

Tennessee Board of Regents' Minimum Degree Requirements Common Catalog Statement

All universities and community colleges in the Tennessee Board of Regents System (TBR) share a common set of Minimum Requirements for baccalaureate degrees or associate degrees designed for transfer. The Minimum Degree Requirements specify thirty-two semester credit hours in the following subject areas: English composition, Humanities, History, Natural/Physical Sciences and Mathematics, and Physical Education Activity Courses.

Every TBR institution incorporates the thirty-two semester hours into its degree program requirements and accepts all courses designated as meeting these requirements at other TBR institutions. By ensuring the transferability of courses fulfilling the Minimum Degree Requirements, the TBR has eliminated unnecessary repetition of these courses by students transferring to institutions within the TBR System. Because each TBR institution has a unique mission and its own distinctive curriculum, an institution may require students to complete additional courses in the Minimum Degree subject areas and in other areas that may comprise an institutional General Education Program.

Identifying Courses Satisfying the Tennessee Board of Regents (TBR) Minimum Degree Requirements

Although the courses fulfilling the minimum 32-hour core degree requirements may vary in actual design among institutions, many contain similar content. These courses are identified by common course rubrics (prefixes) and numbers in all TBR institutions to facilitate transferability. The actual courses designated by each institution to fulfill the Minimum Degree Requirements, including courses that may not be a part of the common course prefix and numbering pattern, are denoted in catalogs by the ♦ symbol. A complete matrix of courses that satisfy the Minimum Degree Requirements at all TBR institutions and an explanation of the common course rubric and numbering system are available on the TBR web page (www.tbr.state.tn.us).

Identifying Courses Designed for Transfer to Four-Year Institutions

Southwest Tennessee Community College offers courses that transfer to four-year institutions and are accepted toward baccalaureate degrees. Other courses are designed for terminal two-year degrees for career entry, and do not transfer for baccalaureate credit. All courses are identified in this Catalog as Transfer or Non-transfer as follows:

Courses followed by the letter T are designed for transfer to institutions granting the baccalaureate degree.
Courses followed by the letter N are not designed for transfer to institutions granting the baccalaureate degree.

Please note that, in all cases, the receiving institution makes the final determination concerning the transferability of all courses.

Course Description Directory

| | | | |
|--|-----|---|-----|
| Academic Success | 139 | Hospitality Management | 163 |
| Accountancy | 139 | Human Services | 164 |
| Aerospace Studies | 140 | Industrial Engineering Technology | 165 |
| Allied Health Sciences | 140 | Industrial Maintenance Technology | 166 |
| Anthropology | 141 | Information Systems and Decision Sciences | 168 |
| Architectural Engineering Technology | 141 | Information Technology | 168 |
| Art | 142 | Landscape and Turfgrass Management | 172 |
| Astronomy | 142 | Languages | 174 |
| Automotive Service Technology | 142 | Library Use/Information | 174 |
| Biology | 144 | Management | 175 |
| Chemical Engineering | 144 | Marketing | 176 |
| Chemistry | 145 | Mathematics | 177 |
| Civil Construction Engineering | 145 | Mechanical Engineering Technology | 178 |
| Computer Engineering Technology | 146 | Medical Laboratory Technology | 179 |
| Computer Literacy | 147 | Medical Terminology | 180 |
| Court Reporting | 147 | Merchandising | 180 |
| Criminal Justice Studies | 148 | Military Science (Army ROTC) | 180 |
| Criminal Justice Studies – Corrections | 149 | Music | 180 |
| Criminal Justice Studies – Police | 149 | Natural Sciences | 182 |
| Developmental Studies | 149 | Nursing | 182 |
| Dietetics | 150 | Occupational Safety and Environmental Health Technology | 184 |
| Early Childhood Education | 151 | Office Administration | 184 |
| Economics | 152 | Paralegal Studies | 186 |
| Education | 152 | Pharmacy | 188 |
| Electrical Engineering Technology | 153 | Philosophy | 189 |
| Electronic Technology | 154 | Physical Education | 189 |
| Emergency Medical Technician | 155 | Physical Sciences | 190 |
| Engineering Technology | 156 | Physical Therapy Assistant | 190 |
| English | 156 | Physics | 191 |
| Ethics | 157 | Political Science | 192 |
| Finance and Insurance | 157 | Psychology | 192 |
| Fire Science | 158 | Radiologic Technology | 192 |
| Geographic Information Systems (GIS) | 159 | Real Estate | 192 |
| Geography | 160 | Sociology/Social Work | 194 |
| Graphic Arts Technology | 160 | Speech | 195 |
| Health | 162 | Telecommunication Engineering Technology | 195 |
| History | 162 | Television Production | 196 |
| Honors | 163 | Theater | 196 |

COURSE DESCRIPTIONS

Academic Success

ACAD 1100 Academic Success T
1 Credit, 1 Class Hour

This course provides an orientation to the college environment with emphasis on academic skills necessary for college success. This is a three credit-hour course limited to degree-seeking students who have accumulated fewer than 25 semester hours.

Accountancy

ACCT 1003 Accounting for Managers N
3 Credits, 3 Class Hours

This course approaches accounting from the non-accountant's point of view. Emphasis is on the importance of financial information in the proper allocation of resources within the organization. This is accomplished by an in-depth study of four basic financial statements, their relation to each other and the ways in which they may be used in the decision-making process. Financial analysis and budgeting are integral parts of the course.

ACCT 1035 Tax Concentration I N
4 Credits, 4 Class Hours

This course is the first of a two-semester, in-depth look at individual income taxation from a theoretical, as well as practical point of view. Some of the topics covered include: basic research techniques; exemptions; gross income concepts; inclusions and exclusions; deductions and losses in general; passive activity losses; business expenses and losses; depreciation; employee expenses; and the manner in which these items are presented to the government on Internal Revenue Service tax forms. *Prerequisites: DSPM 0800, DSPW 0800, DSPR 0800 or equivalent*

ACCT 1045 Tax Concentration II N
4 Credits, 4 Class Hours

This course is the second part of a two-part theory and forms course dealing with the Internal Revenue Code and how the taxpayer complies with the tax laws by submitting the exact form specified for the tax event. Topics included in this course include itemized deductions; the alternative minimum tax; tax credits; property transactions; accounting periods and methods, and deferred compensation. As in the first part of the course, the relevant tax forms, including Tennessee, Arkansas and Mississippi State forms are covered in detail. *Prerequisite: ACCT 1035*

ACCT 1210 Principles of Accounting I T
3 Credits, 3 Class Hours

This course is the first of a two-semester course designed to introduce the student to accounting principles, practices and techniques. Emphasis is placed on accounting for a proprietorship. The accounting cycle, financial statements, control of cash, inventories, plant assets, current liabilities, and payroll accounting are covered.

ACCT 1220 Principles of Accounting II T
3 Credits, 3 Class Hours

This course is a continuation of Principles of Accounting I with an emphasis on corporations, financial analysis and managerial accounting. Content includes corporate organization, operations, earnings per share and dividends; long-term obligations and investments; statement of cash flow; analysis of financial statements; departments and branches; cost accounting systems; cost-volume-profit analysis; budgeting and standard cost, and decision making. *Prerequisite: ACCT 1210*

ACCT 1280 Database Management for Accountants N
3 Credits, 3 Class Hours

This course is an introduction to state-of-the-art database management software. *Prerequisite: CMPT 1010 Computers in Business or permission of instructor*

ACCT 1290 Spreadsheets for Accountants N
3 Credits, 3 Class Hours

This course introduces the student to Microsoft's basic spreadsheet software. Major topics include spreadsheet vocabulary, command menu structure, spreadsheet design, introduction to database and graph design and production. *Prerequisite: keyboard proficiency, CMPT 1010 Computers in Business or permission of instructor.*

ACCT 1310 Income Tax I N
4 Credits, 4 Class Hours

This course is designed to provide a comprehensive understanding of the federal income tax structure as it relates to individuals. Further, it provides a well-rounded tax education, not mere tax training, in the application of tax principles to specific problems. Tax forms currently in use are highlighted. *Prerequisite: ACCT 1210*

ACCT 1320 Income Tax II N
4 Credits, 4 Class Hours

This course is a continuation of Income Tax I emphasizing the Internal Revenue Code and Regulations as they pertain to corporations, partnerships, decedents, estates, and trusts. *Prerequisite: ACCT 1310*

ACCT 2024 Cost Accounting N
4 Credits, 4 Class Hours

This course is a study of the fundamentals of cost accounting within an industrial organization. The accounting functions relative to materials, labor, and factory overhead are treated in detail. Job order and process cost systems are fully explored. Standard cost systems, budgeting, and managerial control functions are also discussed. *Prerequisite: ACCT 2210*

ACCT 2035 Tax Concentration III N
4 Credits, 4 Class Hours

This course introduces tax students to corporations that are taxed at the corporate level as opposed to the shareholder level. Some of the topics covered include: organization and capital structure; earnings and profits and dividend distributions; redemptions and liquidations; the corporate alternative minimum tax; penalties; reorganizations; consolidated tax returns; and international transactions. All related federal and state (Tennessee, Arkansas and Mississippi) tax forms are covered in detail. *Prerequisite: ACCT 1045*

ACCT 2044 Governmental Accounting N
4 Credits, 4 Class Hours

The accounting theory of analyzing, recording, summarizing, reporting, and interpreting the financial transactions of governmental units and agencies is studied in this course. Emphasis is on state and local governments. *Prerequisite: ACCT 1220*

ACCT 2045 Tax Concentration IV N
4 Credits, 4 Class Hours

The theory of taxation of the income of partnerships, S corporations, fiduciaries, as well as the tax consequences of lifetime and testamentary property transfers, and the related forms and schedules are discussed in the course. *Prerequisite: ACCT 1045*

ACCT 2055 Accounting Applications for Microcomputers N
4 Credits, 4 Class Hours

The solution of accounting problems by using the microcomputer is emphasized in this course. Hands-on experience with state-of-the-art hardware and software familiarizes the student with spreadsheets and current general ledger programs.

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions

T – Denotes courses designed for transfer to four-year institutions

N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

ACCT 2064 Auditing N
4 Credits, 4 Class Hours
 The special place of the auditor in accounting is examined on an organization level, an ethical level, and a legal liability level. Emphasis is placed on the tools of the auditor, including statistical sampling techniques and the use of computerized audit programs. Laboratory periods permit actual preparation of audit work papers in a realistic environment. *Prerequisite: ACCT 2210*

ACCT 2074 Advanced Accounting N
4 Credits, 4 Class Hours
 Current accounting problems relating to partnerships, installment sales, consolidations, foreign subsidiaries, and fiduciary accounting are examined by the student in this course. The formation, income division and liquidation of partnerships, cost and equity accounting for subsidiaries and consolidation on a purchase or a pooling of interests basis are examined in depth. *Prerequisite: ACCT 1220*

ACCT 2095 Adv. Accounting Applications for Microcomputers N
4 Credits, 4 Class Hours
 The advanced student is given the opportunity in a hands-on environment to develop and use computer skills to solve more difficult accounting problems. Basic computer skills are enhanced as a secondary objective. *Prerequisite: ACCT 2055*

ACCT 2145 Tax Concentration V N
4 Credits, 4 Class Hours
 This course is designed to allow the student to apply the theory and form preparation skills learned in earlier courses using commercial tax-compliance software. The student is also introduced to the concept of electronic filing. *Prerequisite: ACCT 2045*

ACCT 2210 Intermediate Accounting I N
4 Credits, 4 Class Hours
 This course provides an in-depth study of accounting records and reports, end-of-period procedures, and net income concepts. Content includes financial statement interpretation and preparation, receivables, systems, and controls, inventories, plant and intangible assets, and investments. *Prerequisite: ACCT 1220*

ACCT 2220 Intermediate Accounting II N
4 Credits, 4 Class Hours
 This course is a continuation of Intermediate Accounting I with emphasis placed on the formation and operation of the corporate form of business organization. Content includes liabilities and reserves, analysis of financial statements and working capital, dividends, earnings per share, income tax allocation, and revenue recognition. *Prerequisite: ACCT 2210*

ACCT 2290 Advanced Spreadsheets for Accountants N
3 Credits, 3 Class Hours
 This course is a continuation of ACCT 1290 Spreadsheets for Accountants with advanced accounting applications. The concepts, features, and commands of a spreadsheet are applied to a variety of business situations. *Prerequisite: ACCT 1290 or permission of instructor*

ACCT 1931 Cooperative Education Work Experience I N
3 Credits, 225 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs that it provides, plus the impact it has on today's society. *Prerequisite: Co-op advisor's approval*

ACCT 1932 Cooperative Education Work Experience II N
3 Credits, 225 Lab Hours
 The student spends one semester in employment in industry. Work duties are in the area of finance performing write-up work, data summarization and reporting. The student acquires a basic understanding of source documents and how these data are recorded and utilized in reports to management for decision making by them. *Prerequisite: ACCT 1931*

ACCT 1933 Cooperative Education Work Experience III N
3 Credits, 225 Lab Hours
 The student spends one semester in employment in the accounting and financial offices of an enterprise. Work duties are in the area of recording, summarization, and analysis of data used in reports to management from the accounting department. Helpful, also, is experience in the organization and flow pattern of data constituting the input to the accounting department of the enterprise. The third semester is optional if the student and the employer mutually agree that employment will continue. Credit earned will be additive; substitute credit will not be awarded.

Aerospace Studies

These courses are offered through the University of Memphis.

AERO 1100 U.S. Air Force Today Leadership Laboratory (Fall)
0 Credit Corequisite: AERO 1101

AERO 1101 The Air Force Today I (Fall)
1 Credit

This survey course is designed to introduce students to the United States Air Force and Air Force ROTC. Topics include Air Force mission and organization, customs and courtesies, officer opportunities, problem solving, and communication skills. *Corequisite: AERO 1100*

AERO 1110 U.S. Air Force Today II Lab (Spring)
0 Credit

Corequisite: AERO 1111

AERO 1111 U.S. Air Force Today II (Spring)
1 Credit

This course is a continuation of AERO 1101. *Corequisite: AERO 1110*

AERO 2200 The Air Force Way I Lab (Fall)
0 Credit

Corequisite: AERO 2201

AERO 2201 The Air Force Way I (Fall)
1 Credit

This survey course is designed to facilitate the transition from AFROTC cadet to officer candidate. Topics include Air Force Heritage and leaders, Quality Air Force, ethics and values, leadership, group problem solving, and communication skills. *Corequisite: AERO 2200*

AERO 2210 The Air Force Way II Lab (Spring)
0 Credit

Corequisite: AERO 2211

AERO 2211 The Air Force Way II (Spring)
1 Credit

Allied Health Sciences

AHS 1050 Introduction to Health Careers N
1 Credit, 1 Class Hour

Health career information is contained in this course. The focus is on the role, function, and relationships among various careers and the necessary educational/training requirements for career preparation and opportunities for job employment. Emphasis is placed on health career delivery systems and the legal and ethical dimensions related to health care. Students will also explore the impact of illness on the individual and the family.

AHS 2990 Special Topics in Health Careers N
1-3 Credits, 3 Class Hours

This course provides an in-depth study of selected topic(s) related to aspects of health occupations to further develop job-seeking skills. Field trips, guest speakers, and individual projects are included. Emphasis is on personal health/development.

Anthropology

ANTH 2010 Cultural Anthropology T
3 Credits, 3 Class Hours
 This course is the study of the origin and development of human culture including social relations, language, government, religion, and rituals, and the problems of developing nations and minority groups in the modern world. *Prerequisite: DSPW0800, DSPR0800 or equivalent*

Architectural Engineering Technology

ARCH 1124 Architectural Drawing N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is an introduction to the fundamentals of graphic representation of subjects that are architectural in nature. Drafting expressions and light construction principles are stressed to increase the student's knowledge and proficiency in drawing architectural plans and details. *Corequisite: DSPM 0800*

ARCH 1224 Contract and Construction Documents N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is a continuation of Architectural Drawing with emphasis on the production of architectural working drawings. Drawings are made of typical floor plans, building elevations and sections following a study of structural relationships, utility needs, and aesthetic aspects. Students will use the computer to produce drawings. *Prerequisite: ARCH 1124, ARCH 2644, or permission of the program coordinator.*

ARCH 1244 Materials and Methods N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course familiarizes the student with physical properties, grades, and uses of materials generally employed in residential and commercial construction. *Prerequisites: ARCH 1124 or MEET 1210*

ARCH 2644 Computer Aided Drawing N
4 Credits, 3 Class Hours, 2 Lab Hours
 This is an introduction to basic computer concepts and software applications for creating computer-aided drawings for architectural activities. The emphasis will be in AutoCAD software. *Prerequisites: DSPM 0800*

ARCH 2714 Mechanical Equipment N
4 Credits, 2 Class Hours, 2 Lab Hours
 This course presents the basic theories of design, installation, and operation principles of water supply, plumbing, sewage disposal, fire protection, ventilation, heating and cooling, and electrical requirements for buildings. Students will use computer spreadsheet software in the course. *Prerequisites: ARCH 1244*

ARCH 2735 Building Codes in the Design Process N
2 Credits, 1 Class Hour, 2 Lab Hours
 This course involves the study of building codes and zoning ordinances from the perspective of one designing a building or other structure. Building codes and zoning ordinances protect the lives and health of the public and positively impact the aesthetic aspects of the community.

ARCH 2736 Principles of Construction Specifications N
2 Credits, 1 Class Hour, 2 Lab Hours
 A fundamental understanding of written construction documents is essential for organizing, preparing, using, and interpreting written construction documents, including specifications used in the design and construction industry. This course includes a study of bidding requirements, contract requirements, and specifications. Also included are content, language, and format, used in specification writing and the role of material selection and evaluation in the specification writing process. *Prerequisite: ARCH 1124*

ARCH 2744 Architectural Design N
4 Credits, 3 Class Hours, 2 Lab Hours
 The study of architectural design is recommended to the technicians to encourage the understanding of the art of architecture, the elements of form and space, and the ordering of our built environment. The

architectural engineering technician needs the vocabulary of design in order to understand and transmit graphical information and instruction from the architect or engineer to the drawings.
Prerequisite: ARCH 1124

ARCH 2824 Construction Estimates N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course acquaints the student with the basic principles and current practices employed in estimating construction costs. The student prepares material and labor quantity surveys from working drawings and specifications for residential and commercial buildings. The principles of bid procedures and requirements of construction projects are introduced. Students will use computer-estimating software in the course. *Prerequisites: ARCH 1244*

ARCH 2844 Advanced AutoCAD N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course focuses on the continued development of AutoCAD skills, both basic as well as advanced. Some of the areas covered will include general computer system management, typical office standards for cad production consistency, customization techniques for optimizing efficiency, and overview of 3D modeling processes. *Prerequisites: ARCH 2644*

ARCH 2845 AutoCAD and GIS N
3 Credits, 2 Class Hours, 2 Lab Hours
 This will be a continuation course for AutoCAD users and Geographic Information Systems (GIS) users utilizing AutoCAD Map. The course will give students automated mapping and GIS skills to create and maintain maps for GIS purposes within AutoCAD software. Students will develop skills for presentation, query, and analysis of GIS. *Prerequisites: ARCH 2644*

ARCH 1901-1908 Technical Scholarship Program N
4 Credits, 300 Lab Hours
 Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. *Prerequisite: Permission of the Dean and Department Chair. May take as many as eight courses.*

ARCH 1931 Cooperative Education Work Experience I N
3 Credits, 225 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

ARCH 1941 Cooperative Education Work Experience I-A N
4 Credits, 300 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

ARCH 1932 Cooperative Education Work Experience II N
3 Credits, 225 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of the architectural field. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. *Prerequisite: ARCH 1931 OR ARCH 1941*

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

ARCH 1942 Cooperative Education Work Experience II-A N
4 Credits, 300 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of the architectural field. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements.
Prerequisite: ARCH 1931 OR ARCH 1941

ARCH 1933 Cooperative Education Work Experience III N
3 Credits, 225 Lab Hours
 The student acquires work experience in the architectural field under the supervision of an architect/engineer or senior technician. The student utilizes knowledge gained in any or all architectural courses to accomplish tasks as assigned by the architect/engineer.
Prerequisite: ARCH 1932 OR ARCH 1942

ARCH 1943 Cooperative Education Work Experience III-A N
4 Credits, 300 Lab Hours
 The student acquires work experience in the architectural field under the supervision of an architect/engineer or senior technician. The student utilizes knowledge gained in any or all architectural courses to accomplish tasks as assigned by the architect/engineer.
Prerequisite: ARCH 1932 OR ARCH 1942

Art

◆ART 1030 Art Appreciation T
3 Credits, 3 Class Hours
 Art Appreciation is a study of the visual arts designed to teach visual awareness by examining a variety of styles from various periods and cultures. Emphasis is placed on the development of a common visual language in order to assess, discuss, and enjoy works of visual arts from diverse media, cultures, and periods. This course fulfills the Fine Arts/Humanities requirement for the General Education core.
Prerequisite: DSPW 0800 and DSPR 0800 or equivalent

ART 1020 History of Architecture T
3 Credits, 3 Class Hours
 This course is designed to give the beginning student a solid basis in the fundamental terminology of architecture and the principles of architectural history. Emphasis is placed on the ability to discern between the styles and periods of architecture. By the end of the course, each student is expected to demonstrate a basic knowledge of the various styles of architecture, as well as a general knowledge of the history of architecture. *Prerequisite: DSPW 0800 and DSPR 0800 or equivalent*

ART 1070 Color Fundamentals T
3 Credits, 6 Studio Hours
 This course is a study of color perception, systems of color organization and studio exercises in color mixing, interaction, and color harmony.

ART 1080 Computer Graphics T
3 Credits, 3 Class Hours
 This course is an introduction to principles and theory of graphic design, using the computer as a medium for drawing and design. Experimentation with line, shape, texture, form, pattern, and composition.

ART 1110 Basic Design T
3 Credits, 6 Studio Hours
 This course is a study of the elements of design, line, texture, and form in space using a variety of materials and methods.

ART 1150 Basic Photography T
3 Credits, 6 Studio Hours
 This course is an introduction to the optics, physics, and chemistry of photography. Basic lessons in the theory and practice of photographing, developing, copying, and enlarging are presented.

ART 1170 Creative Photography T
3 Credits, 6 Studio Hours
 This course is a continuation of Basic Photography with further exploration of black and white photography as vehicle for personal expressive statement. Students should have their own 35mm camera.
Prerequisite: ART 1150 Basic Photography or permission of instructor

ART 1550 Drawing I T
3 Credits, 3 Class Hours
 This is a studio course for beginners with emphasis on developing the student's confidence in representing and expressing physical as well as mental images. Experience in line, shape, gesture, contour, proportion, perspective, and design will be offered. The instructors will give demonstrations of the various methods of drawing.

ART 1560 Drawing II T
3 Credits, 3 Class Hours
 This is a studio course for students interested in furthering their experiences in drawing. Emphasis will be on the human figure gesture, contour, volume, and structure.
Prerequisite: ART 1560 Drawing I or permission of instructor.

ART 1910 Painting I T
3 Credits, 3 Class Hours
 This is a studio course for beginners with emphasis on using materials, learning painting techniques and color mixing fundamentals, and preparing painting surface.

