline-based knowledge in an interdisciplinary environment. Projects are expected to complete through preliminary design. The team design experience includes design methodology, concept generation, decision making, technical project management, quality and reliability engineering, concurrent engineering, teamwork, written and oral communication, and introduction to engineering ethics and professional responsibility. The projects incorporate technical activities applicable to the engineering disciplines of the College. Faculty from the disciplines support the course and students as technical advisors and aid in project selection. Fall and Spring semesters. Lecture 2 hours, project 2 hours. Prerequisites: [ENCE 3620](#), [ENCE 3380](#)

, and [ENCE 3680](#)
 with a minimum grade of C or Department Head approval. Pre or Corequisites: [ENCE 3520](#)
 with a minimum grade of C or Department Head approval. May be registered as [CPEN 3850](#)
 , [ENEE 3850](#)
 or [ENME 3850](#)
 . Credit allowed in only one of the four courses. Differential course fee will be assessed.

ENCE 3999R - Group Studies

(1-9) Credit Hours

On demand. Prerequisites: Department Head approval. Department may have additional prerequisite requirements. Differential course fee will be assessed.

ENCE 4380 - Wastewater and Water Treatment

(3) Credit Hours

Introduction to theory and conceptual design of water and wastewater collection, transport, composition, and treatment including physical, chemical, and biological unit processes. Fall semester. Lecture 3 hours. Prerequisites: [ENME 3070](#) and [ENCE 2010](#) with minimum grades of C or Department Head approval. Differential course fee will be assessed.

ENCE 4480 - Urban Stormwater Management

(3) Credit Hours

Understand regulations pertaining to stormwater and review receiving water impacts due to stormwater discharges, sources of pollutants, and pollution control and treatment techniques, integrated drainage design approach for mitigating both quality and quantity issues of stormwater management. Spring semester. Prerequisites: [ENCE 3380](#) or Department Head approval. Differential course fee will be assessed.

ENCE 4610 - Foundation Analysis and Design

(3) Credit Hours

Fundamental of soil mechanics as applied to the analysis and design of foundation systems; subsurface investigations; design of shallow and deep foundations. Retaining structures and lateral earth pressures. Fall semester. Lecture 3 hours. Prerequisites: [ENCE 3610](#) with a minimum grade of C or Department Head approval. Differential course fee will be assessed.

ENCE 4620 - Transportation Engineering II

(3) Credit Hours

Planning, design, and operation of transportation facilities in air, rail, water, and highway systems; characteristics of transportation modes; interaction between modes; mode interfaces; transportation technology; perspectives and

economics of rural and urban transportation systems. Introduction to traffic engineering; bicycle and pedestrian facilities are also covered. Fall semester. Lecture 3 hours. Prerequisites: [ENCE 3620](#) with a minimum grade of C or Department Head approval. Differential course fee will be assessed.

ENCE 4640 - Structural Analysis II

(3) Credit Hours

Analysis of two- and three-dimensional statically indeterminate structures by classical and matrix methods of solution. Flexibility and stiffness techniques, influence lines, approximate analysis, and nonlinear analysis. On demand. Lecture 3 hours. Prerequisites: [ENCE 3640](#) with a minimum grade of C or Department Head approval. Differential course fee will be assessed.

ENCE 4680 - Design of Steel Structures

(3) Credit Hours

Design of structural systems: steel beams, columns, bolted and welded connections based on the AISC specifications. Computer applications used as applicable. Fall semester. Lecture 3 hours. Prerequisites: [ENCE 3640](#) with a minimum grade of C or Department Head approval. Differential course fee will be assessed.

ENCE 4780 - Structural Masonry and Wood Design

(3) Credit Hours

Learn the nomenclature, properties, and material specifications associated with basic masonry and wood construction. Students will learn to design masonry assemblages such as: panel walls, partially reinforced walls, shear walls, beams and beam-columns. In addition, students will be able to design wood tension members, trusses, beams, beam columns and connections. Lecture 3 hours. Prerequisites: [ENCE 3640](#) with a minimum grade of C or Department Head approval. Differential course fee will be assessed.