ART 1920 Painting II T
3 Credits, 3 Class Hours
 This is a continuation of Painting I. It involves more extensive exploration of form, color and subject relationships. Personal creativity stressed. *Prerequisite: ART 1910 Painting I or permission of instructor.*

ART 2101 History of World Art I T
3 Credits, 3 Class Hours
 History of World Art I is a study of the development of visual arts through an examination of examples from our historical past, from prehistoric times through the medieval period and up to the Renaissance. *Prerequisite: DSPW 0800 and DSPR 0800 or equivalent*

ART 2102 History of World Art II T
3 Credits, 3 Class Hours
 History of World Art II is a continuation of World Art I, with emphasis on the development of the visual arts from the Renaissance to the present. *Prerequisite: DSPW 0800 and DSPR 0800 or equivalent*

ART 2830 Individual Problems T
1-3 Credits
 This course is for art majors with advanced standing or high competence. It is designed to offer investigation in areas of a specialized nature, which are not offered in the curriculum. Course content will be decided between instructor and student. *Prerequisite: Permission of the instructor.*

Astronomy

◆ASTR 1030 Introduction to Astronomy (LEC) T
3 Credits, 3 Class Hours
 A survey course for non-science majors and/or for personal enrichment that provides a systematic understanding of the universe. Topics include basic principles and methods of astronomy, formation and features of the solar system, properties and evolution of stars, galaxies, cosmology and life in universe.

◆ASTR 1031 Introduction to Astronomy (LAB) T
1 Credit, 3 Lab Hours
 Laboratory experiments and exercises to accompany ASTR 1030 Introduction to Astronomy. Topics designed to enhance the understanding of the lectures and the textbook. *Prerequisite or co-requisite: Introduction to Astronomy ASTR 1030*

Automotive Service Technology

AUTO 1010 Automotive Engines I N
4 Credits, 3 Class Hours, 2 Lab Hours
 The operational theory and servicing of an internal combustion engine are explored. Emphasis is placed upon the proper use of hand tools, specialized tools, measuring instruments and test equipment.
Co-requisite: DSPM 0800 or equivalent

| | | | |
|---|---|--|---|
| AUTO 1020 Automotive Engines II 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the cooling and lubrication systems of the automotive engine. Included are water pumps, hoses, thermostats, radiators, friction oils, filters, and types of lubricating systems. Electronic and conventional ignition systems are covered. Utilization of standard test equipment is covered. <i>Prerequisite: AUTO 1010</i> <i>Co-requisite: AUTO 1110</i> | N | AUTO 2203 Auxiliary Electronic Systems 3 Credits, 2 Class Hours, 2 Lab Hours This course covers the myriad specialized electronics utilized for comfort heating and cooling, suspension leveling, light dimming and control, fiber optics, trip computer, and other auxiliary systems. <i>Prerequisite: AUTO 1110</i> | N |
| AUTO 1103 Organization and Administration of an Automotive Service Department 3 Credits, 2 Class Hours, 2 Lab Hours This course introduces shop operations, customer relations, service manuals, general servicing, flat rate manuals and safety and fire prevention. Automotive fasteners, measuring instruments and general shop tools are covered. Light duty service, minor repairs, tire and battery and wheel service are covered. | N | AUTO 2214 Automotive Microcomputers 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the operation of a typical automotive computer system and the techniques used to isolate and repair circuit malfunctions. Measurement principles applicable to sensor inputs are covered. Troubleshooting of input levels and schematic tracing is also covered. <i>Prerequisite: AUTO 1110</i> | N |
| AUTO 1110 Automotive Electrical and Electronics Systems I 4 Credits, 3 Class Hours, 2 Lab Hours This course explores the theory, function, and utilization of electrical and electronic devices in automotive control and display circuits. Included are batteries, wiring, diodes, transistors and other devices. Circuit design utilizing ICs, basic test equipment and the application and operation of basic electricity and electronics is covered. <i>Co-requisite: DSPM 0850 or equivalent</i> | N | AUTO 2243 Automobile Technician Training Certificate Review and New Model Update 3 Credits, 3 Class Hours This course is an extensive review designed to prepare the graduate to take the National Institute for Automotive Service Excellence Certification Tests. <i>Prerequisites: Advanced standing.</i> | N |
| AUTO 1120 Automotive Electrical and Electronic Systems II 4 Credit, 3 Class Hours, 2 Lab Hours This course covers the automotive electrical system including the battery, wiring, lights, generators, starters and voltage regulators. The use of electrical schematics and general-purpose test equipment is covered. <i>Prerequisite: AUTO 1110</i> | N | AUTO 2244 Automatic Transmissions 4 Credits, 3 Class Hours, 2 Lab Hours The theory, operation, and diagnosis of automatic transmissions and transaxles are covered. Diagnosis, maintenance, adjustment, and repair of automatics are studied. <i>Prerequisites: AUTO 1010, MATH 1130</i> | N |
| AUTO 1144 Brake Systems 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the various types of automotive hydraulic brake systems and the recommended service and repair procedures, including bleeding, flushing, and leak testing. Anti-lock brake systems (ABS) diagnosis and repair and general tire and wheel servicing are covered. <i>Co-requisite: AUTO 1110</i> | N | AUTO 1901-1908 Technical Scholarship Program 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair. May take as many as eight courses. These credits are normally added to the student's cumulative record and included in his/her QPA calculation.</i> | N |
| AUTO 1244 Heating and Air Conditioning Systems 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the fundamental operations of air conditioning and heating systems. Troubleshooting, servicing, evacuation and charging are covered. Emphasis is given to the troubleshooting and repair of electronic climate control systems. Refrigerant recovery, recycling, and handling are covered. <i>Prerequisite: AUTO 1110</i> | N | AUTO 1941 Cooperative Education Work Experience I 4 Credits, 300 Lab Hours The student participates in a directed work experience that supplements and reinforces the subjects covered in the semester. The specific competencies to be gained during the work experience are identified through coordination of the student's college program chairperson and the employing company. These competencies are related to the student's most recent instruction. | N |
| AUTO 2010 Automotive Engines III 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the purpose and function of the various fuel systems, the exhaust system, and the diverse emission control systems used on the automobile. Carburetors and fuel injection systems are discussed; emission control systems are studied in depth. The use of tools and equipment for proper diagnosis and repair is stressed. <i>Prerequisite: AUTO 1020</i> <i>Corequisite: MATH 1130</i> | N | AUTO 1942 Cooperative Education Work Experience II 4 Credits, 300 Lab Hours This course is a continuation of the Cooperative Education Work Experience. <i>Prerequisite: AUTO 1941</i> | N |
| AUTO 2020 Automotive Engines IV 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the engine, sensors, and computer as an integrated machine. Troubleshooting utilizing state-of-the-art test equipment is stressed. <i>Prerequisites: AUTO 1110, AUTO 2010, MATH 1130</i> | N | AUTO 1943 Cooperative Education Work Experience III 4 Credits, 300 Lab Hours This course is a continuation of the Cooperative Education Work Experience. <i>Prerequisite: AUTO 1942</i> | N |
| AUTO 2144 Manual Transmissions and Drive Trains 4 Credits, 3 Class Hours, 2 Lab Hours This course is a study of torque and gearing as applied to manual transmissions, manual transaxles, differentials, drive axles, clutches, and four-wheel drive components. Also covered are the diagnosis and repair of these units. <i>Co-requisites: AUTO 1010, MATH 1130</i> | N | AUTO 1944 Cooperative Education Work Experience IV 4 Credits, 300 Lab Hours This course is a continuation of the Cooperative Education Work Experience. <i>Prerequisite: AUTO 1943</i> | N |
| AUTO 2164 Suspension and Steering Systems 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the various types of suspension and steering systems, both manual and power-assist units. The recommended diagnosis and repair procedures for each system are covered. The principles and procedures of four-wheel alignment are also covered, along with advanced wheel and tire service and repair. <i>Co-requisites: AUTO 1144, MATH 1130</i> | N | AUTO 1945 Cooperative Education Work Experience V 4 Credits, 300 Lab Hours This course is a continuation of the Cooperative Education Work Experience. <i>Prerequisite: AUTO 1944</i> | N |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

Biology

BIOL 1000 Special Topics in Biology

1-3 Credits

A series of topics designed to attract students from all academic areas. Special topics titles are published in the class schedules as the topics are offered. Emphasis on appreciation of the biological sciences and their application to humanity.

◆BIOL 1010 Introduction to Biology I

4 Credits, 3 Class Hours, 3 Lab Hours

This is the first of a two-semester science course sequence for non-majors. An overview of the following is covered: chemistry science of life, cell structure and function, cell division, protein synthesis, metabolism, photosynthesis, and tissues. In addition several organ systems are examined.

◆BIOL 1020 Introduction to Biology II

4 Credits, 3 Class Hours, 3 Lab Hours

This is the second of a two-semester science course sequence for non-science majors. Students will study structure and function of organisms, diversity of life, ecology, and evolution. *Prerequisite: BIOL 1010, and NSCI 1001.*

◆BIOL 1110 General Biology I

4 Credits, 3 Class Hours, 3 Lab Hours

This is the first of a two-semester laboratory science course sequence for biological science majors. The following concepts are included: chemistry of life, cell structure and function, metabolism, cell reproduction, genetics, evolution, the chemical basis of heredity and protein synthesis. Through lecture, demonstration, and laboratory activities, the course will foster an understanding of and appreciation for the fundamentals of biology and the scientific process.

◆BIOL 1120 General Biology II

4 Credits, 3 Class Hours, 3 Lab Hours

This course is a continuation of General Biology I and provides information and laboratory techniques to help students understand the origin and diversity of life, and the structure, function, and ecology of organisms. *Prerequisite: BIOL 1110*

BIOL 1300 Introduction to Anatomy and Physiology

4 Credits, 3 Class Hours, 3 Lab Hours

This introductory course is designed to provide the basic foundation for successful comprehension of Human Anatomy and Physiology sequence of courses required for Health Sciences majors. Emphasis is placed upon the vocabulary, morphology, and functions of the systems of the human body. This course is recommended for all students lacking high school biology. This course is not credited toward majors in sciences or Allied Health.

BIOL 2010 Principles of Anatomy & Physiology I

4 Credits, 3 Class Hours, 3 Lab Hours

This is the first of a two-semester laboratory science sequence for students meeting Nursing and Allied Health curriculum requirements. Students will receive a brief review of cell biology. Organization of the human body, tissues, the structure and function of the integumentary, skeletal, muscular, nervous systems and special senses will be covered. Students whose biological science background is deficient, are recommended to take BIOL 1010, BIOL 1110 OR BIOL 1300.

BIOL 2020 Principles of Anatomy & Physiology II

4 Credits, 3 Class Hours, 3 Lab Hours

This is a continuation of principles of Anatomy and Physiology. Students will study the structure and function of the endocrine, reproductive, respiratory, cardiovascular, lymphatic, digestive, and urinary systems. Fluid, electrolyte and acid-base homeostasis are reviewed. *Prerequisite: BIOL 2010*

BIOL 1230 Microbiology

4 Credits, 3 Class Hours, 3 Lab Hours

This course provides a study of microorganisms with emphasis on their relationship to pathogenesis, disease prevention and principles of immunology. Included are basic laboratory techniques and procedures. *Prerequisite: BIOL 1010 or BIOL 1110 or BIOL 2010*

Chemical Engineering

CHET 1114 Principles of Chemical Processes

4 Credits, 3 Class Hours, 2 Lab Hours

This course covers mass and energy balances under steady state conditions. Topics include measurement, behavior of gases, steady state material balances, energies including thermophysical and thermochemical relations, and application of energy balances. An introduction to Hysys computer process simulation is included. *Prerequisites: CHEM 1110 and qualified to enroll in MATH*

CHET 2110 Unit Operations I

4 Credits, 3 Class Hours, 2 Lab Hours

This course is a study of chemical processing equipment, heat transfer, fluid flow, instrumentation, and evaporation with emphasis on the needs of the chemical processing industry. A minimum of three written formal and/or informal laboratory reports must be prepared. Oral reports are required, graded and included in the final grade. Applications of Hysys and FLO-SERIES computer software are included.

Prerequisites: CHET 1114, MATH 1740, or approval of the instructor

CHET 2120 Unit Operations II

4 Credits, 3 Class Hours, 2 Lab Hours

Staged operations including distillation, humidification, dehumidification, absorption, and extraction are studied. Physical operations such as filtration and drying are included along with an introduction to economics. Application of instrumentation is covered along with simulated maintenance and repair of process equipment. Written laboratory reports must include at least one formal report. Oral reports are required, graded, and included in the final grade. Applications of Hysys computer software are included. *Prerequisite: CHET 2110 or approval of the instructor*

CHET 2313 Industrial Quantitative Analysis

3 Credits, 2 Class Hours, 3 Lab Hours

This course is a study of quantitative lab techniques, stoichiometry, acid-base titrations, statistical treatment of data including precision and accuracy in test methods, precipitation titrations, complex ion titrations, redox titrations, and gravimetric methods of analysis. A detailed notebook must be maintained in this course. *Prerequisite: CHEM 1120*

CHET 2323 Industrial Instrumental Analysis

3 Credits, 2 Class Hours, 3 Lab Hours

Topics include theory, application, operation, and various means of calibration of standard analytical instruments including UV-visible, infrared, and atomic absorption spectrophotometers, as well as gas and liquid chromatographs. *Prerequisites: CHEM 1120*

CHET 1901-1908 Technical Scholarship Program

4 Credits, 300 Lab Hours

Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. *Prerequisite: Permission of the Dean and Department Chair. May take as many as eight courses.*

CHET 1931 Cooperative Education Work Experience I

3 Credits, 225 Laboratory Hours

From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

CHET 1941 Cooperative Education Work Experience I-A

4 Credits, 300 Lab Hours

From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

CHET 1932 Cooperative Education Work Experience II

3 Credits, 225 Lab Hours

In this course the student receives supervised work experience in any of the many facets of chemical engineering technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. *Prerequisite: CHET 1931 or CHET 1941*

CHET 1942 Cooperative Education Work Experience II-A N
4 Credits, 300 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of chemical engineering technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. *Prerequisite: CHET 1931 or CHET 1941*

CHET 1933 Cooperative Education Work Experience III N
3 Credits, 225 Lab Hours
 The student acquires work experience in chemical engineering technology under the supervision of an engineer or senior technician. The student utilizes the knowledge gained in any or all Chemical Engineering Technology courses to accomplish tasks as assigned by the engineer. *Prerequisite: CHET 1932 or CHET 1942*

CHET 1943 Cooperative Education Work Experience III-A N
4 Credits, 300 Lab Hours
 The student acquires work experience in chemical engineering technology under the supervision of an engineer or senior technician. The student utilizes the knowledge gained in any or all Chemical Engineering Technology courses to accomplish tasks as assigned by the engineer. *Prerequisite: CHET 1932 or CHET 1942*

Chemistry

CHEM 1000 Chemistry for the Health Sciences N
4 Credits, 3 lecture hours, 3 Lab hours
 This is a one semester course designed to study the elementary concepts of inorganic, organic, and biochemistry. The course is not intended for science, engineering, or engineering technology majors. The course studies in classification of matter, measurements, atomic theory, periodic table, nuclear processes, physical states of matter, solution chemistry, hydrocarbons, organic functional groups, carbohydrates, lipids, proteins, nucleic acids, enzymes, and body fluids. *Prerequisite: Open admission*

◆**CHEM 1010 Introduction to Chemistry I** T
4 Credits, 3 Lecture Hours, 2 Lab Hours
 The first of a two-semester course sequence designed for nursing majors, allied health and other paramedical students. This course may be used as a preparatory course for CHEM 1110. This course is NOT intended for science, engineering, or engineering technology majors. The course covers basic concepts of inorganic chemistry with focus on health sciences. The impact of chemistry on society is emphasized along with writing skills. *Prerequisites: Demonstrated proficiency in elementary algebra confirmed by placement test scores or completion of appropriate college math scores.*

◆**CHEM 1020 Introduction to Chemistry II** T
4 Credits, 3 Lecture Hours, 2 Lab Hours
 This is a continuation of CHEM 1010, Introduction to Chemistry I. The course is designed primarily for nursing majors, allied health, and other paramedical students. This course is NOT intended for science, engineering, or engineering technology majors. The course emphasizes elementary organic chemistry and biochemistry. *Prerequisites: CHEM 1010 or equivalent*

CHEM 1050 Allied Health Instrumentation T
4 Credit hours, 3 lecture hours, 3 Lab hours
 This is a one-semester laboratory course designed to give allied health and science-oriented students experience in the principles of electronic instrumentation and analytical techniques used in clinical and industrial laboratories. The course is not intended for science, engineering, or engineering technology majors. *Prerequisite: CHEM 1010- Introduction to College Chemistry I or CHEM 1110 – General Chemistry I*

◆**CHEM 1110 General Chemistry I** T
4 Credits, 3 Lecture Hours, 3 Laboratory Hours
 This is the first course in a two-semester sequence for science majors, pre-professional students and pre-engineering students. The course covers fundamental concepts including measurements, language and stoichiometry, atomic and molecular structure, ionic and covalent bonding, states of matter, the gas laws, solutions, and thermochemistry. This course meets prerequisites for further study in chemistry in baccalaureate programs. *Prerequisite: Demonstrated mastery of high school algebra and high school chemistry or equivalent college course(s) confirmed by placement exams, ACT scores or previous post secondary enrollment.*

◆**CHEM 1120 General Chemistry II** T
4 Credits, 3 Class Hours, 3 Lab Hours This is a continuation of CHEM 1110—General of Chemistry I. This course covers thermodynamics, chemical kinetics, ionic and molecular equilibrium, acids and bases, electrochemistry including oxidation-reduction principles, nuclear chemistry, and environmental chemistry. The course meets prerequisites for further study in chemistry in baccalaureate programs. *Prerequisite: CHEM 1110*

◆**CHEM 2010 Gen. Organic Chemistry I LEC** T
3 Credits, 3 Class Hours
 This is the first of a two-semester science course for science majors and pre-professional students. The systematic study of the fundamental principles of organic chemistry with interpretation of structure and properties based upon modern atomic and molecular theory. Topics include aliphatic hydrocarbons, stereochemistry, nucleophilic substitutions and eliminations, spectroscopy, and aromatic hydrocarbons. *Prerequisites: CHEM 1120 3 hrs lecture, 3 hrs laboratory.*

◆**CHEM 2011 Gen. Organic Chemistry I LAB** T
1 Credit, 3 Lab Hours
 Application of laboratory techniques to the synthesis, separation, and identification of organic compounds. *Prerequisite: CHEM 1120 General Chemistry II. Prerequisite or Co-requisite: CHEM 2010 General Organic Chemistry I.*

◆**CHEM 2020 Gen. Organic Chemistry II LEC** T
3 Credits, 3 Class Hours
 This is a continuation of General Organic Chemistry I. Emphasis on functional derivatives of aliphatic and aromatic hydrocarbons is emphasized. *Prerequisites: CHEM 2010*

◆**CHEM 2021 Gen. Organic Chemistry II LAB** T
1 Credit, 3 Lab Hours
 Continuation of General Organic Chemistry laboratory I. Emphasis on synthesis and class reactions of organic compounds. *Prerequisite: CHEM 2010 General Organic Chemistry I and CHEM 2011 General Organic Chemistry Laboratory I. Co-requisite: CHEM 2020 General Organic Chemistry II.*

Civil/Construction Engineering Technology

CCET 1010 Surveying I N
4 Credits, 2 Class Hours, 4 Laboratory Hours
 This course covers the fundamentals of plane surveying, with practice in the use of the tape, level, and transit in making horizontal and vertical measurements. Fieldwork includes boundary surveying, topographic, profile and benchmark leveling, with procedures of keeping field notes and note reduction. Construction layout is covered. *Co-requisite: MATH 1740*

CCET 1134 Civil Drafting N
4 Credits, 2 Class Hours, 4 Lab Hours
 This course introduces the student to drafting practices pertinent to the field of civil engineering technology. Work is done on topographic drawings, land layout, utilities, plan and profile, and earthwork cross-sections, including calculations. Construction and fabrication drawings are covered. Drawings are done using computer software. *Prerequisites: MEET 1210, CCET 1010*

CCET 2123 Construction Planning, Equipment and Methods N
3 Credits, 2 Class Hours, 3 Lab Hours
 This course introduces the student to fundamentals in the planning and selection of equipment and methods for various construction operations. *Prerequisite: ARCH 1244*

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | |
|--|--|
| <p>CCET 2020 Surveying II N 4 Credits, 2 Class Hours, 4 Lab Hours The student studies various types of route locations and surveys in this course. Both classroom and fieldwork in horizontal and vertical curves, and slope-staking are covered. The student has hands-on use of theodolites and electronic distance-measuring equipment. Computer computations are introduced to the student, including traverse closure by the DMD method. The student is also introduced to Global Positioning System (GPS) equipment and software. <i>Prerequisite: CCET 1010</i></p> | <p>CCET 1933 Cooperative Education Work Experience III N 3 Credits, 225 Lab Hours The student acquires work experience in the civil/construction engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Civil/Construction Engineering Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: CCET 1932 or CCET 1942</i></p> |
| <p>CCET 2203 Strength of Materials N 3 Credits, 2 Class Hours, 3 Lab Hours In this course, the student studies the following topics: stress and strain, direct and shearing stresses, torsion, bending, bolted and riveted connections, basic design of timber and steel beams and timber and steel columns, beam deflections, and statically indeterminate beams. <i>Prerequisite: MEET 1154</i></p> | <p>CCET 1943 Cooperative Education Work Experience III-A N 4 Credits, 300 Lab Hours The student acquires work experience in the civil/construction engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Civil/Construction Engineering Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: CCET 1932 or CCET 1942</i></p> |
| <h2>Computer Engineering Technology</h2> | |
| <p>CCET 2614 Structural Design N 4 Credits, 3 Class Hours, 2 Lab Hours This course introduces the student to design practices applicable to simple steel and timber members, including connections and reinforced concrete beams, slabs, and columns. <i>Prerequisite: CCET 2203</i></p> | <p>CPET 1104 Microcomputer Applications for Technicians N 4 Credits, 3 Class Hours, 2 Lab Hours This course introduces the student to the hardware components and operation of a microcomputer. Additionally, the student studies various application programs that are essential in engineering technology course work, as well as useful in an engineering technician's job tasks. Windows-based applications include word processing, spreadsheet, and electric circuits' simulation. An introduction to the C++ programming language is also included in this course. <i>Co-requisite: DSPM 0800</i></p> |
| <p>CCET 2623 Concrete Technology N 3 Credits, 2 Class Hours, 3 Lab Hours This course introduces the student to fundamentals of mix design and the inspection concerned with the manufacture and testing of concrete as a construction material. The following topics are covered: basic properties of cement and the relationships between cement, water and aggregates; properties desired in plastic and hardened concrete; proportioning mixes; sampling, and field and lab testing. <i>Prerequisite: MATH 1740</i></p> | <p>CPET 1124 Digital Circuits N 4 Credits, 3 Class Hours, 2 Lab Hours This course presents procedures for analyzing and designing digital circuits. Topics included are number systems, Boolean algebra, Karnaugh mapping, combinational logic, arithmetic circuits, flip-flops, counters, and sequential circuits. In the laboratory, students verify digital principles by constructing and testing various digital circuits. <i>Prerequisite: ELET 1101</i></p> |
| <p>CCET 2633 Soils and Foundations N 3 Credits, 2 Class Hours, 3 Lab Hours This course acquaints the student with the importance of soils as a construction material. The student performs basic laboratory tests. The design of footings is covered.</p> | <p>CPET 1144 C++ for Technicians N 4 Credits, 3 Class Hours, 2 Lab Hours This introductory course in the C++ programming language begins with an explanation of a general program development procedure using an Integrated Development Environment (IDE). Some specific C++ language elements covered include looping statements, functions, arrays, input/output operations, and classes. Emphasis is placed on effective program development practices, including flowcharting and debugging techniques. <i>Prerequisite: CPET 1104 Co-requisite: MATH 1740</i></p> |
| <p>CCET 1901-1908 Technical Scholarship Program N 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair. May take as many as eight courses.</i></p> | <p>CPET 2114 Microprocessor Applications N 4 Credits, 3 Class Hours, 2 Lab Hours Students use a single-board microcomputer and a PC to investigate the organization and operation of a microprocessor and various microcomputer system components. This course also includes an introduction to Graphical User Interfaces. Students interface application hardware to the computer and write their own driver software. Programs are written in assembly language and C++. <i>Prerequisite: CPET 1124 Corequisite: CPET 1144</i></p> |
| <p>CCET 1931 Cooperative Education Work Experience I N 3 Credits, 225 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.</p> | <p>CPET 2214 Microcontroller Systems Design N 4 Credits, 3 Class Hours, 2 Lab Hours This course presents the essential elements required to design and analyze microcontroller-based systems (embedded systems). Motorola and Intel microcontroller chips are covered. Students use a personal computer as a single-user microcontroller development station when designing their hardware/software projects. All students are required to construct a working microcontroller-based system and develop software to control the system. Student software is written in assembly language and C. <i>Prerequisite: CPET 2114</i></p> |
| <p>CCET 1941 Cooperative Education Work Experience I-A N 4 Credits, 300 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.</p> | <p>CPET 2314 Digital Communication Systems N 4 Credits, 3 Class Hours, 2 Lab Hours Data communications involving the transmission of digital information is covered in this course. Topics included are the telephone system, digital codes, transmission protocols, error detection and correction schemes, RS232 and other data transmission interfaces, modems, and network communications. Laboratory assignments provide experience with circuits used in data and network communications. Technical writing is stressed in this course with the requirement of written reports. <i>Prerequisite: CPET 1124 Co-requisite: CPET 1144</i></p> |
| <p>CCET 1932 Cooperative Education Work Experience II N 3 Credits, 225 Lab Hours In this course the student receives supervised work experience in any of the many facets of civil/construction engineering technology. The student performs technician-level work, applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: CCET 1931 or CCET 1942</i></p> | |
| <p>CCET 1942 Cooperative Education Work Experience II-A N 4 Credits, 300 Lab Hours In this course the student receives supervised work experience in any of the many facets of civil/construction engineering technology. The student performs technician-level work, applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: CCET 1931 or CCET 1941</i></p> | |

| | |
|---|---|
| CPET 2324 Computer Networks and Systems 4 Credits, 3 Class Hours, 2 Lab Hours | N |
| This course covers the technical aspects of computer networks. Course topics include the OSI Reference Model, the hardware and software components required to implement some of the IEEE 802 local area network (LAN) protocols, and TCP/IP. Laboratory assignments make use of network test equipment and give the student experience with Windows peer-to-peer and client/server networking. <i>Prerequisite: CPET 2314</i> | |
| CPET 2804 Special Topics I 4 Credits, 3 Class Hours, 2 Laboratory Hours | N |
| General concepts in digital systems, hardware, and software not offered in other courses in the program are presented here. | |
| CPET 2824 Special Topics II 4 Credits, 3 Class Hours, 2 Laboratory Hours | N |
| General concepts in digital systems, hardware, and software not offered in other courses in the program are presented here. | |
| CPET 1901-1908 Technical Scholarship Program 4 Credits, 300 Laboratory Hours | N |
| Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses</i> | |
| CPET 1931 Cooperative Education Work Experience I 3 Credits, 225 Laboratory Hours | N |
| From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. | |
| CPET 1941 Cooperative Education Work Experience I-A 4 Credits, 300 Lab Hours | N |
| From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. | |
| CPET 1932 Cooperative Education Work Experience II 3 Credits, 225 Laboratory Hours | N |
| In this course the student receives supervised work experience in any of the many facets of the computer engineering technology field. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: CPET 1931 or CPET 1941</i> | |
| CPET 1942 Cooperative Education Work Experience II-A 4 Credits, 300 Lab Hours | N |
| In this course the student receives supervised work experience in any of the many facets of the computer engineering technology field. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: CPET 1931 or CPET 1941</i> | |
| CPET 1933 Cooperative Education Work Experience III 3 Credits, 225 Laboratory Hours | N |
| The student acquires work experience in the computer engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Computer Engineering Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: CPET 1932 or CPET 1942</i> | |
| CPET 1944 Cooperative Education Work Experience III-A 4 Credits, 300 Lab Hours | N |
| The student acquires work experience in the computer engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Computer Engineering Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: CPET 1932 or CPET 1942</i> | |

Computer Literacy

| | |
|--|---|
| COMP 1010 Computer Literacy 3 Credits, 3 Class Hours | N |
| This is a first course in computer science. Introduction to uses, history, ethics, hardware, software, languages, networks and the Internet. Also, applications in word processing, spreadsheet and database are developed through laboratory work. <i>Prerequisite: DSPM 0700 Basic Mathematics or proficiency on the placement examination. Satisfies computer literacy requirement.</i> | |

Court Reporting

| | |
|---|---|
| CORT 1001 Legal Terminology 3 Credits, 3 Class Hours | N |
| This course is designed to familiarize the student with the meaning and spelling of Latin and English legal terms that legal professionals encounter. | |
| CORT 1010 Machine Shorthand Theory I 3 Credits, 2 Class Hours, 2 Lab Hours | N |
| This course covers the introduction and mastery of basic stenotype concepts for all one-syllable words and simple two-syllable words written by sound, beginning number writing, all marks of punctuation, one- and two-letter brief forms, two- and three-letter phrases, reading from stenotype notes, and dictation at 40 words per minute. Students begin the development of recording and transcribing live dictation with the use of computer-aided transcription (real-time translation). Mastery of the beginning principles of the touch method are emphasized as well as an understanding of the court reporting profession. <i>Prerequisite: Student must obtain machine and other equipment (paper, cassette recorder and cassette tapes) to be prepared to work on first night of class.</i> | |
| CORT 1020 Machine Shorthand Theory II 3 Credits, 2 Class Hours, 2 Lab Hours | N |
| This course covers the introduction and mastery of advanced stenotype concepts for word beginnings and word endings (words of two or more syllables), advanced number concepts, homonyms, reading from stenotype notes, dictation at 40–60 words per minute, and introduction to beginning speed building principles. <i>Prerequisites: CORT 1001, CORT 1010</i> | |
| CORT 1025 Machine Shorthand Theory III 3 Credits, 2 Class Hours, 2 Lab Hours | N |
| This course covers the introduction and mastery of advanced stenotype concepts for word beginnings and word endings, advanced number concepts, reading from stenotype notes, dictation at 60–100 words per minute, and introduction to beginning speed building principles. <i>Prerequisite: CORT 1020</i> | |
| CORT 2010 Elementary Speed Building 3 Credits, 2 Class Hours, 2 Lab Hours | N |
| Dictation practice and testing for speeds 100–140 words per minute are included in this course. The student must pass three tests of Q & A, Jury Charge (Legal Opinion) and Literary at each speed (100–140) with 95 percent accuracy (five-minute tests). Computer-aided transcription systems word processing systems, and video applications for the court reporter are also covered in this course. <i>Prerequisites: CORT 1001, CORT 1025 Co-requisite: OFAD 1510</i> | |
| CORT 2015 Computer-Aided Transcription 3 Credits, 3 Class Hours | N |
| Computer-aided transcription systems, word processing systems, and video application for the court reporter are covered in this course. <i>Co-requisite: CORT 2010</i> | |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

CORT 2022 Intermediate Speed-Building N
4 Credits, 2 Class Hours, 4 Lab Hours
 Dictation practice and testing for speeds 140–180 words per minute are included in this course. The student must pass three tests of Q & A, Jury Charge (Legal Opinion) and Literary at each speed (140–180) with 95 percent accuracy (five-minute tests). Computer-aided transcription systems, word processing systems, and video applications for the court reporter are also covered in this course. *Prerequisites: Typing speed of 60 words per minute, CORT 2010*

CORT 2025 Court Reporting Grammar and Punctuation N
3 Credits, 3 Class Hours
 This course contains specialized English topics as they apply to the reporting profession. Grammar for court reporters emphasizes parts of speech and parts of structure of sentences. This course lays an essential foundation for study of the sophisticated punctuation rules that follow, which enable the reporter to produce verbatim transcripts with emphasis on proofreading techniques. *Co-requisites: CORT 1020, ENGL 1010*

CORT 2032 Advanced Speed Building N
4 Credits, 2 Class Hours, 4 Lab Hours
 This course includes dictation practice and testing for speeds 180–225 words per minute. The student must pass three tests of Q & A at each speed (180–200–225), Jury Charge (Legal Opinion) at each speed (180–200), and Literary at 180 with 95 percent accuracy (all five-minute tests). Computer-aided transcription systems, word processing systems, and video applications for the court reporter are also covered in this course. *Co-requisites: CORT 2022, CORT 2025*

CORT 2110 Court Reporting Applications I N
2 Credits, 2 Class Hours
 The student receives instruction into forms and formats for different reporting situations; reporting interrogatories, statements, depositions, court proceedings; set up of court reporter's office and records kept for both official and freelance reporting; developing a reference library; writing legal cites, forms of address, handling read backs; handling exhibits; testifying from past proceedings; notary depositions, preliminary hearings, motions, pretrial hearings, coroner inquests, trials, petitions, conventions, and meetings. *Co-requisites: CORT 2025*

CORT 2120 Court Reporting Applications II N
2 Credits, 2 Class Hours
 This course builds on the rules and concepts learned in CORT 2110. Applying the information contained in CORT 2110, students will engage in simulated and mock depositions, trials and conference reporting. Students will learn to utilize real-time writing techniques used in educational reporting and be exposed to the skills necessary for the closed-captioning market. *Prerequisite: CORT 2010, CORT 2110*
Co-requisite: CORT 2022

CORT 2050 Professional Certification Review N
2 Credits, 2 Hours
 Students receive intense review in preparation for the court reporting exam given in May and November. *Prerequisites: CORT 2010*
Co-requisites: CORT 2022, CORT 2110

CORT 2070 Court Reporting Internship N
3 Credits, 3 Hours
 The student practices the skills needed to be a court reporter (freelance, official, closed-captioned, conference). More than 60 clock hours of practical experience, on an individual basis, in the courtroom or in a deposition situation under the supervision of a working court reporter are required. From this actual experience, the student submits an acceptable 50-page transcript. This internship commences after the student is writing 200 words per minute. *Prerequisites: CORT 2022, CORT 2025, LEGL 2030*

NOTE GRADUATION REQUIREMENT: Students in Court Reporting must pass three 225 words per minute Q & A tests, three 200 words per minute Jury Charge tests, and three 180 words per minute Literary tests with 95 percent accuracy; achieve typing speed of 60 words per minute; and complete 60 plus hours of internship reporting (CORT 2070).

Criminal Justice Studies

CJST 1010 Introduction to Criminal Justice T
3 Credits, 3 Class Hours
 This course presents an overview of the American criminal justice system tracing its historical and legal development including the role of law enforcement, courts, and corrections in national, state, and local application.

CJST 1020 Criminal Investigation T
3 Credits, 3 Class Hours
 This course continues the basic fundamentals of criminal investigation. It includes the practical aspect of exploring preliminary investigative techniques; identifying, collecting, and processing physical evidence, and studying the elements of specific offense.

CJST 1050 Contemporary Issues T
3 Credits, 3 Class Hours
 This course is a review and in-depth examination of current issues and trends concerning the criminal justice process with emphasis on problems impacting local criminal justice agencies and personnel.

CJST 1060 Psychological Aspects of Criminal Behavior T
3 Credits, 3 Class Hours
 This course is a study of deviant behavior with emphasis on dealing with the mentally disturbed, sexual deviates, and drug addicts. It examines the role of the psychologist in criminal justice cases.

CJST 1080 Standards and Principles in Criminal Justice T
3 Credits, 3 Class Hours
 This course is a survey of ethics and principles within various criminal justice organizations. The course will examine basic ethical, legal, and moral questions relating to crime and justice, the role of police, the role of the prosecutors, the role of the judges, and the role of victims and their participation in the legal process.

CJST 1160 Juvenile Justice T
3 Credits, 3 Class Hours
 This course will cover juvenile problems and causes, court functions, corrective measures, preventive techniques along with responsibilities, capabilities, programs, and techniques of court personnel in delinquency prevention and local, state, and federal juvenile statute laws.

CJST 1300 American Legal System T
3 Credits, 3 Class Hours
 This course reviews basic laws governing the maintenance of a democratic society, and how criminal, constitutional, consumer, environmental, housing and family laws meet the challenge of American society.

CJST 1320 Introduction to Law and the Legal Systems T
3 Credits, 3 Class Hours
 This course is a comprehensive overview of the American legal system to provide the student with a basic knowledge about the law, an examination of what the law entails, the judicial system, judicial decision-making and remedies, civil procedures, contracts, and property law.

CJST 1910 Criminal Justice Field Experience I T
3 Credits, 1 Class Hour, 2 Hours Lab
 Students are assigned to a criminal justice setting requiring 135 hours with the agency and 10 hours classroom and/or individual instruction. Reports and evaluations are required. This course is open to preservice students with 12 credit hours at STCC with at least 6 hours in Criminal Justice Studies. In-service students may apply for credit after completing 12 credit hours at STCC and employer certification showing one year of continuous criminal justice employment.

CJST 1920 Criminal Justice Field Experience II T
3 Credits, 1 Class Hour, 2 hrs Lab
 Students are assigned to a work project/site consisting of 135 hours casework/program development and 10 hours classroom activity of independent study. Reports and evaluations are required. This course is open to pre-service students with 21 credit hours at STCC with at least 9 hours in Criminal Justice. In-service students may apply for credit after completing 21 credit hours at STCC and employer certification showing three years of continuous criminal justice employment.

CJST 2000 Criminology
3 Credits, 3 Class Hours
 This course is a systematic study of crime, criminals and the criminal justice system. It explores the fundamental elements of criminology through a study of the causation and criminal behavior theories and examines the relevant activities of the criminal justice system.
Prerequisite: CJST 1010 Introduction to Criminal Justice

CJST 2040 Investigative Report
3 Credits, 3 Class Hours
 This course focuses on preparing analytical investigative reports and explores techniques of organizing, structuring, and investigating the report to comply with proper guidelines.
Prerequisite: ENGL 1010 English I

CJST 2080 Drug Abuse and Law
3 Credits, 3 Class Hours
 This course is a socio-legal guide to the drug abuse phenomenon and examines the psycho-social dynamics and pharmacological risks leading to psychoactive drug misuse as well as law enforcement and alternative intervention techniques in sentencing the drug offender.

CJST 2210 Criminal Law
3 Credits, 3 Class Hours
 This is a study of criminal law legal principles, purposes and rules and includes specific offenses, incomplete crimes, accomplices, accessories and criminal liability defenses and covers classifications of crimes, criminal intent, and corpus delicti.

CJST 2410 Introduction to Criminal Justice Research
3 Credits, 3 Class Hours
 This introductory course in Criminal Justice Research provides the student with opportunities for active learning through the use of the computer to examine and compile statistical information relating to criminal justice and to examine the nature of crime in society. Restricted to students enrolled in the Honors program.

CJST 2420 Advanced Criminology: The City As A Text
3 Credits, 3 Class Hours
 This Honors level course in Applied Criminological Research provides the student with the opportunity for active learning through the examination of statistical data relating to criminal justice in the Memphis, Shelby County community. Restricted to students enrolled in the Honors program.

CJST 2990 Special Topics in Criminal Justice
1-3 Credits
 This course addresses specific topics to meet the needs of criminal justice personnel.

Criminal Justice Studies – Corrections

CJSC 1040 Introduction to Corrections
3 Credits, 3 Class Hours
 This course explores the purpose of corrections and how correctional operations relate to our system of governing and sentencing. Descriptions and analysis of the philosophy, basic techniques, and current trends in local and national correctional programs.

CJSC 1180 Constitutional Rights of Prisoners/Institutional Procedures
3 Credits, 3 Class Hours
 This course is an analysis of prisoners' rights in light of new Supreme Court decisions. An explanation of proper procedures recently developed to comply with these decisions for the protection of the agency and the individual correctional officers is discussed.

CJSC 1500 Correctional Counseling
3 Credits, 3 Class Hours
 This course will define the goals of counseling and review the current theories recognized by behavioral scientists. Many jails and prisons have organized counseling services for their jail/prison population. A counseling program benefits inmates and institutional employees. This course is an effort to define the role and scope of the institutional counselor as well as highlight their role part of the correctional duties.

CJSC 1600 Correctional Supervision and Management
3 Credits, 3 Class Hours
 Emphasis is on classic supervision and management theories. Students become familiar with recognized methods of dealing with others in accountability situations. Issues such as policymaking, correctional law, employee rights, professionalism, ethics, grievance, mechanisms and routine custody procedures are studied.

CJSP 1100 Criminal Procedure
3 Credits, 3 Class Hours
 The course explores guidelines for the legal aspects of the law enforcement officer's duties and focuses on an understanding of the Constitution and the reasons behind the guidelines. The student will be provided with a broader and more sophisticated understanding of criminal procedure.

CJSP 1200 Judicial Process and Administration
3 Credits, 3 Class Hours
 The course acquaints the student with the judicial system's processes. The student will acquire knowledge of preliminary courtroom procedures, motions, administrative procedures, courtroom testimony and local judicial systems procedures.

CJSP 1300 Police in America
3 Credits, 3 Class Hours
 A comprehensive introduction to the basic features of policing in the United States. Descriptive in nature, it acquaints students with the current state of knowledge about police organizations, police work, police officers, and the problems facing police today; designed as an introductory course to police work.

CJSP 2100 Police and Community Relations
3 Credits, 3 Class Hours
 This course studies relationship analysis between various community segments and law enforcement. The course stimulates individual expression through discussion, reading, films, simulations, and encounter dramatizations.

Developmental Studies

DSPM 0700 Basic Mathematics
3 Credits, 3 Class Hours
 This course covers basic mathematical topics of whole numbers, fractions, decimals, signed numbers, powers and roots, percents, proportions, systems of measurement, elementary geometry, graphical interpretation, elementary statistical concepts, estimation and problem-solving. *Prerequisite: Appropriate score on the placement exam*

DSPM 0800 Elementary Algebra
4 Credits, 4 Class Hours
 This course covers the fundamentals of elementary algebra: operations with integers, solution of first-degree equations, ratio and proportion, applied problems, evaluation and simplification of expressions and formulas, roots, radicals, complex numbers, operations on polynomials and factoring. *Prerequisite: DSPM/0700 or an appropriate score on the placement exam*

DSPM 0850 Intermediate Algebra
4 Credits, 4 Class Hours
 This course covers the fundamentals of intermediate algebra: rational expressions, quadratic equations, inequalities and absolute value, graphing linear and quadratic equations, graphing inequalities, relations and function, systems of equations, exponential and logarithmic functions. *Prerequisite: DSPM0800 or an appropriate score on the placement exam*

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|---|---|---|---|
| <p>DSPM 0880 Elementary Algebra/Intermediate Algebra 8 Credits, 8 Class Hours This course is a rigorous, fast-paced review of elementary and intermediate algebra, including signed numbers, linear equations, powers, square roots and radicals, formula evaluation and rearrangement, fractional exponents, products and factoring, quadratic equations, graphs of equations and inequalities, systems of equations, and other algebraic topics. It is intended for students who are highly motivated and have ample time to concentrate daily on mathematics. <i>Prerequisites: DSPM/0700 or COMPASS placement in DSPM/0800 and approval of Developmental Studies Program chairperson. Satisfactory completion of high school Algebra II is recommended.</i></p> | T | <p>DIET 1310 Principles of Nutrition 3 Credits, 3 Class Hours This course is an introduction to nutrition, including nutritive value of foods, factors influencing body food requirements, their importance in promoting health and preventing disease and the body processes, and their relation to total nutrition. Nutritional requirements throughout the human life cycle, with attention to various food cultures and application of nutrition requirements to the basic food groups, are discussed.</p> | T |
| <p>DSPR 0700 Basic Reading 4 Credits, 4 Class Hours Basic Reading is a course that provides a foundation in reading comprehension, critical reading, and vocabulary development. <i>Prerequisite: appropriate score on the placement test.</i></p> | T | <p>DIET 1330 Medical Nutrition Therapy 3 Credits, 3 Class Hours This course is a study of medical nutrition principles, with focus on the human body, various medical and surgical problems, and the dietary modifications necessary for unusual and abnormal cases. The student gains practice in writing routine hospital diets, planning and calculating special diet prescriptions, and analyzing the procedures, organization and functions of a hospital or other healthcare facility. <i>Prerequisite: DIET 1310 Principles of Nutrition or permission of instructor</i></p> | T |
| <p>DSPR 0800 Developmental Reading 4 Credits, 4 Class Hours Developmental Reading is a course designed to improve a student's overall reading skills to college level. Emphasis is placed on comprehension development, including literal, inferential and critical reading, along with vocabulary enhancement. <i>Prerequisite: DSPR/0700 or appropriate score on placement test</i></p> | T | <p>DIET 1350 Nutrition For Child Care 2 Credits, 2 Class Hours This course covers the basic principles of nutrition and the nutritive value of food, with emphasis placed on children's nutritional needs, including the influence diet has on physical and mental development. Attention is given to the practical problems faced in assisting children to develop better attitudes and dietary habits.</p> | N |
| <p>DSPS 0800 Study Skills 3 Credits, 3 Class Hours This course acquaints students with study skills and prepares them to integrate traditional study skills with college content areas. Topics include time management, textbook studying, preparing for and taking exams, research paper/report writing, note-taking, using the library, career exploration, and learning about college resources.</p> | T | <p>DIET 1360 Community Nutrition 3 Credits, 3 Class Hours Nutritional practices of various ethnic, age and socio-economic groups and study of the community and agencies concerned with meeting the needs of these groups. <i>Prerequisites: DIET 1310 Principles of Nutrition Concurrent enrollment in DIET 2920, Nutritional Clinical II</i></p> | T |
| <p>DSPW 0700 Basic Writing 4 Credits, 4 Class Hours This is a course in paragraph writing. Topics include paragraph development, grammar, usage, spelling, punctuation, and other mechanics of English. <i>Prerequisite: appropriate placement test score.</i></p> | T | <p>DIET 1370 Advanced Nutritional Care 3 Credits, 3 Class Hours This course presents a study of the nutrients and their utilization in the body. Nutrition care for diseases and health conditions, which include stress conditions, liver and kidney disease, eating disorders, mental health and disease of infancy and childhood. Documentation of nutrition care given and quality assurance in nutrition components are included. <i>Prerequisites: DIET 1330 Medical Nutrition Therapy and DIET 1920 Dietetic Field Experience I</i></p> | N |
| <p>DSPW 0800 Developmental Writing 3 Credits, 3 Class Hours This is a course in basic essay writing. Topics include unity, organization, and development of essay, rhetorical modes, grammar and mechanics. <i>Prerequisite: DSPW/0700 or appropriate placement test score.</i></p> | T | <p>DIET 1810 Sanitation Measures 2 Credits, 2 Class Hours This course is a study of the practical problems in protecting health, preventing food spoilage, and covering sanitation laws and regulations. This course includes the control of bacteria in the foodservice industry through good housekeeping practices, sanitary food handling, and personal hygiene using the HACCP approach to food safety. A Food Service Sanitation Certificate will be awarded to successful completers.</p> | T |
| Dietetics | | | |
| <p>DIET 1110 Techniques of Food Preparation and Service 4 Credits, 2 Lecture Hours, 6 Lab Hours This course introduces students to principles and procedures related to food selection, preparation and services for family and social occasions, and develops skills in planning menus for various types of commercial, industrial and school service.</p> | T | <p>DIET 1820 Equipment, Care, Safety, and Layouts 2 Credits, 2 Class Hours This course is a study of the use, operation, cleaning, care, space and equipment requirements, and arrangements, which provide an efficient operation in coordinating with job descriptions appropriate for institutional food services. Aspects of kitchen receiving and storage, dining room equipment, capacity rating and the principles of furnishing food service units are included.</p> | T |
| <p>DIET 1130 Quantity Cookery 6 Credits, 1 Lecture Hour, 150 Lab Hours This course is a study of institutional food service with 150 hours practical experience in preparing and serving large food quantities with 1hour lecture per week. <i>Prerequisite: DIET 1110 Techniques of Food Preparation and Service and DIET 1820 Equipment, Care, Safety and Layouts, or permission of instructor</i></p> | T | <p>DIET 2010 Dietetics Field Experience I 3 Credits, 1 Lecture Hour, 10 Hours Supervised Practice Lecture, 135 hours supervised observation, and practical experience in selected facility provide the student with firsthand understanding of management systems in selected food services. This course covers use, care, space requirements, and arrangement for efficient operation in selected food service. <i>Co-requisite: DIET 1130 Quantity Cookery</i></p> | T |
| <p>DIET 1210 Nutritional Care Laboratory I 2 Credits, 3 Class Hours This course is held concurrently with Principles of Nutrition in providing coordinated and continuing nutritional care in health-delivery systems and is designed for Dietetic Technician students.</p> | T | <p>DIET 2020 Dietetics Field Experience II 3 Credits, 1 Lecture Hour, 10 Hours Supervised Practice Approximately 135 hours of practical experience gives the student a firsthand understanding of management systems in selected food services. Reports and evaluation are required. <i>Co-requisite: DIET 2710 Catering and DIET 2510 Quantity Food Service Management I or DIET 1370 Advanced Nutritional Care</i></p> | N |
| <p>DIET 1220 Nutritional Care Laboratory II 2 Credits, 3 Lecture Hours, 90 Hours Supervised Practice This laboratory is taught concurrently with Medical Nutrition Therapy and designed for Dietetic Technician students. It is 90 hours of supervised practice in the clinical setting of hospitals, extended care facilities, community health agencies and school lunch programs. <i>Prerequisite: DIET 1210 Nutritional Care Laboratory I or permission of instructor</i></p> | T | | |