ENCE 4850 - Interdisciplinary Design Project II

(3) Credit Hours

Second semester of the capstone interdisciplinary group design project in which students use their discipline-based knowledge in an interdisciplinary environment. Completion of the detailed and final design phases of the engineering project initiated in ENCE/ENEE/ENME/CPEN 3850 including building a model, testing, evaluation, and reporting the design result. Projects require students to illustrate their discipline knowledge in an interdisciplinary environment. Specific discipline aspects of the project are supported by representative faculty acting as technical advisors. Oral and written presentation of progress and results. Ethics and professional responsibility and the global and societal impact of engineering decisions are covered. Fall and Spring semesters. Lecture 1 hour, project 4 hours. Prerequisites: [ENCE 3850](#) or [ENEE 3850](#) or [ENME 3850](#) or [CPEN 3850](#) with a minimum grade of C; must have been taken in the immediately preceding semester or Department Head approval. May be registered as [ENME 4850](#), [ENEE 4850](#)

or [CPEN 4850](#)

. Credit allowed in only one of the four courses. Differential course fee will be assessed.

ENCE 4995R - Departmental Thesis

(1-3) Credit Hours

A two-semester research or creative project resulting in a thesis under the supervision of a faculty member and with the approval of the Honors College. On demand. Prerequisites: Student must coordinate with Honors College to submit a Thesis Contract to get registered for this course. Restricted to Sophomore standing or higher. Differential course fee will be assessed.

ENCE 4997R - Research

(1-9) Credit Hours

Enables students to conduct independent research. On demand. Prerequisites: Student must coordinate with a specific faculty member to complete the Research contract to get registered for the course. Restricted to Sophomore standing or higher. Differential course fee will be assessed.

ENCE 4998R - Individual Studies

(1-9) Credit Hours

Enables students to study selected topics in depth. On demand. Prerequisites: Student must coordinate with a specific faculty member to complete the Individual Studies contract to get registered for the course. Restricted to Sophomore standing or higher. Differential course fee will be assessed.

ENCE 4999R - Group Studies

(1-9) Credit Hours

Department may have additional prerequisite requirements. On demand. Differential course fee will be assessed.

Classics

CLAS 1200 - Legendary Rome (HF)

(3) Credit Hours

An exploration of the multiple layers of myth that grew up around the city of ancient Rome. Special attention will be given to foundation narratives and images of heroism and anti-heroism in considering the ways in which different legends worked to forge a sense of community and to reinforce a shared set of values in different moments of Rome's long history. Important primary works will be the primary though not exclusive object of analysis with authors such as Livy, Virgil, Ovid, Horace, Plutarch, Prudentius, and Augustine.

General Education Category: Humanities and Fine Arts

CLAS 1999R - Special Projects

(1-9) Credit Hours

Individual or group projects. Maximum credit four hours. On demand. Prerequisites: Department Head approval.

CLAS 2000 - Everyday Life in the Roman Empire (HF)

(3) Credit Hours

This course centers on the urban environments, lifestyles, occupations, culture, norms, social relationships, hierarchies of privilege, and religious practice that formed everyday life in the Roman Empire. There will be an emphasis on the diversity of identities and experiences found in city life, with special attention to groups of lower legal and social status such as slaves, freed persons, immigrants, ethnic minorities, women, and children. Consideration will also be given to the spread of Roman modes of life in space and time, with Spain and the Americas taken as particular examples. Every semester. Lecture 3 hours.

General Education Category: Humanities and Fine Arts.

CLAS 2750R - Themes in Classics

(3) Credit Hours

Study of select topics or themes relating to Classical Antiquity and its reception, conducted at the intermediate level. Fall or Spring semester.

CLAS 2999R - Group Studies

(1-9) Credit Hours

On demand. Prerequisites: Department Head approval. Department may have additional prerequisite requirements.

CLAS 3050 - Ancient Near East and Egypt

(3) Credit Hours

This course will explore both Ancient Egyptian and Near Eastern culture and geography to understand the foundations of these earliest civilizations and their impact on the ancient world. We will investigate some of the most important technological developments, sociopolitical formations, and creative works of these societies from ca. 4,000 to ca. 300 BCE. Some of the cultures we will study include Egypt, Sumeria, Akkad, Babylonia, Assyria, the Philistines, and the Canaanites. The study of ancient history is fascinating in that it is dependent on a combination of documentary evidence and archaeological sources. In this class, students will learn how to “read” both types and understand how the narrative history we know today is derived from these sources. Every 4-5 semesters. May be registered as HIST 3050. No credit in both CLAS 3050 and HIST 3050.