| | | | |
|---|---|--|---|
| <p>DIET 2030 Dietetics Field Experience III 4 Credits, 1 Lecture Hour, 13 Hours Supervised Practice 180 hours of practical experience give the student a firsthand understanding in a selected food services management system. <i>Co-requisite: DIET 2520 Quantity Food Service Management II or DIET 1360 Community Nutrition</i></p> | N | <p>ECE 1240 Communication and Language Arts 3 Credits, 3 Class Hours This course is an applied learning theory in relationship to the writing and language abilities of the young child, his state of readiness, perception, creative insight and common speech/hearing/visual problems. It also reviews literature for the teacher and for preschool children through eight years of age.</p> | T |
| <p>DIET 2510 Quantity Food Service Management I 3 Credits, 3 Class Hours This course is a study of the types of food service systems, planning, and control of quantity food production. This course includes menu planning, purchasing, storage, sanitation and physical facilities. <i>Co-requisite: DIET 2020 Dietetic Field Experience II</i></p> | N | <p>ECE 1370 Creativity: Teaching Young Children 3 Credits, 3 Class Hours This course is an integrated approach to the theory and practice of teaching young children through psychomotor development and the affective domain using music, movement, drama and art expressions. It is also an exploration of play in a child-centered curriculum involving wonder, discovery and experience. Field experiences included.</p> | T |
| <p>DIET 2520 Quantity Food Service Management II 3 Credits, 3 Class Hours As an introduction to food service management this course includes qualities and responsibilities of an effective food service manager; organization of a food service operation; technique of management; selection and training of personnel; quality, production and cost control; and ethics of buying practices. This course also includes a review of purchasing procedures, methods and selection of food by written specification and the consumer. <i>Prerequisite: DIET 2510 Quantity Food Service Management I. Co-requisite: DIET 2030 Dietetic Field Experience III.</i></p> | N | <p>ECE 1650 Infant Toddler Care: Techniques and Materials 3 Credits, 3 Class Hours This course presents a study of development techniques, equipment and materials for use with infants and toddlers. Emphasis is on assessment and prescriptive planning based on the child's level and individual needs. <i>Co-requisite: ECE 2800 Infant Toddler Care: Practicum</i></p> | N |
| <p>DIET 2610 Health Care Delivery Systems 2 Credits, 2 Class Hours As an introduction to health care fields this course includes federal, state, and local organizations and finance and delivery of health care services. Emphasis is on the professional disciplines in health care.</p> | T | <p>ECE 2010 Safe, Healthy, Learning Environment 3 Credits, 3 Class Hours A study of the basic principles of good health as they relate to the child in the family, child care center or family childcare home, and community. Includes child nutrition, growth, disease and accident prevention, and safety. Also included is a study of principles of creating appropriate learning environments for young children. <i>Pre-requisite: ECE 1010 or Departmental Approval. Co-requisite ECE 2130 Practicum</i></p> | N |
| <p>DIET 2980 Special Studies in Nutrition, Food Services and Administration 1-6 Credits Studies in particular areas of nutrition, foods or food service administration are included in this course. Independent study or class sessions cover such topics as community nutrition, geriatrics, food stamps, school lunches, gourmet foods of various regions, recipe development and various management problems. 1-6 hrs lecture.</p> | N | <p>ECE 2130 Practicum 3 Credits, 90 Lab Hours This course is a supervised practicum with a minimum of 15 clock hours in class and 90 clock hours in an early childhood program offering practical experience in a learning environment for young children. In involves a study of the physical and human qualities that combine to create a classroom that is safe and healthy, and promotes optimum learning.</p> | N |
| <p>DIET 2910 Nutrition Clinical I 3 Credits, 9 Hours Supervised Practice Supervised experience in patient care areas of designated health care facilities. Assigned experiences are designed to compliment and reinforce the knowledge gained in Advance Nutritional Care. <i>Prerequisite: DIET 1330 Medical Nutrition Therapy. Corequisite: DIET 1340 Advanced Nutritional Care.</i></p> | T | <p>ECE 2040 Family Dynamics and Community Involvement 3 credits, 3 class hours The role of the family and community in the physical, cognitive, social, and emotional growth of the child in a diverse society is explored. The areas of professionalism, program management, advocacy, family development and the structure of the family will be the main topics.</p> | N |
| <p>DIET 2920 Nutrition Clinical II 4 Credits, 13 Hours Supervised Practice Continuation of Nutrition Clinical I with emphasis on staff performance with students functioning as staff members in patient care and nutrition education corresponding with Community Nutrition. <i>Prerequisite: 2910 Nutrition Clinical I. Concurrent: DIET 1360 Community Nutrition.</i></p> | T | <p>ECE 2140 Clinical 3 credits, 45 l Lab hours Supervised pre- or in-service practicum. Minimum of 45 clock hours must be completed in an NAEYC, NAFDC, or NSACA accredited childcare agency, or TECTA/Departmental approved site. <i>Pre-requisites ECE 1010, 2010, 2020 and 2040</i></p> | N |
| <p>DIET 2990 Food Service Seminar 1-3 Credits This course gives a review of new trends in the food service field and their implications for food service operations. Opportunities for employment and advancement are discussed in addition to the procedures relating to application and acceptance of supervisory positions. 1-3 hrs lecture.</p> | T | <p>ECE 2310 Child Care Administration 3 Credits, 3 Class Hours This course is an examination of the various aspects of administering an early childhood day care program including planning, staffing, operating, involving parents, budgeting, evaluating, and recognizing legal responsibilities. Instruction techniques include discussion groups, guest speakers, films, projects, role-playing, lecturing, and hands-on computer simulations.</p> | N |
| | | <p>ECE 2800 Infant/Toddler Care: Practice 3 Credits, 100 Lab Hours Approximately 100 hours of supervised experience in a child care setting with infants and toddlers and in seminar are required. <i>Co-requisite: ECE 1650 Infant Toddler Care and departmental approval</i></p> | N |

Early Childhood Education

ECE 1010 Principles of Early Childhood Education T
3 Credits, 3 Class Hours
 This course is an introduction to the profession of early childhood education and the principles of developmental theories (physical, social, emotional, cognitive, creative and communication) and appropriate practices in various types of early childhood programs guiding children, birth to eight years of age. It includes observations and field trips to a variety of early childhood programs.

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|---|---|---|---|
| <p>ECE 2810 Early Childhood Education Practicum 2 Credits, 1 Hour for TECTA This course offers 60 hours of practical experiences relating to content in other required early childhood courses. <i>Prerequisites: ECE 1010, and ECE 1240 or ECE 1370, Co-requisite: ECE 2900</i></p> | N | <p>ECON 2500 Bank Management 3 Credits, 3 Hours New trends that have emerged in the philosophy and practice of bank management are presented. Additionally, the study and application of banking principles provide new and experienced bankers with a working knowledge of contemporary bank management. Case studies are used to supplement the textbook.</p> | N |
| <p>ECE 2820 Methods and Materials in Early Childhood Education 4 Credits, 45 Hours Practicum A study of developmentally appropriate methods and materials in an early childhood setting is provided. Emphasis is on development of competencies in the 13 Child Development Association areas and on implementation of objectives in the cognitive, psychomotor and affective domains; 45 hrs of practicum experiences included. <i>Prerequisites ECE 1010 and ECE 1240 or ECE 1370</i></p> | N | <p>ECON 2505—Commercial Lending 3 Credits, 3 Hours An introduction to the commercial banking industry leads students to the examination of an element of the important credit function of banking and commercial lending. To whom, for what amount and purpose, and on what basis and terms are concerns demanding considerable attention. Types of loans, customers, collateral, policies, procedures, and legal parameters are emphasized.</p> | N |
| <p>ECE 2900 Early Childhood Education Seminar 1-3 Credits Current theories, methodologies or other special topics in early childhood education are covered personnel.</p> | N | <p>ECON 2900—Electronic Payment Systems 3 Credits, 3 Hours This course is a comprehensive survey of the major electronic payments systems currently available for the electronic business. Students will learn the characteristics of Secure Electronic Transactions (SET), Digital Cash Systems, and the role of Digital Certificates. This course provides the background needed to understand how different types of payment systems work, as well as how to select an appropriate payment system and financial software to best suit a specific company's needs. <i>Prerequisites: ENGL 1010, ISDS 2605, ITEC 1001, or permission of an advisor.</i></p> | N |
| <p>ECE 2930 Early Childhood Education Field Experience 4 Credits, 1 Class Hour, 3 Lab Hours This course requires approximately 120 hours of supervised experience in a day care center to apply developed ECE competencies. Reports and evaluation are also required. <i>Prerequisite: department approval</i></p> | N | <p>ECON 1931 Banking Cooperative Education Work Experience I 3 Credits, 255 Lab Hours Work Experience I introduces the student to the employer/employee relationship in a financial institution environment. Under close supervision, the student engages in industry-related work and activities, and gains an awareness of the importance of work in our society. <i>Prerequisite: Completion of one semester of course work</i></p> | N |
| <p>ECE 2990 Early Childhood Education Workshop 1-3 Credits, 1-3 Lecture Hours This course is designed to address specific topics of interest to early childhood education.</p> | N | <p>ECON 1932 Banking Cooperative Education Work Experience II 3 Credits, 255 Lab Hours This course involves a continuation of supervised work in the student's chosen field. The work may be of a more specialized nature reflecting more participation and involvement of the student. <i>Prerequisite: ECON 1931</i></p> | N |
| Economics | | | |
| <p>ECON 1000 Principles of Banking 3 Credits, 3 Hours This introductory course presents commercial banking as an industry and an occupation. Bank functions, services and job opportunities are presented in a broad and descriptive perspective. <i>Pre-requisites: DSPM 0700, DSPW 0700, DSPR 0700</i></p> | N | <p>ECON 1933 Banking Cooperative Education Work Experience III 3 Credits, 255 Lab Hours Less supervision and more responsibility may be expected or reflected in the student's chosen financial arena. Work Experience III should enlighten both student and employer as to the suitability of the student/employee in the present or future relationship. <i>Prerequisite: ECON 1932</i></p> | N |
| <p>ECON 1100 Money and Banking 3 Credits, 3 Hours What is money? From where does money come? How and why do we use money? These questions and the role of commercial banks, other financial intermediaries, and the Federal Reserve System are all addressed. <i>Prerequisites: DSPM 0700, DSPW 0700, DSPR 0700</i></p> | N | <p>ECON 1200 Consumer Lending 3 Credits, 3 Hours Consumer credit and its history, evolution, and role in contemporary society and economics are examined. Also considered in this large and important market are institutional products, policies, and procedures. Case studies and role-playing are used to supplement text material. <i>Prerequisites: DSPM 0700, DSPW 0700, DSPR 0700</i></p> | N |
| <p>ECON 2010 Principles of Macroeconomics 3 Credits, 3 Hours The study of economics necessitates an understanding of the principles, which govern the operation of the economic system. This course focuses attention on the aggregate (macro) relationships and gives attention to the central problems of economic organization, the functioning of the price system, the economic role of government, the determination of national income and a brief glance at economic policy.</p> | T | | |
| <p>ECON 2020 Principles of Microeconomics 3 Credits, 3 Hours Attention is focused on the micro concept of economic analysis and primary attention is given to the theory of the firm and partial equilibrium problems arising within any enterprise economy. Attention is also given to government regulation of business, the theory of income distribution as it pertains to the determination of wages, rent and profits, and international trade.</p> | T | | |
| <p>ECON 2200 Economics and Insurance 3 Credits, 3 Hours This course is intended to help the student understand modern microeconomics, macroeconomics and the financial and regulatory environment in which insurance companies operate. This course is also designed to help the students prepare to take the National CPCU 9 Examination.</p> | N | | |
| Education | | | |
| | | <p>EDUC 1010 Introduction to Education 3 credits, 3 Class Hours This course offers a survey of the profession of education, its history in the United States and influence as a social institution, philosophical schools of thought, and an examination of current issues, including educational reform. Supervised teaching experience.</p> | T |
| | | <p>EDUC 1310 Introduction to Exceptional Learners 3 credits, 3 Class Hours This course is a survey course emphasizing the identification, classification, and educational implications of exceptional learners. Students are exposed to the development of IEPs in the required supervised field experience.</p> | T |
| | | <p>EDUC 1680 Home School Relations 1 credit, 1 Class Hour This course presents methods of involving parents and community in partnerships with schools to foster the holistic development of the child and explores theory and practical application through interaction with agencies, on site visits and interviews, development of common goals and strategies (leading to successful models), and an inclusive individual professional plan.</p> | N |

| | | |
|--|---|---|
| <p>EDUC 1700 Parenting Skills 1 credit, 1 Class Hour Application of state-of-the-art educational technology to the field of parenting education is presented. Emphasis is on family likenesses, common parenting skills and concepts in a democratic society, and modification for particular populations of parents to improve communication at home and in a network for prevention through a synergistic learning experience.</p> | N | <p>ELET 2111 Power Technology N 3 Credits, 2 Class Hours, 3 Lab Hours In Power Technology, students study the theory of operation of electromechanical devices. The course includes DC shunt, series, and compound generators and motors, the basics of three-phase circuits, three-phase rectification, SCR and TRIAC motor controls, transformers, AC alternators, the theory of rotating magnetic fields, induction motors, synchronous motors, and various small AC motors. Students conduct laboratory exercises on the major types of motors, generators, and transformer connections. <i>Prerequisite: ELET 1120</i></p> |
| <p>EDUC 1990 Education Seminar 1-3 credits, 1-3 Class Hours This course is a study of current theories, methodologies, or other topics in education.</p> | N | <p>ELET 2112 Digital Industrial Controls N 3 Credits, 2 Class Hours, 3 Lab Hours Digital Industrial Controls applies the fundamental principles of digital logic circuits to instrumentation and control in industrial environments. Digital logic families are discussed with emphasis on CMOS. Basic logic gates, timers, counters, multiplexers, demultiplexers, and magnitude comparators are some of the CMOS integrated circuits covered. Applications include signal conditioning, digital interfacing, voltage translation, and conversion of ladder logic to solid-state logic. Motor speed controllers and switching power supplies are discussed using 555 timers. <i>Prerequisites: CPET 1124 and TLET 1010</i></p> |
| <p>EDUC 2010 Child Psychology 3 credits, 3 Class Hours This course is an exploration of child development from conception through puberty. Emphasis is on theories, concepts, practices and research applications integrating psychological, sociological, and medical areas as related to cognitive, physical, moral, social, and emotional growth. Insights into behaviors, self-awareness, and education of the developing child are presented. Observation and practicum.</p> | T | |
| <p>EDUC 2050 Schooling in Multi-cultural Settings 3 credits, 3 Class Hours This course introduces the student to roles and responsibilities of teachers in multicultural settings, the class evolution of educational policies and practices with attention to the organization and structure of schools and multicultural issues, and the study of schools as cultural systems.</p> | T | <p>ELET 2201 Programmable Controllers N 4 Credits, 3 Class Hours, 2 Lab Hours In Programmable Controllers, students study the hardware configuration, I/O modules, memory organization, and instruction set of an industry standard programmable controller. Students study ladder logic and apply it to several industrial control applications such as motor controls, storage tanks, conveyors, and industrial panels and displays. The course includes an introduction to communications and industrial networks. Laboratory exercises include programming the programmable controllers with Windows-based industry standard programming software. <i>Prerequisite: CPET 1124 or departmental approval</i></p> |
| <h2>Electrical Engineering Technology</h2> | | |
| <p>ELET 1050 Programmable Logic Controllers 4 credits, 3 Class Hours, 2 Lab Hours Students study the hardware configuration, I/O modules, memory organization, and instruction set of a major manufacturer of programmable controllers. Students study ladder logic and apply it to several industrial control applications such as motor controls, storage tanks, conveyors, and industrial panels, and displays. The course content includes the use of WINDOWS-based programming software, a human-machine interface, and industrial networks. <i>Prerequisite: ETEC 1031 or CPET 1124 or departmental approval</i></p> | N | <p>ELET 2202 Microprocessor Based Instrumentation and Control N 4 Credits, 3 Class Hours, 2 Lab Hours Microprocessor Based Instrumentation and Control includes the principles of interfacing a microcontroller to industrial sensors and electromechanical devices. Emphasis is placed on applications in automation and robotics. Students study the instruction set of a microcontroller, programming peripherals, and communication protocols. Applications discussed include stepper motor and servo motor speed, direction, and position control. Laboratory exercises include assembly language programming on microcontrollers. <i>Prerequisites: CPET 1104, ELET 2112</i></p> |
| <p>ELET 1060 Advanced Programmable Logic Controllers & Lab 4 credits, 3 Class Hours, 2 Lab Hours This advanced course in PLCs will cover PLC memory organization, data types, math and other advanced instructions, configuring analog I/O, analog I/O applications, sampled data, open and closed loop control systems, PID instructions, industrial networks, human-machine interface concepts, message instructions, and WINDOWS based programming software. <i>Prerequisite: ELET 1050 or ELET2201 or departmental approval</i></p> | N | <p>ELET 2203 Robotics and Industrial Control Systems N 4 Credits, 3 Class Hours, 2 Lab Hours Robotics and Industrial Control Systems covers the essential topics of open and closed loop control systems. Emphasis is placed on automation and robotics. Signal conversion techniques are covered: A/D, D/A, frequency-to-voltage, voltage-to-frequency, V/I, and I/V. Position and velocity sensors such as optical shaft encoders and synchros are covered. Stepper motors are covered in detail. Closed loop control system topics include proportional, integral, and derivative control modes. Laboratory exercises include servo robot programming, combination analog and digital speed and position controllers, and process simulation and tuning using a programmable controller. <i>Prerequisites: CPET 1104, ELET 2112</i></p> |
| <p>ELET 1110 Electric Circuits I 4 Credits, 3 Class Hours, 2 Lab Hours Electric Circuits I introduces the student to the fundamental principles of DC circuits. Emphasis is placed on the solution of circuit problems using series and parallel circuit definitions, Ohm's law, Kirchhoff's laws, and equivalent circuits. Inductance and capacitance are introduced as time constants in transient circuits. The course concludes with network analysis techniques including loop equations, Thevenin's theorem, and superposition. <i>Co-requisite: MATH 1740</i></p> | N | |
| <p>ELET 1120 Electric Circuits II 4 Credits, 3 Class Hours, 2 Lab Hours Electric Circuits II introduces the student to the fundamental principles of AC circuits and polyphase circuits. Students study sinewave voltages, phase shifts, and phasors. Students analyze steady state AC circuits and apply circuit analysis techniques to impedance networks. Students then study the frequency dependence of impedance and the design of resonant circuits. The course covers the basics of three-phase circuits. <i>Prerequisites: ELET 1110, MATH 1740 Co-requisite: MATH 1750</i></p> | N | |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|--|---|--|---|
| ELET 1901-1908 Technical Scholarship Program 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses</i> | N | ELET 1901-1908 Technical Scholarship Program 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses</i> | N |
| ELET 1931 Cooperative Education Work Experience I 3 Credits, 225 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. | N | ELET 1931 Cooperative Education Work Experience I 3 Credits, 225 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. | N |
| ELET 1941 Cooperative Education Work Experience I-A 4 Credits, 300 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. | N | ELET 1941 Cooperative Education Work Experience I-A 4 Credits, 300 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. | N |
| ELET 1932 Cooperative Education Work Experience II 3 Credits, 225 Lab Hours In this course the student receives supervised work experience in any of the many facets of the electrical industry. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: ELET 1931 or ELET 1941</i> | N | ELET 1932 Cooperative Education Work Experience II 3 Credits, 225 Lab Hours In this course the student receives supervised work experience in any of the many facets of the electrical industry. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: ELET 1931 or ELET 1941</i> | N |
| ELET 1942 Cooperative Education Work Experience II-A 4 Credits, 300 Lab Hours In this course the student receives supervised work experience in any of the many facets of the electrical industry. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: ELET 1931 or ELET 1941</i> | N | ELET 1942 Cooperative Education Work Experience II-A 4 Credits, 300 Lab Hours In this course the student receives supervised work experience in any of the many facets of the electrical industry. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: ELET 1931 or ELET 1941</i> | N |
| ELET 1933 Cooperative Education Work Experience III 3 Credits, 225 Lab Hours The student acquires work experience in the electrical industry under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all-electrical courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: ELET 1932 or ELET 1942</i> | N | ELET 1933 Cooperative Education Work Experience III 3 Credits, 225 Lab Hours The student acquires work experience in the electrical industry under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all-electrical courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: ELET 1932 or ELET 1942</i> | N |
| ELET 1943 Cooperative Education Work Experience III-A 4 Credits, 300 Lab Hours The student acquires work experience in the electrical industry under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all-electrical courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: ELET 1932 OR ELET 1942</i> | N | ELET 1943 Cooperative Education Work Experience III-A 4 Credits, 300 Lab Hours The student acquires work experience in the electrical industry under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all-electrical courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: ELET 1932 OR ELET 1942</i> | N |

Electronic Technology

| | | | |
|---|---|---|---|
| EETEC 1011 DC/AC Electronics 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the theory of electricity, current voltage and power in series, parallel and complex DC and AC circuits. Electronic component identification, schematic diagrams and the proper use of test equipment are part of the course. Laboratory experiments reinforce the classroom lectures. A working knowledge of high school mathematics is required for this course. | N | EETEC 1011 DC/AC Electronics 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the theory of electricity, current voltage and power in series, parallel and complex DC and AC circuits. Electronic component identification, schematic diagrams and the proper use of test equipment are part of the course. Laboratory experiments reinforce the classroom lectures. A working knowledge of high school mathematics is required for this course. | N |
| EETEC 1021 SolidState Electronic Devices 4 Credits, 3 Class Hours, 2 Lab Hours The theory and principles of operation of solid state devices such as diodes, transistors, FETs, power amplifiers, operational amplifiers, SCRs, power supplies and regulators are examined in detail in the classroom and laboratory. | N | EETEC 1021 SolidState Electronic Devices 4 Credits, 3 Class Hours, 2 Lab Hours The theory and principles of operation of solid state devices such as diodes, transistors, FETs, power amplifiers, operational amplifiers, SCRs, power supplies and regulators are examined in detail in the classroom and laboratory. | N |
| EETEC 1031 Digital and Microprocessor Electronics Credits, 3 Class Hours, 2 Lab Hours Binary, hexadecimal and base ten numbering systems, basic logic gates such as inverters, latches, flip-flops, counters, adders, decoders and encoders are covered in this course. In addition, microprocessors, software and hardware are studied. Laboratory experiments reinforce class discussions. | N | EETEC 1031 Digital and Microprocessor Electronics Credits, 3 Class Hours, 2 Lab Hours Binary, hexadecimal and base ten numbering systems, basic logic gates such as inverters, latches, flip-flops, counters, adders, decoders and encoders are covered in this course. In addition, microprocessors, software and hardware are studied. Laboratory experiments reinforce class discussions. | N |
| EETEC 1041 Electronic Communication 4 Credits, 3 Class Hours, 2 Lab Hours This course introduces the student to AM and FM transmitter and receiver theory. Circuits such as oscillators, RF amplifiers, audio modulators, converters, IF amplifiers, antenna and transmission line theory are examined in the classroom and laboratory. | N | EETEC 1041 Electronic Communication 4 Credits, 3 Class Hours, 2 Lab Hours This course introduces the student to AM and FM transmitter and receiver theory. Circuits such as oscillators, RF amplifiers, audio modulators, converters, IF amplifiers, antenna and transmission line theory are examined in the classroom and laboratory. | N |
| EETEC 1110 Electronic Circuits I 4 Credits, 3 Class Hours, 2 Lab Hours This beginning course in electrical circuits covers resistance, current, Ohms law, Kirchhoff's laws, circuit parameters, magnetism and electromagnetic induction, inductance, capacitance, and the introduction of periodic functions. A hands-on approach is emphasized through laboratory exercises in which the student develops skills using the basic test equipment. | N | EETEC 1110 Electronic Circuits I 4 Credits, 3 Class Hours, 2 Lab Hours This beginning course in electrical circuits covers resistance, current, Ohms law, Kirchhoff's laws, circuit parameters, magnetism and electromagnetic induction, inductance, capacitance, and the introduction of periodic functions. A hands-on approach is emphasized through laboratory exercises in which the student develops skills using the basic test equipment. | N |
| EETEC 1120 Electronic Circuits II 4 Credits, 3 Class Hours, 2 Lab Hours The second half of a two-semester course on DC and sinusoidal AC circuits. Concepts of circuit analysis learned in Electronic Circuits I are applied to more complex types of series-parallel circuits and, to a limited extent, to circuits where no series or parallel combinations exist. The basic features of ideal transformers are examined. The study of frequency and reactance is continued, and the student examines how an understanding of concepts of reactance and resonance has led to the use of electronic filters to pass or block certain frequencies. <i>Prerequisite: ETEC 1110</i> | N | EETEC 1120 Electronic Circuits II 4 Credits, 3 Class Hours, 2 Lab Hours The second half of a two-semester course on DC and sinusoidal AC circuits. Concepts of circuit analysis learned in Electronic Circuits I are applied to more complex types of series-parallel circuits and, to a limited extent, to circuits where no series or parallel combinations exist. The basic features of ideal transformers are examined. The study of frequency and reactance is continued, and the student examines how an understanding of concepts of reactance and resonance has led to the use of electronic filters to pass or block certain frequencies. <i>Prerequisite: ETEC 1110</i> | N |
| EETEC 1210 Electronic Devices I 4 Credits, 3 Class Hours, 2 Lab Hours This course introduces the student to commonly used solid state electronic devices such as the silicon diode, bipolar junction transistor and field effect transistor. The diode is examined in its many uses such as rectifiers, clippers, and limiters. The transistor is examined as a single stage amplifier in commonly found configurations and multiple stage amplifiers. The field effect transistor is explored as a single stage amplifier. In addition, simple linear power amplifiers are included in this elementary course. | N | EETEC 1210 Electronic Devices I 4 Credits, 3 Class Hours, 2 Lab Hours This course introduces the student to commonly used solid state electronic devices such as the silicon diode, bipolar junction transistor and field effect transistor. The diode is examined in its many uses such as rectifiers, clippers, and limiters. The transistor is examined as a single stage amplifier in commonly found configurations and multiple stage amplifiers. The field effect transistor is explored as a single stage amplifier. In addition, simple linear power amplifiers are included in this elementary course. | N |
| EETEC 1220 Electronic Devices II 4 Credits, 3 Class Hours, 2 Lab Hours This course is an extension of Electronic Devices I. It continues to familiarize the student with audio frequency power amplifiers including complimentary symmetry, integrated circuit and CMOS power devices. In addition, it includes devices such as operational amplifiers, SCRs, photocell, triacs, UJT, speed control circuits, voltage regulators, both series and shunt, and switching regulator circuits. Students examine the devices and circuits in both classroom and laboratory experiments. <i>Prerequisites: ETEC 1110, ETEC 1210 ETEC 1310 Digital Circuits I</i> | N | EETEC 1220 Electronic Devices II 4 Credits, 3 Class Hours, 2 Lab Hours This course is an extension of Electronic Devices I. It continues to familiarize the student with audio frequency power amplifiers including complimentary symmetry, integrated circuit and CMOS power devices. In addition, it includes devices such as operational amplifiers, SCRs, photocell, triacs, UJT, speed control circuits, voltage regulators, both series and shunt, and switching regulator circuits. Students examine the devices and circuits in both classroom and laboratory experiments. <i>Prerequisites: ETEC 1110, ETEC 1210 ETEC 1310 Digital Circuits I</i> | N |
| EETEC 1310 Digital Circuits I 4 Credits, 3 Class Hours, 2 Lab Hours Numbering systems, basic logic gates, and flip-flop circuits associated with microcomputers are explored in this course. Included is the use of truth tables, logic diagrams, and Karnaugh maps for circuit reduction. Laboratory experiments reinforce the material presented in lecture and provide hands-on experience with logic circuits and pertinent test equipment. | N | EETEC 1310 Digital Circuits I 4 Credits, 3 Class Hours, 2 Lab Hours Numbering systems, basic logic gates, and flip-flop circuits associated with microcomputers are explored in this course. Included is the use of truth tables, logic diagrams, and Karnaugh maps for circuit reduction. Laboratory experiments reinforce the material presented in lecture and provide hands-on experience with logic circuits and pertinent test equipment. | N |
| EETEC 1320 Digital Circuits II 4 Credits, 3 Class Hours, 2 Lab Hours This course continues with the basic logic gates used in microcomputers, such as counters, shift registers, encoders, decoders, and analog to digital converters. In addition, it introduces the student to the complete microcomputer. The assembly language instructions are examined as well as memory expansion and peripheral devices. This course familiarizes the student with the essentials of programming and interfacing the microcomputer. <i>Prerequisite: ETEC 1310</i> | N | EETEC 1320 Digital Circuits II 4 Credits, 3 Class Hours, 2 Lab Hours This course continues with the basic logic gates used in microcomputers, such as counters, shift registers, encoders, decoders, and analog to digital converters. In addition, it introduces the student to the complete microcomputer. The assembly language instructions are examined as well as memory expansion and peripheral devices. This course familiarizes the student with the essentials of programming and interfacing the microcomputer. <i>Prerequisite: ETEC 1310</i> | N |
| EETEC 2300 Electronic Communications 4 Credits, 3 Class Hours, 2 Lab Hours The student gains skills in circuit recognition, schematic reading, troubleshooting of solid-state and vacuum tube transmitter circuits, R.F. oscillators, harmonic generators, R.F. power amplifiers and audio modulator circuits. The student interprets voltage and resistance | N | EETEC 2300 Electronic Communications 4 Credits, 3 Class Hours, 2 Lab Hours The student gains skills in circuit recognition, schematic reading, troubleshooting of solid-state and vacuum tube transmitter circuits, R.F. oscillators, harmonic generators, R.F. power amplifiers and audio modulator circuits. The student interprets voltage and resistance | N |

measurements to effect repairs. Usage of signal generators, oscilloscopes and frequency counters to analyze circuit failures is emphasized. The student gains the awareness of the usage of transmission lines and their application in communications. Emphasis is placed on the parameters associated with standing waves and the characteristic impedance of a transmission line. *Prerequisites: ETEC 1120, ETEC 1220*

ETEC 2302 Miniature Component Repair Techniques N
3 Credits, 2 Class Hours, 2 Lab Hours
 This course is designed to help the student develop skills and self-confidence for employment in the electronics field. It furnishes the student with proper soldering techniques and helps the student to achieve an understanding of the usage of hand tools and safety precautions. Emphasis is placed on soldering and desoldering electronic components on different types of connections, the printed circuit board, as well as minor printed circuit board repair.

ETEC 2402 Troubleshooting Microprocessor Based Systems N
4 Credits, 3 Class Hours, 2 Lab Hours
 With the ever-increasing use of microprocessor based electronic systems, the study of troubleshooting this multibus system in a logical method is becoming a must for modern electronic service personnel. This course examines various tools available for troubleshooting from the oscilloscope and logic analyzers to newer dynamic in-circuit testers. The student troubleshoots a variety of microprocessor based systems. *Prerequisites: ETEC 2302*

ETEC 2403 Video Terminal Maintenance N
4 Credits, 3 Class Hours, 2 Lab Hours
 Computer terminals and microcomputers which interface with mainframe computers are numerous in business and industry. This course is a detailed circuit analysis of a computer terminal. Topics include video monitors, keyboards, switching power regulators, microprocessor terminal controllers, and interfacing methods. Emphasis is placed on troubleshooting real world failures. In addition, the student prepares written reports detailing terminal failure, diagnostic methods, initial analysis, service required, and a summary on each unit processed in the lab. A minimum of three reports is required. *Prerequisites: ETEC 1320, ETEC 2302*

ETEC 2625 FCC License Review N
4 Credits, 4 Class Hours
 Electronic theory needed for successful completion of the FCC license through element three is covered. The student is given a thorough review of electronic theory and a battery of tests similar to those used by the FCC as a preparation for the FCC examination. *Prerequisite: Advanced standing*

ETEC 2814 Servicing and Maintenance of Microcomputer Systems N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course introduces the student to the functional hardware of a complete microcomputer system. Hand tools, test equipment, diagnostic methods, and technical manuals are used in the classroom and laboratory to provide the student with a hands-on approach to the servicing and maintenance of microcomputer systems. *Co-requisite: ITEC 1004*

ETEC1901-1908 Technical Scholarship Program N
4 Credits, 300 Lab Hours
 Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. *Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses*

ETEC 1931 Cooperative Education Work Experience I N
3 Credits, 225 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

ETEC 1941 Cooperative Education Work Experience I-A N
4 Credits, 300 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

ETEC 1932 Cooperative Education Work Experience II N
3 Credits, 225 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of electronics. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. *Prerequisite: ETEC 1931 OR ETEC 1941*

ETEC 1942 Cooperative Education Work Experience II-A N
4 Credits, 300 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of electronics. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. *Prerequisite: ETEC 1931 OR ETEC 1941*

ETEC 1933 Cooperative Education Work Experience III N
3 Credits, 225 Lab Hours
 The student acquires work experience in the electronics field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all-electronic courses to accomplish tasks as assigned by the engineer. *Prerequisite: ETEC 1932 OR ETEC 1942*

ETEC 1943 Cooperative Education Work Experience III-A N
4 Credits, 300 Lab Hours
 The student acquires work experience in the electronics field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all-electronic courses to accomplish tasks as assigned by the engineer. *Prerequisite: ETEC 1932 OR ETEC 1942*

Emergency Medical Technician

EMT 1040 Basic Medical Technology I N
7 Credits
 Fundamentals of pre-hospital emergency care used by the Emergency Medical Technician (EMT) are covered in this course. This course includes recognition and treatment of cardiovascular emergencies, unconscious states, burns, hazardous materials, environmental emergencies, and OB emergencies. Basic anatomy and physiology and patient assessment are covered as well as ambulance operation. *Co-requisite: Intro to EMT 1090*

EMT 1050 Basic Emergency Technology II N
7 Credits
 This course is a continuation of Basic Emergency Medical Technology I and further develops the student's knowledge of pre-hospital care used by the Emergency Medical Technician (EMT). Recognition and treatment of bleeding and shock; soft tissue injuries; musculoskeletal care; and injuries to the head and spine and pediatric emergencies are covered. Also, instruction in ambulance operations, gaining access, and course overviews are included. *Prerequisites: EMT 1040 Basic Emergency Medical Technology I and EMT 1090 Introduction to*

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

EMT
EMT 1090 Introduction to EMT N
3 Credits, 3 Class Hours
 This course covers fundamentals of Basic Life Support as used by the Emergency Medical Technician (EMT). Instruction and certification of Cardiopulmonary Resuscitation (CPR), interfacing basic CPR with advanced life support methods such as automatic defibrillation, mechanical airway adjuncts, etc. are included. An overview of the Tennessee EMS regulatory structure, including Tennessee Department of Emergency Medical Services Rules and Regulations is provided. Also instruction on the Memphis-Shelby County EMS system, personal safety and EMS equipment are covered.
Co-requisite: EMT 1040

EMT 2010 Paramedic I N
17 Credits, 17 Class Hours
 This course covers the fundamentals of pre-hospital emergency care used by the paramedic. The course begins with anatomy and physiology along with pathophysiology. Emphasis on understanding the EMS System, medical/legal considerations, major incident response, patient assessment, advanced airway management, shock treatment, pharmacology, and cardiovascular emergencies. *Prerequisite: Current Tennessee Basic EMT certification, eligible for Basic EMT. Must be accepted into the program.*

EMT 2020 Paramedic II N
17 Credits, 17 Class Hours
 This is a continuation of the study of pre-hospital emergency care used by the paramedic. Emphasis is on trauma management, burn management, understanding and treating endocrine emergencies, abdominal emergencies, anaphylaxis, toxicology, infectious diseases, geriatric emergencies, pediatric emergencies, OB/GYN emergencies, behavioral emergencies, abuse, neglect, and special needs of patients. *Prerequisite: EMT 2010 Paramedic I*

EMT 2030 Paramedic III Hospital and Field Clinical Experience N
4 Credits
 Practical clinical experience in the participation of treatment techniques learned in Paramedic II is presented. *Prerequisite: EMT 2020 Paramedic II.*

EMT 2040 Paramedic IV Field Internship II N
2 Credits
 Practical ambulance field experience in the team leadership of treatment techniques learned in Paramedic I,II, and III continues. *Prerequisite: EMT 2020 Paramedic II and EMT 2030, Paramedic III Hospital and Field Clinical Experience*

Engineering Technology

ENTC 1114 Introduction to Technology N
4 Credits, 4 Class Hours
 This course introduces the student to the electrical/electronic engineering technology fields. Emphasis is on electronic terminology, measurements, safety, and test equipment usage. Electronic unit analysis, conversion, and functions using the calculator are discussed along with use of the volt-ohm-milliammeter and oscilloscope. Electrical safety with basic house wiring practices and procedures is covered. This course covers career opportunities, industrial safety, review of technical math, problem solving, and is suitable for the fundamental applications of electricity and electronics in all disciplines. *Co-requisite: DSPM 0800 or equivalent*

ENTC 1124 Engineering Technology Techniques N
4 Credits, 4 Class Hours
 This course introduces the student to engineering technology. Included in this course are the following topics: career orientation, the fields of engineering technology, unit systems, conversion of units, the hand-held calculator, technical math, industrial safety, instruments, metrology, technical sketching, library usage, problem solving, laboratory practices, technical reports, and the use of tools.
Co-requisite: DSPM 0800 or equivalent

ENTC 1134 Electronic Workbench Applications N
4 Credits, 4 Class Hours
 This course introduces the student to electronic circuit simulation on a computer. The student designs, tests and modifies analog and digital electronic circuits using Electronic Workbench, a circuit simulation software package. Electronic test equipment such as digital multimeters, oscilloscopes, signal generators, bode plotters, and logic analyzers are used on screen to test and measure the performance of electronic circuits. The student reinforces previously learned material from earlier courses in basic electronics. *Prerequisite: Second-year electrical/electronic student or permission from advisor opportunities, industrial safety, review of technical math, problem solving, and is suitable for the fundamental applications of electricity and electronics in all disciplines. Co-requisite: DM 0084/MATH 0800 or equivalent*

English

ENGL 1001 English as a Second Language: Beginner Level N
3 Credits, 3 Class Hours

This course is designed for the non-native speaker of English who has little or no competency in spoken and written English. The course includes practice in listening, reading, and writing.

ENGL 1002 English as a Second Language II T
3 Credits, 3 Class Hours

This course is designed for the non-native speaker of English who possesses a novice high-to-intermediate level of competency in spoken and written English. The course includes practice in speaking, listening, reading, and writing. *Prerequisite: ENGL 1001*

ENGL 1003 English as a Second Language III T
3 Credits, 3 Class Hours

This course is designed for the non-native speaker of English who possesses a mid-intermediate to advanced level of competency in spoken and written English. This course includes practice in speaking, listening, reading, and writing. *Prerequisite ENGL 1002 or equivalent*

◆ENGL 1010 English Composition I T
3 Credits, 3 Class Hours

Through writing compositions and reading essays critically, students are taught to organize and develop ideas, using various rhetorical modes and editing techniques. The course focuses chiefly on improving the clarity and effectiveness of writing and includes instruction and practice in the research process. *Prerequisite: DSPR 0800 and DSPW 0080 or satisfactory performance on the COMPASS or ACT test*

◆ENGL 1020 English Composition II T
3 Credits, 3 Class Hours

This course emphasizes synthesis and analysis, taught with a focus either on an introduction to literature or on contemporary issues. The course includes instruction in research and documentation skills.
Prerequisite: ENGL 1010

◆ENGL 1065 Introduction to Film T
3 Credits, 4 Class Hours

This course helps students develop a better understanding and appreciation of movies. Lab hours are used for viewing of films. Students observe films more closely and become active participants in the "art" of the film experience. This course may be used as a Fine Arts and Humanities elective. *Prerequisite: ENGL 1010*

ENGL 2050 Introduction to Hispanic American Literature I N
1 Credit, 1 Class Hour

Conducted in English, this course gives students an opportunity to read, discuss, and write about literature, both fiction and non-fiction, produced by Hispanic writers in the U.S. from the 16th century to the present. *Prerequisite: ENGL 1010 or instructor's permission*

ENGL 2051 Introduction to Hispanic American Literature II N
1 Credit, 1 Class Hour

Conducted in English, this course gives students an opportunity to read, discuss, and write about literature, both fiction and non-fiction, produced by Hispanic writers in the U.S. in the twentieth century.
Prerequisite: ENGL 1010 or instructor's permission

ENGL 2052 - Introduction to Hispanic American Literature III N
1 Credit, 1 Class Hour

This course gives students an opportunity to read, discuss, and write about two novels written by twentieth-century Hispanic authors in the U.S. The viewing and discussion of a full-length film provides further insight into Hispanic culture. The course may be used as a humanities elective. *Prerequisite: ENGL 1010 or permission of instructor*