CLAS 3110 - Ancient Greece

(3) Credit Hours

A broad survey of the political, cultural, and social history of Ancient Greece. Topics may include Bronze Age culture, the Persian Wars, Classical Athens and Sparta, the rise of Macedonia, as well as the art, philosophy, and religion of Greece’s polis-based society. May be registered as [HIST 3110](#). Credit not allowed in both CLAS 3110 and [HIST 3110](#).

CLAS 3120 - Ancient Rome

(3) Credit Hours

This course provides a broad survey of the political, cultural, and social history of Ancient Rome from its founding to its transformation in the fifth century C.E. Topics covered include art, philosophy, and literature; the rise of bureaucratic government; the Roman economy; and life under the emperors. May be registered as [HIST 3120](#). Credit not allowed in both CLAS 3120 and [HIST 3120](#).

CLAS 3230 - Highlights of Roman Law and Culture

(3) Credit Hours

Students are introduced to Roman Law through selective study of its origins, ethical principles, monuments, leading figures, cultural manifestations, and later influence. Fall or Spring semester.

CLAS 3500 - Greek and Roman Tragedy in Translation

(3) Credit Hours

A study of the origin of tragedy and its dramatic and philosophical development in the works of Aeschylus, Sophocles, Euripides, and Seneca. On demand. May be registered as [ENGL 3500](#). Credit not allowed in both CLAS 3500 and [ENGL 3500](#).

CLAS 3750R - Topics in Classics

(3) Credit Hours

Study of topics or themes relating to Classical Antiquity and its reception. May be repeated to study different topics.

CLAS 3960 - Classical Mythology (HF)

(3) Credit Hours

A study of the origins and meaning of Greek and Roman myths, their importance for understanding ancient culture, and their influence on later literature and art. On demand.

General Education Category: Humanities and Fine Arts.

CLAS 3970 - Greek and Roman Comedy in Translation

(3) Credit Hours

A study of the origins, development, and changes in comedy as seen in the works of Aristophanes, Menander, Plautus, and Terence. On demand.

CLAS 4900 - Senior Capstone

(2-3) Credit Hours

This is a variable credit class. The 2-credit course will allow senior-level students to reflect on their experience as majors in Spanish, French and Classics. They will also prepare to enter the professional world and/or graduate school. Those who take the course for 3 credits will meet with faculty members throughout the semester in order to develop a capstone project and will present their work in a public form. Fall and Spring semesters. Pre or Corequisites: At least 6 credits

from [CLAS 3110](#)

, [CLAS 3120](#)

, [CLAS 3500](#)

, [CLAS 3750R](#)

, [CLAS 3960](#)

, [CLAS 3970](#)

, [CLAS 4997R](#)

, [CLAS 4998R](#)

, or [CLAS 4999R](#)

or Department Head approval. Senior standing. Open to Modern and Classical Languages and Literature majors only.

CLAS 4997R - Research

(1-9) Credit Hours

Enables students to conduct independent research. On demand. Prerequisites: Student must coordinate with a specific faculty member to complete the Research contract to get registered for the course. Restricted to Sophomore standing or higher.

CLAS 4998R - Individual Studies

(1-9) Credit Hours

Enables students to study selected topics in depth. On demand. Prerequisites: Student must coordinate with a specific faculty member to complete the Individual Studies contract to get registered for the course. Restricted to Sophomore standing or higher.

CLAS 4999R - Group Studies

(1-9) Credit Hours

Department may have additional prerequisite requirements. On demand. Prerequisites: Department Head approval.

Communication

COMM 1010 - Introduction to Mass Communication

(3) Credit Hours

An introduction to the field of mass communication. Explores the historical development and current structure of the mass media. Examines the process of creating mass communication messages and economic, legal and ethical issues facing media outlets. Every semester. Lecture 3 hours.

COMM 1100 - Communication Technology

(1) Credit Hours

Introduction to the tools and technologies used in mass communication.