ENGL 2055 Technical Writing T
3 Credits, 3 Class Hours

Students in science or engineering technology study the principles of technical writing and produce articles, letters, abstracts, memoranda, oral reports, and a formal research report based on current technical and laboratory experiences. *Prerequisite: ENGL 1010*

| | | | |
|---|---|--|---|
| <p>ENGL 2065 Business Writing 3 Credits, 3 Class Hours Students examine typical communication problems encountered on the job and study the principles of effective business communication. Through practice in writing letters, memoranda, and reports, students are taught the forms and techniques of successful business writing. This course is required in some majors and serves as a general elective in others. <i>Prerequisite: ENGL 1010</i></p> | T | <p>ENGL 2340 World Fiction 3 Credits, 3 Class Hours Students read fiction of the 19th and 20th centuries, chiefly by British and European authors (in translation). The purpose of the course is to encourage enjoyment and appreciation of literature and to strengthen skills analytical thinking, group discussion, and effective writing. This course may be used to meet the Fine Arts/Humanities requirement for the A.A.S. degrees only. <i>Prerequisite: ENGL 1010</i></p> | T |
| <p>ENGL 2130 Contemporary American Literature 3 Credits, 3 Class Hours This course is an interpretive study of current and recent American authors, emphasizing fiction, drama, and film. This course may be used to meet the STCC Fine Arts and Humanities requirement for the A.A.S. degree only. <i>Prerequisite: ENGL 1010</i></p> | T | <p>◆ENGL 2650 African American Literature 3 Credits, 3 Class Hours Students study African American literature. Dramatic, lyrical, and narrative works are examined for their enlightenment of African American life and thought and for their historical significance. <i>Prerequisite: ENGL 1020</i></p> | T |
| <p>ENGL 2150 African American Fiction 3 Credits, 3 Class Hours This course will introduce students to a wide range of texts from historical popular fiction that explore the human condition from African American perspectives. This course may be used to meet the STCC Fine Arts and Humanities requirement for the A.A.S. degree only. <i>Prerequisite: ENGL 1010</i></p> | T | <p>ENGL 2760 Cultural Confrontations 3 credits, 3 Class Hours This course is an interdisciplinary examination of the causes and effects of conflicts between and within cultures. The course questions the notion of cultural unity, raises issues of cultural identity, and defines categories used to construct cultural positions. <i>Prerequisite: ENGL 1020</i></p> | T |
| <p>◆ENGL 2110 American Literature I 3 credits, 3 Class Hours This course is an interpretative study of major American authors and literary achievements from the colonial period through the mid-nineteenth century. <i>Prerequisite: ENGL 1020 English II.</i></p> | T | <h2>Ethics</h2> | |
| <p>◆ENGL 2120 American Literature II 3 credits, 3 Class Hours This course is an interpretative study of major American authors and literary achievements from the mid-nineteenth century through World War II. <i>Prerequisite: ENGL 1020 English II</i></p> | T | <p>◆ETHC 2030 Ethics 3 Credits, 3 Class Hours This course examines opinions about right and wrong conduct in relation to self, other people, animals, and the environment. Reflections on human values and the basic ethical positions that guide or inform peoples' lives are emphasized. Selected readings from contemporary sources and great moral philosophers are studied. <i>Prerequisite: DSPW 0800, DSPR 0800 or equivalent</i></p> | T |
| <p>◆ENGL 2210 British Literature I 3 credits, 3 Class Hours This course surveys major British authors and their works from medieval beginnings to the time of Samuel Johnson. It examines the development of English verse and prose fiction as art forms. <i>Prerequisite: ENGL 1020 English Composition II</i></p> | T | <h2>Finance and Insurance</h2> | |
| <p>◆ENGL 2220 British Literature II 3 credits, 3 Class Hours This course surveys English authors and literature from Romanticism to the present day. It examines nineteenth century British poetic movements, Victorian Literary refinements, and modern variations. <i>Prerequisite: ENGL 1020 English II</i></p> | T | <p>FINR 2000 Principles of Insurance 3 Credits, 3 Hours This course is intended to meet the needs of a wide range of clerical, technical and managerial majors, including those seeking employment with insurance companies, agencies, brokerage houses and adjustment firms. Designed primarily for students who are new to the study of insurance, the course is appropriate for newcomers to the business as well as for more experienced students with limited formal insurance education who would benefit from a general understanding of how the property-liability insurance business works. Through this course, students will learn how their work complements the work of others. Examples, anecdotes and illustrations demonstrate the importance of each insurance role. While describing the various people in insurance, the course also introduces a number of property-liability insurance policies and principles.</p> | N |
| <p>◆ENGL 2310 World Literature I 3 credits, 3 Class Hours This course surveys world literature from antiquity through the Renaissance. It acquaints students with prose, poetry, and drama, while illustrating different forms, cultural ideals and enduring themes. <i>Prerequisite: ENGL 1020 English Composition II</i></p> | T | <p>FINR 2005 Commercial Insurance 3 Credits, 3 Hours This course introduces the student to commercial coverage including property, business income, inland and ocean marine, crime, boiler and machinery, general liability, business and auto, worker's compensation and farm and business owners. The course also covers other liability coverage, as well as surety bonding and excess and surplus lines of insurance.</p> | N |
| <p>◆ENGL 2320 World Literature II 3 credits, 3 Class Hours This course surveys eastern and western world literature since the Renaissance. It focuses on works that reflect the great ideas, literary movements, and societal changes of modern times. <i>Prerequisite: ENGL 1020 English Composition II</i></p> | T | | |
| <p>ENGL 2420 American Fiction 3 credits, 3 Class Hours A critical examination of selected American fictional works to develop an appreciation of novels and short stories. Explores the role and function of fiction in relationship with major authors. <i>Prerequisite: ENGL 1010 English I. This course may be used to meet the Fine Arts/Humanities requirement for the A.A.S. degree only.</i></p> | T | <p>◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions T – Denotes courses designed for transfer to four-year institutions N – Denotes courses not designed for transfer to four-year institutions</p> <p>For full explanation, see introductory material for Course Descriptions section of this Catalog.</p> | |

FINR 2006 Personal Insurance N
3 Credits, 3 Hours
 This course offers a review of personal loss exposures and personal insurance coverages. Topics include homeowners and other dwelling coverages, comprehensive personal liability, inland marine floater policies, automobile, life, health and applicable government programs. This course will prepare the student to take the National Examination for the INS 22 course, which leads to a certificate in General Insurance from the Insurance Institute of America. Passing the exam will earn 25 continuing education hours of credit in Tennessee.

FINR 2007 Principles of Life & Health Insurance N
3 Credits, 3 Hours
 Nature and handling of risk in personal and business situations are covered in this course. Emphasis is placed on life and health exposures to loss.

FINR 2040 Insurance Operations N
3 Credits, 3 Hours
 This course explores the development of the property and liability insurance industry. There is in-depth analysis of both companies and forms of production.

FINR 2050 Insurance Management N
3 Credits, 3 Hours
 This course concentrates on the principles of management as they pertain to the insurance industry. Involved are personnel issues, the supervision of accounts and policies, as well as the effective leadership models in the industry.

FINR 2060 Legal Environment of Insurance N
3 Credits, 3 Hours
 This is a course based upon general business law principles which emphasizes the application of business law to insurance as well as some of the unique aspects of the insurance industry.
Prerequisites: FINR 2010 or FINR 2020

FINR 2100 Commercial Liability Risk Management N
 CPCU is commercial liability and risk management. It covers the risk management process for liability exposures including general liability, workers compensation and excess liability. The course will look at both insurance and non-insurance means of handling such exposures.

FINR 2200 Financial Management N
3 Credits, 3 Hours
 A study of the commercial banking system's role in meeting short-and-long-term business demands for funds. Includes a practices and procedures investigation used by other financial institutions in providing credit. The student practices various financial techniques for decision-making including present value calculations and analysis of financial statements. *Prerequisites: ACCT 1010 and MATH 1130, or approval of advisor*

FINR 2205 Personal Financial Management N
3 Credits, 3 Hours
 An analysis of the economic problems that typically affect consumers. Emphasis on individual decision making processes in evaluating needs, wants, and resources and in utilizing resources including time, money, and energy.

FINR 2300 Business Law T
3 Credits, 3 Hours
 A study of business law in relationship to commercial transactions, contracts, agency and employer-employee relationships, negotiable instruments and legal procedures. Includes breaches and remedies, product liability, real property, consumer/debtor protection, bankruptcy, personal property, and agency contracts/ torts.

Fire Science

FIRE 1100 Fire Fighting Strategy and Tactics I N
3 Credits, 3 Class Hours
 This course covers development and implementation of strategic factors in emergency management; development of tactical objectives and an incident action plan; and implementation and use of the Incident Command System as an emergency management tool.

FIRE 1101 Fire Service Instructional Methodology N
3 Credits, 3 Class Hours
 This course provides an understanding of the training course development process, including development of objectives, instructional activities, instructor guide design, instructional techniques, and evaluation of instruction. This course requires individual participation in lesson plan presentation.

FIRE 1200 Fire Officer I N
3 Credits, 3 Class Hours
 This course offers an introduction to the principles of organization, communication, group dynamics, leadership, motivation, problem-solving, preincident surveys, emergency management, the State of Tennessee requirements for "NFPA 1041 Fire Officer I," and other topics necessary for an effective fire officer.

FIRE 1201 Fire Officer Leadership N
3 Credits, 3 Class Hours
 This course focuses on the leadership role of the company officer in the fire service. The course will enable mid-range managers, especially company officers, to be more effective in their roles as leaders.

FIRE 2300 Hazardous Materials Team Operations I N
3 Credits, 3 Class Hours
 This course is designed to prepare hazardous material team members to function safely and as a unit in dealing with incidents. Personal protection and safety, basic physical and chemical properties, container characteristics and basic tactics will be discussed. Emphasis is placed on team operations and use of emergency episode equipment.

FIRE 2301 Fire Inspector I N
3 Credits, 3 Class Hours
 This course will provide the basic understanding of Fire Inspection principles and Code requirements. Students will meet the requirements as specified in National Fire Protection Association Standard 1031 (Professional Requirements for Fire Inspector I). This course will also provide detailed work to prepare students to take the written Southern Building Code Congress International (SBCCI) Fire Inspector Level I Examination. This course will be accepted to satisfy the state continuing education requirement for state certification inspectors.

FIRE 2302 Developing Fire and Life Safety Strategies N
3 Credits, 3 Class Hours
 This course presents the foundation of public safety education within the fire organization and the structure of effective safety programs. The course examines structure and presentation techniques that will establish effective public education programs. This course will fulfill the state experience requirement for state certification for Public Life Safety Officer I. *Pre-requisite: FIRE 2202*

FIRE 2400 Hazardous Materials Team Operations II N
3 Credits, 3 Class Hours
 Training for Hazardous Materials Team Members was developed in response to growing concern over the increased risk of occupational exposure to toxic substances. The risk has escalated in recent years because of the proliferation of chemical, biological, and other types of hazards. Strategies for effective responses to the countless numbers of hazards posed by new products and combinations of products will be presented. Completion of this course and FS 2300 fulfills the City of Memphis certification of HazMat Technician. *Pre-requisite: FIRE 2300*

FIRE 2401 Fire Service Budgeting and Financial Management N
3 Credits, 3 Class Hours
 This course provides fire officers with an applied understanding of the economic environment of the fire service. Students will examine funding and revenue sources; evaluate the different approaches to municipal budgeting; determine the political processes associated with funding; and study the accounting procedures used to administer a final budget. Computer applications will be reviewed and opportunities provided to students in the use of computers within the budgetary process. Through group discussion and case-study approaches, the student will demonstrate a working knowledge of modern fire service financial philosophy. *Pre-requisite: FIRE 1200 or FIRE 1201*

FIRE 2500 Fire Fighting Strategy and Tactics II N
3 Credits, 3 Class Hours
 This course will provide fire officers with an awareness of the strategic and tactical factors associated with large-scale emergencies. Recent and significant case studies will provide the basis for a “lessons-learned” experience. Role-playing through simulation will provide an opportunity to experience the demands of emergency management and application of command skills in the Incident Command System. *Prerequisite: FIRE 1100*

FIRE 2501 Fire Protection Systems N
3 Credits 3 Class Hours
 This course addresses code applications during construction, liabilities of code enforcement, interpersonal communications, fire protection system components, acceptance testing and maintenance of fire protection systems, residential sprinkler systems, and fire safety education planning. This course stresses conceptual learning dealing with problem solving, mechanical competence, and behavioral approaches. This course can be used to fulfill the state continuing education unit (C.E.U.) requirement for Tennessee State Certified Fire Inspector.

FIRE 2502 Mid-Level Management for Fire Officers N
3 Credits, 3 Class Hours
 This course is designed for individuals who currently serve or plan to serve in supervisory positions. The course will examine political, social, legal and economic issues that challenge supervisors today and in the near future. Special focus is placed on group problem-solving and creative discovery of solutions to meet modern organizational problems.

FIRE 2601 Arson Investigation N
3 Credits, 3 Class Hours
 An in-depth study in the analysis of Fire, Arson, and Explosion scenes. Emphasis will be placed on the principles and techniques of scene preservation and analysis, management of investigative functions, documentation of the scene, and determination of the cause and origin of fires.

Geographic Information Systems (GIS)

GIST 1000 Principles of Geographic Information Systems N
3 Credits, 3 Class Hours
 Principles of Geographic Information Systems (GIS) provides an introduction to the concepts needed to think like a GIS practitioner. Comprehensive without being overburdened with excessive detail, it offers the students insights into the idea of geographic inquiry and spatial discovery and grounding in a thorough familiarity with the wide variety of topics relevant to GIS. Topics include geographic data, maps, projection systems, automation, data structures, and applications, as well as lab assignments, which correspond to the coursework being taught.

GIST 1010 Introduction to ArcView GIS N
3 Credits, 3 Class Hours
 Introduction to ArcView GIS is a thorough overview of the concepts, functions, applications, technologies, and trends associated with Geographic Information Systems and computer based mapping. Topics include spatial data and database management, hardware and software considerations, GIS applications, project planning, education and training, and implementation.

GIST 1020 Advanced ArcView GIS N
4 Credits, 4 Class Hours
 This course is a follow-up to Intro to ArcView GIS. The course will expand the student’s knowledge of and expertise in Geographic Information Systems, through classroom lecture and “hands-on” experience with PC-based Geographic Information Systems software. The course utilizes ESRI’s ArcView GIS software and the Spatial Analyst and Network Analyst Extensions. Providing the student with advanced software, this course will expand the participant’s knowledge and usability of GIS tools, and will give the student more “hands-on” experience in solving real-world problems. *Prerequisite: GIST 1010*

GIST 2010 Introduction to ARC/INFO NT N
4 Credits, 4 Class Hours
 This class introduces the student to the fundamentals and concepts of ARC/INFO NT software, the industry standard in Geographic Information Systems. The class will take the student through the basics of spatial analysis, data design and development, and problem solving through “hands-on” instruction on state-of-the-art Windows NT workstations. The student will, upon completion of this course and the advanced course to follow, be able to compete for technical-level jobs in this rapidly growing industry. *Prerequisite: GIST 1010*

GIST 2020 Advanced ARC/INFO NT N
3 Credits, 4 Class Hours
 Advanced ARC/INFO NT is a continuation of the concepts presented in GS 2010, Introduction to ARC/INFO NT. The class will expand the student’s knowledge of GIS theory and ARC/INFO concepts and functionality in the context of “real world” problem solving. Student projects will involve combining several layers of data to find the relationships between layers, solving for a solution and producing sophisticated printed maps. *Prerequisite: GIST 2010*

GIST 2041 Applications in Business N
3 Credits, 3 Class Hours
 Applications in Business introduces the use of GIS as an analysis and marketing tool in the business world. Students will utilize skills student utilizes skills gained from GIS program courses and on-the-job developed in introductory classes for solving problems in such applications as site selection, marketing and demographics, as well as explore the availability of pertinent data. *Prerequisites: GIST 1010 and GIST 2010*

GIST 2042 Applications in Engineering N
3 Credits, 3 Class Hours
 Applications in Engineering introduces the use of GIS as an analysis and design tool in engineering applications. Students will utilize skills developed in introductory classes for solving problems in such applications as site development, municipal engineering, municipal planning, transportation planning and design, and environmental analysis. *Prerequisites: GIST 1010 and GIST 2010*

GIST 2051 Introduction to Avenue Programming N
3 Credits, 3 Class Hours
 Introduction to Avenue Programming provides an introduction to the ArcView GIS object oriented programming interface used to customize ArcView GIS applications. The student will be introduced to programming techniques used for application development. An emphasis will be placed on how to manipulate, modify, and customize the default ArcView GIS environment to meet specific requirements. *Prerequisite: GIST 1010 and ITEC 1002*

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
 T – Denotes courses designed for transfer to four-year institutions
 N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

GIST 2090 GIS Capstone Project N
2 Credits, 3 Class Hours
 Students will define a GIS project topic and develop it from inception to completion utilizing the skills acquired in previous classes. The class will include instruction on project timeline development and presentation skills. Projects will be presented at the end of the semester in both oral and written form before a panel of instructors.
Prerequisite: GIST 1020 and GIST 2010

GIST 1931 Co-op I N
3 Credits, 225 Lab Hours
 The student spends one semester employed in the GIS industry. Work duties are assigned under the supervision of a GIS professional. The student utilizes skills gained from GIS program courses and on-the-job training. This course cannot be substituted for a required concentration course (including GS electives) without approval in writing of the Department Chair prior to beginning the cooperative experience.

GIST 1932 Co-op II N
3 Credits, 225 Lab Hours
 The student spends one semester employed in the GIS industry. Work duties are assigned under the supervision of a GIS professional. The student utilizes skills gained from GIS program courses and on-the-job training. This course cannot be substituted for a required concentration course (including GS electives) without approval in writing of the Department Chair prior to beginning the cooperative experience.

GIST 1933 Co-op III N
3 Credits, 225 Lab Hours
 The student spends one semester employed in the GIS industry. Work duties are assigned under the supervision of a GIS professional. The student utilizes skills gained from GIS program courses and on-the-job training. This course cannot be substituted for a required concentration course (including GS electives) without approval in writing of the Department Chair prior to beginning the cooperative experience.

GIST 1941 Co-op I-A N
3 Credits, 225 Lab Hours
 The student spends one semester employed in the GIS industry. Work duties are assigned under the supervision of a GIS professional. The student utilizes skills gained from GIS program courses and on-the-job training. This course cannot be substituted for a required concentration course (including GS electives) without approval in writing of the Department Chair prior to beginning the cooperative experience.

GIST 1942 Co-op II-A N
3 Credits, 225 Lab Hours
 The student spends one semester employed in the GIS industry. Work duties are assigned under the supervision of a GIS professional. The training. This course cannot be substituted for a required concentration course (including GS electives) without approval in writing of the Department Chair prior to beginning the cooperative experience.

GIST 1943 Co-op III-A N
3 Credits, 225 Lab Hours
 The student spends one semester employed in the GIS industry. Work duties are assigned under the supervision of a GIS professional. The student utilizes skills gained from GIS program courses and on-the-job training. This course cannot be substituted for a required concentration course (including GS electives) without approval in writing of the Department Chair prior to beginning the cooperative experience.

Geography

◆**GEOG 1010 Physical Geography I** T
4 credits, 3 hrs. lecture, 3 hrs. Laboratory
 This course is the first of a two-semester laboratory science course for non-science majors. It introduces basic concepts of earth-sun relationships, atmospheric and oceanic movements and the fundamental principles of weather and climate.

◆**GEOG 1020 Physical Geography II** T
4 credits, 3 Lecture Hours, 3 hrs. laboratory
 This course is a continuation of Physical Geography I. The course explores basic concepts of the earth's physical structure, tectonic activity, local physical geography, and map interpretation.

GEOW 1030 World Geographic Regions T
3 Credits, 3 Class Hours
 This course surveys the interrelationships of spatial location and the major cultures of both developing and industrialized nations of the world. The course examines the geographical characteristics, economics, religions, and philosophies of diverse populations unique to the major geographic regions of the world. This course may be used as a Humanities or general elective. *Prerequisite: DSPR 0800, DSPW 0800 or equivalent*

Graphic Arts Technology

GART 1000 Introduction to the Macintosh Computer N
3 Credits, 3 Class Hours
 This class will focus on basic navigation in the Macintosh—the desktop, mouse, keyboard, windows, menus, and dialog boxes—with a detailed examination of memory, storage, disk organization, aliases and file operations. The Macintosh OS (operating system), fonts and font management, networking, and an overview of graphic file formats will also be covered, as will techniques for solving common software and hardware problems. One Macintosh computer per student is assigned for the course. *Prerequisites: All required developmental courses*

GART 1002 Type & Layout N
4 Credits, 4 Class Hours
 This class will focus on the fundamentals of visual design, layout and mechanical reproduction of printed communications. Topics will include a historical overview of typography and printing, basic principles of composition, a study of type and its architecture, non-digital mechanical preparation, mounting and presentation techniques, and graphic arts terminology, as well as a brief introduction to electronic prepress production using QuarkXPress. Emphasis will be placed on using graphics and typography to effectively communicate a clear message through class projects, discussion and critique.
Prerequisites: All required developmental courses; Co-requisite: GART 1000

GART 1003 Upgrading and Diagnostics for the Macintosh N
3 Credits, 3 Class Hours
 This class is a continuation of material covered in GA 1002. It will cover diagnostics and maintenance of the system software and functional hardware of Macintosh systems. Topics covered will include troubleshooting methods and diagnostic software, system and hardware upgrades, hardware and software specifications, and basic network fundamentals essential to digital prepress production professionals, particularly those working in a service bureau or heavy production environment. *Prerequisite: GART 1000*

GART 1005 Creativity and Idea Development N
3 credit hours, 3 class hours
 This course introduces students to methods of idea generation and problem solving for graphic artists. Students will learn to develop and present creative solutions to design, product development, and communications problems using brainstorming techniques, research, and critical analysis. They will express those ideas using thumbnails, storyboards, graphics and typography to develop communications that are appropriate for targeted audiences based on demographic information and cultural relevance. *Co-requisite: GART 1000*

GART 1030 Basic Computer Illustration N
4 Credits, 4 Class Hours
 An introduction to computer illustration using Adobe Illustrator. Emphasis will be placed on the creation of object-oriented graphics, line art and technical illustration by mastering the pen tool, using tracing templates, creating and editing display type and type outlines, working with 4-color process and custom spot color, and working with layers and masks. One Macintosh computer per student is assigned for the course. *Prerequisites: GART 1000*