COMM 1250 - The First Year Experience in Communication

(1) Credit Hours

An introduction to the college experience for first-year students at UTC and the aspects needed for a successful transition from high school to college. The mission of the Communication department is to provide strong preparation in both communication practice and research, based on a firm grounding in the liberal arts. This elective is available to students with fewer than 30 earned hours, and is recommended during the initial semester for students who enter UTC with fewer than 15 hours. Students enrolled in this course will earn one hour of graded, elective credit. Fall semester. Lecture 1 hour. Open to freshmen.

COMM 1999R - Special Projects

(1-9) Credit Hours

Individual or group studies. On demand. Laboratory 1 to 3 hours. Prerequisites: Department Head approval.

COMM 2000R - Special Topics

(1-3) Credit Hours

Specialized study of mass media designed to meet interests of students and faculty.

COMM 2200 - Mass Media History (HF)

(3) Credit Hours

An exploration of the major developments in the history of mass media, with an emphasis on developing an understanding of how historical narratives and arguments are created. Every semester. Lecture 3 hours.

General Education Category: Humanities and Fine Arts.

COMM 2300 - Media Writing

(3) Credit Hours

Introduction to factual writing style for the media and the presentation of information in multiple formats to diverse audiences. News and public relations writing, information gathering, and interviewing. Every semester. Laboratory 4 hours. Prerequisites: [ENGL 1010](#)

or [ENGL 1011](#)

or [UHON 1010](#)

with a minimum grade of C, or Department Head approval. Communication fee will be assessed.

COMM 2310 - Multimedia Journalism

(3) Credit Hours

Researching, structuring, writing, and evaluating news stories for print, radio, television and the Web. Comparisons of news and converging media.

Every semester. Laboratory 4 hours. Prerequisites: [ENGL 1020](#)

or [HIST 2100](#)

or [UHON 1020](#)

and [COMM 2300](#)

with minimum grades of C, [COMM 1100](#)

, or approval of the Department Head. Communication fee will be assessed.

COMM 2330 - Public Relations Writing

(3) Credit Hours

Introduction to public relations writing style, preparation of persuasive copy to include documents typically used on a day-to-day basis within the profession. Creative and conceptual aspects emphasized. Every semester. Laboratory 4 hours. Prerequisites: [COMM 2300](#) with minimum grade of C or Department Head approval. Communication fee will be assessed.

COMM 2999R - Group Studies

(1-9) Credit Hours

On demand. Prerequisites: Department Head approval. Department may have additional prerequisite requirements.

COMM 3010R - Special Topics, Professional Elective

(3) Credit Hours

Specialized study of mass media designed to meet interests of students and faculty. Topic addresses professional skills related to mass media production. Laboratory 4 hours. Prerequisites: [COMM 2300](#) or Department Head approval. Communication fee will be assessed.

COMM 3020R - Special Topics, Professional Visual Skills

(3) Credit Hours

Specialized study of mass media designed to meet interests of students and faculty. Topic addresses professional skills related to visual communication. Laboratory 4 hours. Prerequisites: [COMM 1100](#) and [COMM 2300](#) or Department Head approval. Communication fee will be assessed.

COMM 3200 - Mass Communication Perspectives

(3) Credit Hours

History and development of mass media and mass media issues in American society. Cultural, technological, economic and societal consequences of the media. Every semester. Lecture 3 hours. Prerequisites: [COMM 1010](#) or Department Head approval. Junior standing.

COMM 3220 - Exploring & Promoting Chattanooga (CZ)

(3) Credit Hours

Exploring & Promoting Chattanooga operates as a digital media firm that works with a strategic community partner to plan and execute a promotional campaign. The class sets its goals and learners immerse themselves in the community by

promoting and attending live music, stand-up comedy, theater, dance, and/or other forms of live art and entertainment. The class produces digital content (e.g., photos, video, audio, social media posts, interviews etc.) that will be reviewed and potentially selected for online publication by our partner. These observations and experiences also inform a series of reflections built around theoretical questions concerning the intersections of art, industry, identity, and place. Every semester.

General Education Category: Individual and Global Citizenship

COMM 3240 - Race, Gender and the Media

(3) Credit Hours

Examines U.S. mass media construction of race, ethnicity, gender, and sexuality within an historical context and investigates the role of women and minority groups in U.S. media industries. On demand. Lecture 3 hours. Prerequisites: Department Head approval. Junior standing. May be registered as [WGSS 3240](#). Credit not allowed in both COMM 3240 and [WGSS 3240](#).

COMM 3250 - TV & Pop Culture (HF)

(3) Credit Hours

Television & Popular Culture uses TV as a way to explore our world in a variety of ways. Learners will learn to see TV as Democratic power centers; big businesses and industries; ways to tell stories; spaces where identities are represented and contested; and, as routines performed by audiences. Fall and Spring semesters.

General Education Category: Humanities and Fine Arts

COMM 3300 - Principles of PR and Advertising

(3) Credit Hours

This course studies fundamentals of public relations and advertising as core components of strategic communication. It will include discussions of advertising and public relations historical foundations, theories, structure, planning, execution and evaluation. Lecture 3 hours.

COMM 3310 - Crisis Communication

(3) Credit Hours

Principles of crisis communication, focusing on the communication surrounding an organization before, during and after a crisis. Lecture 3 hours. Prerequisites: [COMM 1010](#) and [COMM 2300](#) or Department Head approval.

COMM 3350 - Publication Design I

(3) Credit Hours

Introduction to publication design, with special attention to design principles and techniques of publication layout. Every semester. Laboratory 4 hours. Prerequisites: [COMM 1100](#) and [COMM 2300](#) or Department Head approval. Communication fee will be assessed.

COMM 3370 - Web Design

(3) Credit Hours

Special topics in Web design with a focus on effectively presenting images, video, audio, and written material on the Web. On demand. Laboratory 4 hours. Prerequisites: [COMM 3350](#) or Department Head approval. Communication fee will be assessed.

COMM 3400 - Audio Production and Presentation

(3) Credit Hours

Producing and presenting content in radio and non-broadcast audio media, using both studio and portable facilities. Studio, control room, and field production procedures, recording and editing, music and sound effects. Every semester. Lecture 1 hour, laboratory 3 hours. Prerequisites: [COMM 1100](#) and [COMM 2300](#) or Department Head approval. Communication fee will be assessed.

COMM 3420 - Podcasting I

(3) Credit Hours

Basic audio podcast and storytelling production. Laboratory 4 hours. Prerequisites: [COMM 1100](#) and [COMM 2300](#) or Department Head approval. Communication fee will be assessed.

COMM 3450 - Video Production

(3) Credit Hours

Introduction to the basic techniques and theory of visual media production. Emphasis on producing public affairs, educational, and entertainment content for television and multiple formats. Laboratory 4 hours. Prerequisites: [COMM 1100](#) or [ART 2830](#) or Department Head approval. Communication fee will be assessed.

COMM 3500 - Television News Production

(3) Credit Hours

Principles and skills of producing television newscasts. Includes the production of two half-hour newscasts. Fall semester. Laboratory 4 hours. Prerequisites: [COMM 2310](#)

or Department Head approval. Communication fee will be assessed.

COMM 3550 - Documentary Film Studies

(3) Credit Hours

Introduces students to the theory, history, aesthetics, editing practices, ethics, and political significance of the genre, as well as concept development and visual storytelling techniques. Includes analysis of significant documentaries and preparation of a treatment for a short documentary.

COMM 3600 - Screenwriting I

(3) Credit Hours

Writing for film, with focus on creatively building several types of short scripts and outlines. Laboratory 4 hours. Prerequisites: [ENGL 1020](#)

or [HIST 2100](#)

or [UHON 1020](#)

or Department Head approval. Communication fee will be assessed.

COMM 3610 - Advanced Reporting

(3) Credit Hours

Reporting and writing news from city and county sources, with emphasis on researching public documents. Explorations and discussions of news and its relationship to society. On demand. Laboratory 4 hours. Prerequisites: [COMM 2310](#) or Department Head approval. Communication fee will be assessed.

COMM 3620 - Sports Writing

(3) Credit Hours

Students will learn techniques needed to be successful covering sports for print and electronic media outlets, with a strong emphasis on writing and reporting, to include research and interview skills. Laboratory 4 hours. Prerequisites: [COMM 2300](#)

or Department Head approval. Communication fee will be assessed.