| | |
|---|--|
| <p>GART 1040 Scanning and Photo Images N 4 Credits, 4 Class Hours Introduction to photographic image editing and manipulation using Adobe PhotoShop. Emphasis is placed on desktop scanning basics, color correction and electronic photo retouching, image manipulation, painting images and special effects. Topics include scanning and output resolution, working with clipping paths and using channels and layers. Ethics and copyright laws are also covered in relationship to the use of photographic and scanned imagery. One Macintosh computer per student is assigned for the course. <i>Prerequisite: GART 1000</i></p> | <p>GART 1941 Cooperative Education Work Experience I-A N 4 Credits, 300 Lab Hours In this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. <i>Prerequisite: Co-op advisor's approval</i></p> |
| <p>GART 1050 Electronic Publishing I N 4 Credits, 4 Class Hours Electronic prepress production of page layouts and documents using QuarkXpress. Emphasis is placed on mastering the basics of QuarkXpress—including setting up master pages, importing and formatting text, using tabs and paragraph formats, and working with imported photos and art—while learning to create forms, tables and multi-column, multi-page documents. Professional typography and typesetting techniques, file management and publishing excellence will be stressed. One Macintosh computer per student is assigned for the course. <i>Prerequisite: GART 1000</i></p> | <p>GART 1942 Cooperative Education Work Experience II-A N 4 Credits, 300 Lab Hours The student spends one semester in employment in the industry. Work duties are in the area of graphic arts technology using electronic prepress methods and concepts. The student receives first-hand experience using skills developed in the first-year technical courses. <i>Prerequisite: GART 1931 or GART 1941</i></p> |
| <p>GART 1060 Prepress Production I N 3 Credits, 3 Class Hours The printing process—traditional and electronic—will be covered in this class. Students will be exposed to various types of printing and printing prepress production techniques including trapping, stripping, halftones and 4-color process, line screens and resolution. <i>Prerequisite: All required Developmental courses</i></p> | <p>GART 1943 Cooperative Education Work Experience III-A N 4 Credits, 300 Lab Hours The student spends one semester in employment in the industry. Work duties are in the area of advanced graphic arts technology using advanced electronic prepress methods and concepts. The student receives first-hand experience in the job market working with actual projects under his/her supervisor's supervision. Credit earned will be additive; substitute credit will not be awarded. <i>Prerequisite: GART 1941 or GART 1942</i></p> |
| <p>GART 1200 Graphic Photography N 3 Credits, 3 Class Hours Photography for graphic artists and others who wish to produce photographs suitable for publishing or photo-illustration work. This course will instruct students in the use of basic photographic equipment including the 35mm camera, lenses, light meter, flash, and filters. Emphasis will be placed on choosing a subject, composition, using available light, and choosing film. There will also be instruction on art directing a photo shoot and evaluating and preparing prints and transparencies for use in printed publications. Students must provide their own 35mm camera. <i>Prerequisite: All required Developmental courses</i></p> | <p>GART 2000 Professional Practices in the Graphic Arts N 2 Credits, 2 Class Hours This class will focus on issues relevant to the graphic arts industry, including copyright law and other legal issues, ethics, pricing and marketing artwork, trade customs and professional business practices. <i>Prerequisite: GART 1000</i></p> |
| <p>GART 1901-1908 Technical Scholarship Program N 4 Credits, 300 Lab Hours The printing process—traditional and electronic—will be covered in this class. Students will be exposed to various types of printing and printing prepress production techniques including trapping, stripping, halftones and 4-color process, line screens and resolution.</p> | <p>GART 2040 Color & Electronic Imaging N 4 Credits, 4 Class Hours Introduction to color theory and perception and the use of color in producing electronic images. Students compose original images as they learn advanced features of Adobe PhotoShop. Emphasis is placed on using PhotoShop filters, creating special effects and mastering color control. One Macintosh computer per student is assigned for the course. <i>Prerequisites: GART 1040</i></p> |
| <p>GART 1931 Cooperative Education Work Experience I N 3 Credits, 225 Lab Hours In this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society. <i>Prerequisite: Co-op advisor's approval</i></p> | <p>GART 2505 Presentation Graphics N 3 Credits, 3 Class Hours Methods of conceptualizing and producing informational graphics will be explored using various presentation software, including Microsoft PowerPoint. Students will learn to evaluate information and determine the most effective methods and media for delivering that information to an audience. Designing effective charts and graphs will be covered and students will produce slides, overheads, on-screen presentations and simple interactive presentations. One Macintosh computer per student is assigned for the course. <i>Prerequisites: GART 1070, GART 1040</i></p> |
| <p>GART 1932 Cooperative Education Work Experience II N 3 Credits, 225 Lab Hours The student spends one semester in employment in the industry. Work duties are in the area of graphic arts technology using electronic prepress methods and concepts. The student receives first-hand experience using skills developed in the first-year technical courses. <i>Prerequisite: GART 1931 or GART 1941</i></p> | <p>GART 2060 Prepress Production II N 4 Credits, 4 Class Hours This class will cover file output to film for prepress production. Topics will include trapping, calibration, and quality control, troubleshooting complex files and checking a customer's file. Linking to other high-end systems and their uses will be covered as well. <i>Prerequisites: GART 1070, GART 1040</i></p> |
| <p>GART 1933 Cooperative Education Work Experience III N 3 Credits, 225 Lab Hours The student spends one semester in employment in the industry. Work duties are in the area of advanced graphic arts technology using advanced electronic prepress methods and concepts. The student receives first-hand experience in the job market working with actual projects under his/her supervisor's supervision. Credit earned will be additive; substitute credit will not be awarded.</p> | |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|---|---|---|---|
| GART 2070 Advanced Computer Illustration 3 Credits, 3 Class Hours Advanced computer illustration techniques using skills acquired in GA 1030 and GA 1040. Students will learn advanced features of Adobe Illustrator and will also learn to create illustrations using a variety of programs in combination. One Macintosh computer per student is assigned for the course. <i>Prerequisite: GART 1070, GART 1040 (ART 1550 or other drawing class recommended)</i> | N | GART 2526 Motion Graphics II 3 Credits, 3 Class Hours Advanced techniques are used in desktop video post production. This course will expand upon material covered in GA 2516, and will also include creation of video edit decision lists, advanced video editing in Adobe Premiere, and special effects, animation and moving typography using Adobe After Effects. Students will use video and still images to create QuickTime movies suitable for use in interactive multimedia production. One Macintosh computer per student is assigned for the course. <i>Prerequisite: GART 2516</i> | N |
| GART 2099 Portfolio Practicum 3 Credits, 3 Class Hours Students will develop, create and produce extended, comprehensive projects which will apply skills acquired in previous classes. The course will include instruction on portfolio development and presentation, visual problem solving and concept development. One Macintosh computer per student is assigned for the course. <i>Prerequisites: GART 1070, GART 2040, GART 2050</i> | N | GART 2530 Graphic Arts Internship 3 Credits, 3 Class Hours This course is designed to give the student supervised work experience in a graphic arts production environment. There will be no less than 225 contact hours for the semester. <i>Prerequisites: 12 credit hours in GART, 2.5 GPA, and Division Chair Approval</i> | N |
| GART 2500 Introduction to Interactive Multimedia 3 Credits, 3 Class Hours Introduction to interactive multimedia, theory and practice. Emphasis will be placed on conceptualizing and planning interactive multimedia projects, navigation, storyboard preparation and user interface design. Students will learn to produce and prepare graphics and animation, edit sound and script in an interactive program using Macromedia Director in combination with other programs. One Macintosh computer per student is assigned for the course. <i>Prerequisites: GART 1070, GART 1040</i> | N | GART 2950 Special Problems I 3 Credits, 3 Class Hours This course allows coverage of material not included in other courses, either on an independent study basis or in the classroom. (This course is generally used for the Graphic Arts Department Internship. 80 contact hours for the semester.) <i>Prerequisite: Division chair approval</i> | N |
| GART 2512 Publishing on the Internet 4 Credits, 4 Class Hours This class will cover production and placement of graphic images into electronic documents for display over the Internet. Students will be introduced to the World Wide Web (WWW) and basics of human interface design including creation and placement of icons, preparation of graphic files for use on the WWW including GIF, animated GIF and JPEG formats, Hypertext Markup Language (HTML) tags for establishing links, and creating client-side image maps, tables and frames. Students will create and load a personal web site for display over the Internet. One Macintosh computer per student is assigned for the course. <i>Prerequisites: GART 1070, GART 1040</i> | N | Health | |
| GART 2516 Motion Graphics I 3 Credits, 3 Class Hours Introduction to desktop video post production for small and full-screen viewing. Topics will include storyboarding, preparation of video and graphic images for use in video, video editing and creating video editing decision lists, audio editing, transitions and special effects, animation and moving typography. Students will use video and still | N | HLTH 1050 Personal Health 3 Credits, 3 Class Hours This course is a study of personal health including mental health; hygiene, communicable disease, degenerative disease, nutrition, drug use/abuse, and other health related problems. It explores the principles and habits of wholesome living. | N |
| GART 2518 3D Modeling & Animation for Multimedia 3 Credits, 3 Class Hours Introduction to 3 dimensional imaging uses the Macintosh for digital production purposes. Students will be trained using an industry standard 3D modeling software platform. Through the use of this software students will create new images, modify existing 3D images and create environments for objects produced. Other topics to be covered will include Image sequencing, velocity, placement, and transition. Students will use photographic, vector oriented images to create animated GIF, or QuickTime movies. <i>Prerequisites: GART 1070, GART 2040</i> | N | HLTH 1100 Children's Health 2 credits, 2 Class Hours This course is a study of children's health as it relates to optimum growth and development individually and in group settings. Emphasis is on safe environments in the home, family, day care centers, and schools. It includes survey of prevention and control of childhood diseases, nutrition, parent and community education, state health regulations, and available health social services. | N |
| GART 2599 Applied Problems in Interactive Multimedia 4 Credits, 4 Class Hours Students will develop and produce interactive multimedia projects using skills acquired in previous classes. Emphasis will be placed on scripting in Macromedia Director for efficient navigation, precise movement and timing. Topics covered will include advanced animation techniques and 3-dimensional graphics and project management for multimedia. It is recommended that this course be taken in the student's final semester. One Macintosh computer per student is assigned for the course. <i>Prerequisite: GART 2500</i> | N | HLTH 2210 Health First Aid and Safety 3 credits, 3 Class Hours This course explores basic first aid and safety principles and focuses on providing emergency care and accident prevention training in personal, school, home, and family environments. CPR included | N |
| | | History | |
| | | ◆HIST 1110 Survey of World Civilizations I 3 Credits, 3 Class Hours The course traces forms of civilizations from beginnings to 1500. <i>Prerequisite: DSPW0800, DSPR0800 or equivalent</i> | T |
| | | ◆HIST 1120 Survey of World Civilization II 3 Credits, 3 Class Hours The course traces forms of civilizations from 1500 to the present. <i>Prerequisite: DSPW 0800, DSPR 0800 or equivalent</i> | T |
| | | ◆HIST 2010 Survey of the United States to 1877 3 Credits, 3 Class Hours Students study the history of the United States from discovery to the end of political reconstruction. <i>Prerequisite: DSPW 0800, DSPR 0800 or equivalent</i> | T |
| | | ◆HIST 2020 Survey of the United States since 1877 3 Credits, 3 Class Hours Students study the history of the United States from 1877 to the present. <i>Prerequisite: DSPW 0800, DSPR 0800 or equivalent</i> | T |

◆ **HIST 2030 African-American History** T
3 Credits, 3 Class Hours
 The course surveys the African-American experience from the African background to the present. *Prerequisite: DSPW 0800, DSPR 0800 or equivalent*

HIST 2040 Women in American History T
3 Credits, 3 Class Hours
 The course is a survey of women's role in American History from colonial times through the 1970s. The accomplishments of those notable women who have made the pages of history texts will be examined but the primary emphasis will be on the lives and activities of the mainstream of American women from slaves and homemakers to wage earners and professionals. *Prerequisite: DSPW 0800, DSPR 0800 or equivalent*

Honors

HONR 1110 Inquirere I N
3 Credits, 3 Class Hours
 This is a seminar course for honors and specially admitted students and uses modes of inquiry from the various disciplines. Students will explore with a professor, the community, and visiting guest lecturers, a selected theme. The process of reflecting, researching, analyzing, evaluating, and presenting is as important as the content. Each student will complete a thematic inquiry project and publicly present it to the college community during Honors Week.

Hospitality Management

HMGT 1030 Introduction to Hospitality N
3 Credits, 3 Class Hours
 This course provides an orientation to the hospitality industry. This includes an introduction to the structure of lodging food service, and tourism organizations, the role of lodging departments, the future of the industry and career opportunities. Course structure includes lecture, projects, discussion, and guest speakers to learn about opportunities, trends and organizations in the hospitality field. This course has a writing emphasis and will require numerous small written assignments and a minimum of a one project or term paper for understanding and further study of the industry.

HMGT 1140 Professional Housekeeping N
3 Credits, 3 Class Hours
 The student receives instruction in both the housekeeping and managerial functions of the professional housekeeper. Additionally, duties and responsibilities, methodology, selection of supplies, care and treatment of the various parts of the facility, equipment care, safety, fire prevention, and health of the housekeeping department are addressed.

HMGT 1110 Travel Agency Operations I N
4 Credits, 2 Class Hours, 4 Lab Hours
 Students study basic organizational and procedural principles as they apply to the regular operations of a travel agency. These topics include legal aspects, building new sales accounts, and the effects of deregulation in the travel industry. Laboratory time includes an introduction to the use of global distribution system software, particularly Worldspan, used in travel agency operations for researching travel product availability and price inquiries, making travel reservations, and retrieving travel data.

HMGT 1120 Travel Agency Operations II N
3 Credits, 1 Class Hours, 4 Lab Hours
 Students continue the exploration of aspects of travel agency operations. Laboratory time is devoted to providing students additional and more advanced techniques of utilizing global distribution system software to research, price and sell travel and travel related products.

HMGT 1170 Hospitality Sales and Marketing N
3 Credits, 3 Class Hours
 Part of the Travel and Tourism concentration, this course is an introduction to the broad scope of hospitality marketing with emphasis on the analysis, structure, and strategy of the travel industry. Budget-

ing, allocation of resources, market research, media selection and effectiveness of marketing plans are also stressed.
Pre-Requisite: MKTG 2000

HMGT 1200 Lodging Management N
3 Credits, 3 Class Hours
 Front office procedures and systems including front office salesmanship, registration and reservation, credit, records maintenance, accounting procedures, night audit, guest relations, and the handling of unusual situations are studied in this course.
Co-requisite: HMGT 1205

HMGT 1205 Property Management Systems N
2 Credits, 4 Lab hours
 In this laboratory course, students will work with property management system (PMS) software to develop a working knowledge of the proper usage, techniques, capabilities and limitations of these software systems. Time is spent both on campus and at various local hotels learning and using various PMS software packages.
Co-requisite: HMGT 1200

HMGT 1220 Purchasing and Control N
3 Credits, 3 Class Hours
 The student is introduced to control systems and principles of purchasing for food, beverage, and lodging operations. Food specification and grading are emphasized. Inventory levels, receiving, and issues are covered. Determination of cost of sales, sales percentages and effectiveness of control systems are studied.
Prerequisite: MATH 1130

HMGT 1240 Food and Beverage Cost Control N
3 Credits 3 Class Hours
 Students utilize math applications as they develop a thorough background for the hospitality industry's cost control system. The emphasis is on problem-solving as students study the mechanics of determining food costs, sales percentages, mark-ups, cost of goods sold, etc. Emphasis is placed upon the short- and long-term effectiveness of diverse cost control systems as they impinge on the human, material and mechanical structure of an enterprise.
Prerequisite: MATH 1130

HMGT 1931 Cooperative Education Work Experience I N
3 Credits, 225 Class Hours
 In this course students receive supervised part-time employment in lodging, travel planning, and/or food service while enrolled at the college. The office of Cooperative Education makes placement after all requirements for employment are met. Students are required to perform skills needed in the industry and to keep records of their experiences. *Prerequisite: Twelve (12) semester credit hours with a GPA of 2.5 or higher*

HMGT 1932 Cooperative Education Work Experience II N
3 Credits, 225 Class Hours
 Students receive supervised part-time employment in lodging, travel planning and/or food service. Placement and grading are the same as for HMGT 1931. *Prerequisite: HMGT 1931*

HMGT 1933 Cooperative Education Work Experience III N
3 Credits, 225 Class Hours
 Students receive supervised part-time employment in lodging, travel planning and/or food service. Placement and grading are the same as for HMGT 1931. *Pre-Requisite: HMGT 1932*

HMGT 1934 – Cooperative Education Work Experience IV N
3 Credits, 225 Class Hours
 Students receive supervised part-time employment in lodging, travel planning and/or food service. Placement and grading are the same as for HMGT 1931. *Prerequisite: HMGT 1933*

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|--|---|---|---|
| <p>HMGT 2120 Beverage Management 3 Credits, 3 Class Hours The history, identity, and service of wines, beers, and spirits are covered extensively. Basic mixology as well as bar layout, purchasing and specifications, legal restrictions, glassware and supplies, service and control systems unique to beverage operations are studied. The course includes emphasis on the problems of alcohol abuse and the effect of alcoholic consumption on highway safety. A minimum of three written reports is required.</p> | N | <p>HMGT 2290 Travel Destinations and Planning 3 Credits 3 Class Hours The students study the application of research skills in researching unfamiliar destinations, both national and international. Topics include research methods and the history, culture and nature of world regions and areas. Emphasis is placed on the study of worldwide nationalities in terms of recreational geography, economic descriptions and environmental conditions. Attention is given to the major attractions of various countries at specific times including cultural, industrial, historical and artistic displays and to seasonal events such as festivals, camping, and sports activities.</p> | N |
| <p>HMGT 2190 Catering and Buffet 4 Credits 2 Class Hours 4 Lab Hours This course emphasizes the preparation of cold and hot entrees, sales, garnishments and ice carvings for catering events with substantial attention to practical techniques for the preparation of show pieces. The buffet segment enables the student to plan, organize, and set up a complete buffet. <i>Prerequisite: HMGT 2225</i></p> | N | | |
| <p>HMGT 2221 Layout, Operations and Maintenance of Hotels and Restaurants 3 Credits 3 Class Hours Problems and considerations of facilities management are introduced to the student in this course. Factors governing the selection, placement, and maintenance of equipment for effective and efficient use in food service and lodging operations are discussed. Students prepare a project of the appropriate equipment, layout, and design of a hospitality facility.</p> | N | | |
| <p>HMGT 2225 Food and Beverage Preparation 4 Credits 2 Class Hours 4 Lab Hours Students experience a wide range of food service function types with vegetable, bakery, meat, poultry, fish and shellfish preparation being studied in both lecture and laboratory situations in this course. Each student plans and executes a function serving the public, with responsibility for all phases of the operation, including preparation, safety, sanitation, recipe determination, staffing, service, cost control, and dining room decor and atmosphere. Each student prepares a comprehensive report of the function. <i>Prerequisite: DIET 1810</i></p> | N | | |
| <p>HMGT 2230 Legal Aspects of Hospitality Administration 3 Credits 3 Class Hours Students are introduced to the American legal system and basic business law concepts as well as laws unique to the hospitality industry. Selected topics in contracts, torts, and hospitality law are discussed with emphasis on lodging and beverage laws. The case study approach is utilized to afford the student an appreciation of the legal duties of hospitality owners and operators in order to avoid or minimize legal liabilities and exposure.</p> | N | | |
| <p>HMGT 2240 Managerial Accounting for the Hospitality Industry 4 Credits 4 Class Hours Elements of cost and financial statement analysis are studied in this problem-solving-oriented course. Students are acquainted with financial and operating ratios, budgeting, pricing, cost-volume-profit relationship, cost analysis and potentials, cash management, and investment considerations. <i>Pre-Requisite: ACCT 1210</i></p> | N | | |
| <p>HMGT 2261 Advanced Food Preparation 4 Credits 2 Class Hours 4 Lab Hours Students study and prepare regional, national, or specialty foods to enhance their food preparation skills and knowledge. Particular attention is given to current food trends. Students will plan, cost and design menus. <i>Pre-Requisite: HMGT 2225</i></p> | N | | |
| <p>HMGT 2280 Convention and Meeting Planning 3 Credits 3 Class Hours Part of the Travel and Tourism concentration, this course instructs students in the skills necessary to plan for a one-hour to a one-week or more deluxe conference and/or convention. Course content includes resources, marketing techniques, sales leads, logistics, and follow-up.</p> | N | | |
| Human Services | | | |
| | | <p>HSER 1300 Life-style Management 1-3 Credits, 1-3 Lecture Hours This course is a study of factors affecting individual life-styles. Students will examine proven management techniques designed to help them improve their life-styles.</p> | N |
| | | <p>HSER 1450 Orientation to Functions of Substance Abuse Counselor 3 Credits, 3 Lecture Hours This course is an introduction to the twelve core competencies required for effective practice as a substance abuse counselor. Opportunities for practical skill development in each primary function will be emphasized.</p> | N |
| | | <p>HSER 1500 Counseling Theories 3 Credits, 3 Lecture Hours This course presents a comparative approach to counseling and psychotherapy practice orientations. Exposure to the most commonly utilized theoretical orientations will include psychodynamic, behavioral, cognitive behavioral, social learning, client centered, gestalt, transactional analysis and systems theories.</p> | N |
| | | <p>HSER 1510 Principles of Substance Abuse Education 3 Credits, 3 Lecture Hours This course addresses the social, political, physiological, and behavioral aspects of alcohol and drug abuse. Exploration of the nature of psychoactive substances and the various theories explaining abuse by different populations will be emphasized. Theories and methods of prevention techniques for substance abuse will be presented.</p> | N |
| | | <p>HSER 1520 Methods of Substance Abuse Treatment 3 Credits, 3 Lecture Hours This course emphasizes real-world applications in approaches to therapy as described in the counseling theories course. Routine activities that take place in typical substance treatment settings are presented. Primary settings covered are inpatient, outpatient, and the modality of day treatment. Family dynamics models, including co-dependency and adult children of alcoholics will be covered. <i>Prerequisite: HSER 1500 Counseling Theories.</i></p> | N |
| | | <p>HSER 1600 Special Problems in Human Services 1-3 Credits, 1-3 Lecture Hours This course is an in-dept study of a particular area of interest in human services.</p> | N |
| | | <p>HSER 1700 Adult Development 3 Credits, 3 Lecture Hours This course of study is a study of the biological, cognitive, emotional, social, and personality development in adult life (late teens to death). Major theorists such as Erickson, Neugarten, Gould, Levinson, and Lowenthal will be examined. Opportunities to apply these theories to personal life structure are included.</p> | T |
| | | <p>HSER 1810 Orientation to Human Services 3 Credits, 3 Lecture Hours This course of study is an introduction to human services in our society with emphasis on current needs, practices, and projected changes.</p> | T |

| | | | |
|---|---|---|---|
| <p>HSER 1820 The Skilled Helper: Techniques and Strategies 3 Credits, 3 Lecture Hours This course of study is an introduction to the various therapeutic intervention techniques principles and procedures. Practical skill development in selected counseling and interviewing techniques is the focus of this course.</p> | N | <p>INET 2003 Production and Operations Management 3 Credits, 2 Class Hours, 3 Lab Hours This course covers the following areas: forecasting, production planning, financial analysis, inventory control, resource management, CPM and PERT scheduling, Materials Resource Planning (MRP), and Just-In-Time (JIT) manufacturing. Computer programs are demonstrated. <i>Prerequisite: MATH 1740 or approval of program coordinator</i></p> | N |
| <p>HSER 1850 Group Facilitation Skills 3 Credits, 3 Lecture Hours This course is an introduction to interpersonal concepts and communication problems. Attitudes, feelings and past experiences as related to student's interactions in group work are explored. Analysis of group types and development of specific group process competencies are emphasized. <i>Prerequisite: HSER 1820.</i></p> | N | <p>INET 2014 CNC and Robotics 4 Credits, 3 Class Hours, 2 Lab Hours This course addresses the requirement that the mechanical and industrial engineering technology technicians be skilled in the principles of computer-integrated manufacturing. Emphasis is placed on Computer Numerical Control (CNC) machines and their programming. Industrial robots and computer-controlled systems are discussed highlighting their applications. <i>Prerequisites: INET 1004, MEET 1144, or approval of program coordinator</i></p> | N |
| <p>HSER 2930 Human Services Field Experience I 4 Credits, 1.5 Class Hours, 160 Lab Hours This course is 160 hours of supervised experience in human-services agencies that serve clients directly. Students will choose an agency from diverse human services areas such as geriatrics, substance abuse counseling, mental health, mental retardation and other prevention services. In-class activities on campus include 1.5 hrs in a weekly seminar.</p> | T | <p>INET 2023 Motion and Time Analysis 3 Credits, 2 Class Hours, 3 Lab Hours This course presents the principles and techniques used in work measurement and operation analysis. Topics involved are operator and machine process charts, product flow charts, operation routing charts, motion economy laws, standard time study methods, and synthetic time study methods. Videotape analysis and applicable computer programs are demonstrated. Technical report writing is emphasized and the student is required to write formal reports on laboratory projects. <i>Prerequisites: ENGL 1010, INET 1004, INET 2003 or approval of program coordinator</i></p> | N |
| <p>HSER 2940 Human Services Field Experience II 4 credits, 1 Class Hour, 3 Lab Hours This course is a continuation of Human Services Field Experience I. <i>Prerequisite: HSER 2930 Human Services Field Experience I</i></p> | T | <p>INET 2034 Plant Layout and Materials Handling 4 Credits, 3 Class Hours, 2 Lab Hours This course is a practical study of facilities planning with emphasis on the most efficient arrangement of work areas to achieve the lowest production costs. Topics covered are equipment location, material handling, automatic storage and retrieval, bar coding, capital requirements, personnel organization, and safety. Computer-aided design problems are performed. <i>Prerequisite: MEET 1220, INET 1004 or approval of program coordinator</i></p> | N |
| <p>HSER 2950 Human Services Field Experience III 4 credits This course is a continuation of Human Services Field Experience II. <i>Prerequisite: HSER 2940 Human Services Field Experiences II</i></p> | T | | |

Industrial Engineering Technology

| | | | |
|--|---|---|---|
| <p>INET 1004 Technical Computer Applications 4 Credits, 3 Class Hours, 2 Lab Hours This course is a practical experience in using windows based personal computers for special business and industrial applications. An integrated software system (Microsoft Office) applying a word processor, a spreadsheet, and a database used separately and integrated is used. BASIC programming and Windows are also covered. <i>Prerequisite: DSPM 0850 or approval of program coordinator</i></p> | N | <p>INET 2043 Statistical Quality Control 3 Credits, 2 Class Hours, 3 Lab Hours This course covers the statistical concepts of frequency distributions, Xbar-R charts, attribute charts, lot-by-lot acceptance sampling plans, and the normal curve. Other topics include product reliability, process capability, preventive maintenance, and quality assurance. Computer applications are demonstrated. <i>Prerequisites: INET 1004 or approval of program coordinator</i></p> | N |
| <p>INET 1210 Measuring Techniques I 4 Credits, 3 Class Hours, 2 Lab Hours This course explores basic methods of measurement and data collection for industry. The hands-on use of traditional equipment such as micrometers, calipers, scales, sine bars, protractors, gage blocks, and surface plates as well as the calibration and maintenance of measuring equipment will be emphasized. Units, conversions, and basic shop mathematics are an important part of the course. <i>Prerequisite: DSPM 0850 or approval of program coordinator</i></p> | N | <p>INET 2054 Computer-Integrated Manufacturing 4 Credits, 3 Class Hours, 2 Lab Hours This course is designed to provide an overview of automation and computer-integrated manufacturing methods in modern production plants. Emphasis is placed on economics as well as technical issues related to automation. The course topics include flow-line production, numerical control, industrial robots, computer-integrated manufacturing, process monitoring and control, and group technology. <i>Prerequisite: INET1004 or approval of program coordinator</i></p> | N |
| <p>INET 1220 Measuring Techniques II 4 Credits, 3 Class Hours, 2 Lab Hours As a continuation of INET 1210, this course explores more advanced methods of measurement and data collection for industry. Inspection techniques covered include computer-based laser, optical, digital and automated. Equipment covered includes Coordinate Measuring Machines (CMM), Configurable Vision Inspection Modules (CVIM), optical comparators, robots and sensors. The hands-on use of high-tech equipment and Geometric Dimensioning and Tolerancing (GDT) is emphasized as well as the statistical use of data. The student is introduced to quality assurance and inspection documentation. <i>Prerequisites: INET 1210, MATH 1740 or approval of program coordinator</i></p> | N | <p>INET 1901-1908 Technical Scholarship Program 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses.</i></p> | N |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

INET 1931 Cooperative Education Work Experience I N
3 Credits, 225 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, and the impact it has on today's society.

INET 1941 Cooperative Education Work Experience I-A N
4 Credits, 300 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

INET 1932 Cooperative Education Work Experience II N
3 Credits, 225 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of industrial engineering technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements.
Prerequisite: INET 1931 or INET 1941

INET 1942 Cooperative Education Work Experience II-A N
4 Credits, 300 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of industrial engineering technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements.
Prerequisite: INET 1931 or INET 1941

INET 1933 Cooperative Education Work Experience III N
3 Credits, 225 Lab Hours
 The student acquires work experience in the industrial engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Industrial Engineering Technology courses to accomplish tasks as assigned by the engineer. *Prerequisite: INET 1932 or INET 1942*

INET 1943 Cooperative Education Work Experience III-A N
4 Credits, 300 Lab Hours
 The student acquires work experience in the industrial engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Industrial Engineering Technology courses to accomplish tasks as assigned by the engineer. *Prerequisite: INET 1932 or INET 1942*

Industrial Maintenance Technology

INMT 1104 Basic Machine Tool Operations N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course covers the terminology, measuring principles and basic machine shop techniques utilized in maintenance departments and production and job shops. Subjects covered are hand tools, benching, taps and dies, semi-precision, precision measurement, and layout practices. Machine tool operations covered include drills and drilling, turning machines, horizontal milling machines, shapers, grinding and abrasive machining process. Safety is stressed during the course and industrial terminology is used.

INMT 1114 Blueprint Reading and Drafting N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course covers terminology and the basic techniques and fundamentals of drafting to prepare the student to read blueprints and for more advanced classes in engineering drawing. Lettering techniques, use of drawing instruments and scales, applied geometric construction, orthographic projection, isometric drawing, and drawing layout procedures are covered. Also included is an introduction to computer-aided drafting.

INMT 1124 Welding Processes N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is designed to enhance one's interest and knowledge in the art and science of welding. Emphasis is placed on shielded metallic arc

welding (S.M.A.W.), oxygen-acetylene welding (O.A.W.), plasma arc cutting, gas tungsten arc welding (G.T.A.W.), gas metal arc welding (G.M.A.W.), and other industrially important welding processes. The topics of destructive testing, nondestructive testing, properties, identification, and heat treatment of metals are presented.

INMT 1204 Advanced Machine Tool Operations N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is a continuation of Basic Machine Tool Operations and provides additional hands-on experience to promote safe and proper operation of machine tools. The machine shop techniques learned in the basic course are utilized to produce an assigned project. Additional machine tool operations, combined with related information, are included to build on the knowledge and experience already gained. Standard/special cutting tools, metallurgy, precision measurement and special machine processes are covered. Safe working practices are continually stressed.

INMT 1214 Pipefitting and Plumbing Practices N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course covers the various plumbing and pipefitting connections and types of pipe normally used in industry. The practical applications of materials, tools, and calculations necessary for the layout of plumbing, pipefitting, and gas systems are emphasized. Laboratory work includes layout, cutting, bending, fabrication, installation, and maintenance of a typical process, utility and waste piping system. Labs also include the valves and fittings peculiar to each system. Safety instructions are stressed continually throughout the course.

INMT 2104 Electrical Circuit Fundamentals N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is designed to acquaint the student with the fundamental concepts of DC and AC electrical circuits. The theory of electron flow, magnetism, production of electricity, series circuits, circuits containing resistance, inductive reactance, and capacitive reactance are discussed. The proper use of measuring equipment and personal safety is stressed throughout the course. *Prerequisite: MATH 1740 or approval of program coordinator*

INMT 2110 Fluid Power I N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course presents the basic principles of hydraulics and pneumatics and its practical applications. Emphasis is placed on a fundamental understanding of the physical principles of fluid power and the principles of applications of different types of pumps and compressors and the role each plays in a total fluid power system. The design, application, and maintenance of system components are reinforced in the laboratory where work is accomplished on actual equipment and systems. *Prerequisite: MATH 1740 or approval of program coordinator*

INMT 2124 Air Conditioning Principles N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course covers the basic principles of air conditioning and refrigeration, including, but not limited to, theory, refrigerants, systems evacuation, system charging, controls, metering devices, evaporators, condensers, compressors, heat pumps, and troubleshooting. The proper use of tools and equipment as well as personal safety is stressed throughout. This course requires the preparation of formal reports.

INMT 2133 Motion and Power N
3 Credits, 2 Class Hours, 2 Lab Hours
 This course examines the use of basic machines in industrial settings. Power transmission methods are stressed. Laboratory exercises cover the mechanical drive devices, gears, pulleys and belts, roller chain assemblies, timing belts, clutches, conveyor belts and shaft connections and alignment. Safety practices are emphasized along with the industrial applications. *Prerequisite: MATH 1740 or approval of program coordinator*

| | | | |
|--|---|---|---|
| <p>INMT 2204 Motors and Controls 4 Credits, 3 Class Hours, 2 Lab Hours This course covers the physical and electrical characteristics of alternators, generating sets, squirrel cage motors, wound-rotor motors, synchronous motors, AC series motors, control devices and applications, including the expanding use of solid-state control devices and applications. At the same time, this course covers the basic concepts of motor controls to enable the student to build technical competence upon a firm understanding of principles. It is assumed that the student has a basic understanding of electrical theory. The proper use of tools and equipment as well as personal safety is stressed throughout. <i>Prerequisite: INMT 2104</i></p> | N | <p>INMT 1931 Cooperative Education Work Experience I 4 Credits, 225 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.</p> | N |
| <p>INMT 2213 Occupational Safety 3 Credits, 3 Class Hours In this course, the students receive instruction in environmental and industrial safety practices. Also covered are the essential procedures used to assure an effective safety program in the workplace. Particular emphasis is placed on fire prevention and protection, material data sheets, governmental and safety standards, and accident prevention.</p> | N | <p>INMT 1941 Cooperative Education Work Experience I-A 4 Credits, 225 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.</p> | N |
| <p>INMT 2120 Fluid Power II 4 Credits, 3 Class Hours, 2 Lab Hours This course is a continuation of Fluid Power I and covers design of basic hydraulic and pneumatic circuits and safety circuits. Emphasis is placed on operation, application and installation of pressure intensifiers, torque devices, pumps, motors, fundamentals of reservoirs and plumbing, as well as accumulators, packings, and seals. Proper maintenance and troubleshooting are stressed in this course. <i>Prerequisite: INMT 2110</i></p> | N | <p>INMT 1932 Cooperative Education Work Experience II 4 Credits, 225 Lab Hours In this course the student receives supervised work experience in any of the many facets of industrial maintenance technology. The student performs technician-level work applying knowledge gained in the he first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: INMT 1931 OR INMT 1941</i></p> | N |
| <p>INMT 2224 Boiler and Heating Operations 4 Credits, 3 Class Hours, 2 Lab Hours This is an introductory course covering the principles of operation, maintenance, construction, and regulation of steam boilers and gas heating systems. The basic principles of metallurgy, materials selection and utilization combined with the operational concepts of fire tube, water tube, and hot water heating boilers are discussed. Emphasis is placed on details of construction, a knowledge of fuels, AGA specifications, firing controls and programmers, operational problems, and repair and maintenance of steam boilers and heating systems. Safety is an integral part of the course.</p> | N | <p>INMT 1942 Cooperative Education Work Experience II-A 4 Credits, 225 Lab Hours In this course the student receives supervised work experience in any of the many facets of industrial maintenance technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: INMT 1931 OR INMT 1941</i></p> | N |
| <p>INMT 2254 Advanced CNC and Robotics 4 Credits, 3 Class Hours, 2 Lab Hours This course is designed to be a continuation of IE 2014, CNC and Robotics. Primary emphasis is placed on the logical analysis and problem-solving techniques associated with the operation and maintenance of CNC machining centers and industrial robots. Advanced programming features such as mirror imaging, polar rotation, datum shifts, turning, and threading are presented. Off-line computers used in CAD/CAM/CIM systems are covered along with robotic applications. Hands-on labs are featured. <i>Prerequisite: INET 2014</i></p> | N | <p>INMT 1933 Cooperative Education Work Experience III 4 Credits, 225 Lab Hours The student acquires work experience in the industrial maintenance technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Industrial Maintenance Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: INMT 1932 OR INMT 1942</i></p> | N |
| <p>INMT 2264 Automated Industrial Systems 4 Credits, 3 Class Hours, 2 Lab Hours This course is designed as a hands-on approach to the automated industrial systems in a modern manufacturing or service organization. CNC machining centers, robotics, automated conveyors, automatic storage and retrieval systems, vision inspection and identification systems are examined. A systematic approach to troubleshooting coupled with logical preventive maintenance program is an integral part of the course. <i>Prerequisite: INET 2014</i></p> | N | <p>INMT 1943 Cooperative Education Work Experience III-A 4 Credits, 225 Lab Hours The student acquires work experience in the industrial maintenance technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Industrial Maintenance Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: INMT 1932 OR INMT 1942</i></p> | N |
| <p>INMT 1901-1908 Technical Scholarship Program 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible. <i>Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses.</i></p> | N | | |

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
 T – Denotes courses designed for transfer to four-year institutions
 N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | |
|---|---|
| <p>ITEC 1006 Utilities/Hard Disk Management N 4 Credits, 4 Class Hour This course includes utility programs that aid in the operation of microcomputer software and hardware. Advanced operating systems, paragraphs, following the conventions of a standard reference format, to describe the data to be processed and to specify the required procedures. The rules and language are taught using the structured approach, and various business problems are solved on the computer during laboratory hours. One computer per student is assigned for the course. <i>Prerequisite: ITEC 1002</i></p> | <p>ITEC 1942 Cooperative Education Work Experience II A N 4 Credits, 300 Lab Hours The student spends one semester in employment in the IT industry. Work duties are in the area of the student's declared concentration within the IT program. This course may not be substituted for a required concentration course (including IT electives) without approval (in writing) of the Department Chair prior to beginning the co-op experience. <i>Prerequisite: ITEC 1931 or ITEC 1941</i></p> |
| <p>ITEC 1151 RPG/400 Programming N 4 Credits, 4 Class Hours RPG (Report Program Generator) is a high level, problem solving language. It is used almost exclusively on the IBM AS/400. This course is designed to give the student a sound understanding of how to write and run programs that range from simple to complex in nature. It prepares the student to enter the information systems field with a good basic knowledge of how to use RPG. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1002</i></p> | <p>ITEC 1943 Cooperative Education Work Experience III A N 4 Credits, 300 Lab Hours The student spends one semester in employment in the IT industry. Work duties are in the area of the student's declared concentration within the IT program. This course may not be substituted for a required concentration course (including IT electives) without approval (in writing) of the Department Chair prior to beginning the co-op experience. <i>Prerequisite: ITEC 1931 or ITEC 1941</i></p> |
| <p>ITEC 1171 Web Programming I N 4 Credits, 4 Class Hours The focus of this introductory course is on designing and creating a Web site with web pages written in Hypertext Markup Language (HTML), XHTML, and client-side JavaScript, using a text only editor. HTML/XHTML topics include basic tags, tables, frames, forms, and image mapping. Students will recognize and employ types of enhancements that JavaScript can provide to web pages; identify how and where JavaScript can be placed on a web page; use error-handling features of the Web browser to find scripting errors; describe basic concepts of the JavaScript language, including objects, event handling, functions, Sheets (CSS). The student will publish and maintain a Web site, using HTML, CSS, and JavaScript, including posting to a Web server, both locally and remotely. <i>Prerequisite: ITEC 1002</i></p> | <p>ITEC 2172 Web Programming III N 4 Credits, 4 Class Hours This course introduces students who have successfully completed (in writing) of the Department Chair prior to beginning the co-op experience. <i>Prerequisite ITEC 1931 or ITEC 1941</i></p> |
| <p>ITEC 1330 Concepts of Communications/Networking N 4 Credits, 4 Class Hours This course includes basic communications concepts, terminology, techniques, and applications for data communications and networking of microcomputers. Writing across the curricula is stressed in this course, with technical writing skills and documentation techniques emphasized. One computer per student is assigned for the course. <i>Prerequisites: ITEC 1002 or both ITEC 1004 and EA 2814</i></p> | <p>ITEC 2121 Advanced C++ N 4 Credits, 4 Class Hours This class is a continuation of the study of object-oriented programming using C++. This includes using object oriented analysis and design to develop Windows applications using Microsoft's Visual C++. Students will further explore complex OOP topics such as inheritance, composition, and exception handling. One computer per student is assigned for the course. <i>Prerequisites: ITEC 2111</i></p> |
| <p>ITEC 1932 Cooperative Education Work Experience II N 3 Credits, 225 Lab Hours The student spends one semester in employment in the IT industry. Work duties are in the area of the student's declared concentration within the IT program. This course may not be substituted for a required concentration course (including IT electives) without approval (in writing) of the Department Chair prior to beginning the co-op experience. <i>Prerequisite ITEC 1931 or ITEC 1941</i></p> | <p>ITEC 2114 Windows Visual Basic II N 4 Credits, 4 Class Hours This course is intended for students with a basic working knowledge of the Microsoft Visual Basic Programming system and experience developing windows-based applications. In this course students learn the concepts needed to write sophisticated event-driven applications with full error trapping and context-sensitive help for Microsoft Windows. One computer per student is assigned for the course. <i>Prerequisite: ITEC 1104</i></p> |
| <p>ITEC 1933 Cooperative Education Work Experience III N 3 Credits, 225 Lab Hours The student spends one semester in employment in the IT industry. Work duties are in the area of the student's declared concentration within the IT program. This course may not be substituted for a required concentration course (including IT electives) without approval (in writing) of the Department Chair prior to beginning the co-op experience. <i>Prerequisite: ITEC 1931 or ITEC 1941</i></p> | <p>ITEC 2124 Windows Visual Basic III N 4 Credits, 4 Class Hours This course presents an overview of designing Visual Basic database applications for both server-based and single user databases using Visual Basic, the Professional Edition. Topics included are client/server elements, data formats (ODBC, MBD and ISAM), access objects, and various local and remote access APIs. This course is intended for students with a good foundation in Visual Basic programming and experience in developing Windows applications. One computer per student is assigned for the course. <i>Prerequisite: ITEC 2114</i></p> |
| <p>ITEC 1941 Cooperative Education Work Experience I A N 4 Credits, 300 Lab Hours The student spends one semester in employment in the IT industry. Work duties are in the area of the student's declared concentration within the IT program. This course may not be substituted for a required concentration course (including IT electives) without approval (in writing) of the Department Chair prior to beginning the co-op experience.</p> | <p>ITEC 2141 COBOL Advanced N 4 Credits, 4 Class Hours Advanced COBOL programming techniques are taught using VSAM disk files and integrated programs. File access and organization are covered for sequential, indexed sequential and relative files. The student is introduced to advanced debugging techniques. One computer per student is assigned for the course. <i>Prerequisite: ITEC 2111</i></p> |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|--|---|--|---|
| <p>ITEC 2142 CICS 4 Credits, 4 Class Hours This course encompasses fundamental concepts of data communication and programming using command level CICS. It includes basic mapping support, CICS tables, and coding in COBOL to handle on-line processing. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1141</i></p> | N | <p>ITEC 2156 Client Access/400 and Visual RPG 4 Credits, 4 Class Hours This course introduces the student to AS/400 Client/Server technology and development using AS/400 Client/Server tools, such as Client/Access 400. Features of Visual RPG are also covered. One workstation per student is assigned for the course. <i>Prerequisites: ITEC 2151 and ITEC 2153</i></p> | N |
| <p>ITEC 2143 System Design 4 Credits, 4 Class Hours The fundamentals of business system analysis and design are introduced through lectures as well as involvement in a systems project using a CASE tool. The project provides for group as well as individual efforts in design and documentation of batch and on-line systems. A minimum of three written reports is required for this course as per the writing across the curricula program requirement. <i>Prerequisite: ITEC 2141</i></p> | N | <p>ITEC 2171 Web Programming II 4 Credits, 4 Class Hours This course continues the development of web programming skills in ITEC1171, Web Programming I. Students will build upon the client-side JavaScript skills covered in ITEC1171, learning more advanced scripting techniques. The course includes extensive coverage of CSS and DHTML techniques used to add dynamic aspects to Web pages. Students will learn how to make their client-side scripting platform-independent. This course also includes an introduction to server-side scripting using Visual Basic Scripting (VBScript) in Microsoft's Active Server Pages (ASP) environment. The student will also learn how to use XML and XSLT to represent store data. The course will include an introduction to SQL. The students will publish a series of progressively more complex Web sites, with a focus on enhancing the end user's web experience, XSLT, and server-side scripting with VBScript. One workstation per student is assigned for the course. <i>Prerequisites: ITEC 1171</i></p> | N |
| <p>ITEC 2144 Application Case Study - COBOL 4 Credits, 4 Class Hours In this course the student designs and programs an application that uses the concepts covered in the other courses in this track. One computer per student is assigned for the course. <i>Prerequisites: ITEC 2141 and IT 2142</i></p> | N | <p>ITEC 2201 UNIX Operating System 4 Credits, 4 Class Hours A thorough overview of multi-user operating system utilizes the UNIX operating system. Emphasis is placed on the user interface, terminology and command structure within the multitask/multi-user environment. Electronic mail and communications standards are covered along with standard UNIX utilities needed to support the automated office. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1002 or both ITEC 1004 and EA 2814 Co requisite: ITEC 1330</i></p> | N |
| <p>ITEC 2150 Database Concepts/SQL 4 Credits, 4 Class Hours This course is an introduction to database design and processing. Emphasis is on relational databases with laboratory problems using SQL. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1001 AND EITHER ITEC 1101, ITEC 1141, ITEC 1151 OR ITEC 1104</i></p> | N | <p>ITEC 2202 UNIX Software Tools 4 Credits, 4 Class Hours This course provides an in-depth study of UNIX software tools. Topics include regular expressions, examining text files, formatting and working with fields and changing characters and strings in files, and file archives and compression. The awkAWK language and the Korn shell-programming environment are covered along with selected software development tools downloaded from the Internet. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 2201</i></p> | N |
| <p>ITEC 2151 Advanced RPG 4 Credits, 4 Class Hours This course is a continuation of ITEC 1141, RPG/400 Programming, and teaches complex file handling techniques. Interactive programming is introduced using both DDS and SDA methods for creating simple displays. The use of Data Structures is also taught. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1151</i></p> | N | <p>ITEC 2205 UNIX System Administration 4 Credits, 4 Class Hours This course explores the tasks and issues that anyone responsible for a UNIX system routinely faces. Topics include adding and removing users, managing UNIX processes, planning file systems, performing backups, setting up a printer and spooling system, overseeing a TCP/IP network (including NFS), adding new hardware devices, managing system security and fine tuning. <i>Prerequisite: ITEC 2201</i></p> | N |
| <p>ITEC 2152 Subfiles, Menus, Advanced RPG Concepts 4 Credits, 4 Class Hours This course is a continuation of IT 2151, and teaches more complex displays, menus and On-line Help screens. Subfile concepts are covered, and subfile programming is done. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 2151</i></p> | N | <p>ITEC 2210 Advanced C with UNIX 4 Credits, 4 Class Hours This course provides an advanced understanding of C concepts on different UNIX platforms. Topics include compiling, debugging, creating and maintaining libraries, preprocessor, source code control, advanced pointer constructs, UNIX data structures, UNIX utilities, and dynamic memory allocation. This class prepares the student for UNIX systems programming in C. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1101 AND ITEC 2201</i></p> | N |
| <p>ITEC 2153 Operating System for AS/400 4 Credits, 4 Class Hours A general overview of the components of the IBM AS/400 midrange computer is followed by emphasis on selected topics including menu system, object management, task management utilities, security, AS/400 control language, and CL programming. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1001</i></p> | N | <p>ITEC 2220 UNIX System Programming In C 4 Credits, 4 Class Hours This course provides a thorough overview of the ANSI C programming language as implemented in the UNIX environment. Topics include data structures, arrays, pointers, system calls, and standard library functions. Emphasis is placed on UNIX system I/O facilities, program maintenance, UNIX process control, and kernelintrinsic. One workstation per student is assigned for the course. <i>Prerequisites: ITEC 2151 and ITEC 2153</i></p> | N |
| <p>ITEC 2154 AS/400 Distributed Programming Techniques 4 Credits, 4 Class Hours This course introduces the student to data communications concepts and terminology, concentrating heavily on the AS/400 and its interrelationship with various types of networks. Some programming background is required. One workstation per student is assigned for the course. <i>Prerequisites: ITEC 1001 AND EITHER ITEC 1101, ITEC 1141, ITEC 1154 OR ITEC 1104</i></p> | N | <p>ITEC 2210 Advanced C with UNIX 4 Credits, 4 Class Hours This course provides an advanced understanding of C concepts on different UNIX platforms. Topics include compiling, debugging, creating and maintaining libraries, preprocessor, source code control, advanced pointer constructs, UNIX data structures, UNIX utilities, and dynamic memory allocation. This class prepares the student for UNIX systems programming in C. One workstation per student is assigned for the course. <i>Prerequisite: ITEC 1101 AND ITEC 2201</i></p> | N |
| <p>ITEC 2155 Application Case Study-RPG 4 Credits, 4 Class Hours In this course the student designs and programs an application that uses the concepts covered in the other courses in this track. One workstation per student is assigned for the course. <i>Prerequisites: ITEC 2151 and ITEC 2153</i></p> | N | | N |

| | | | |
|--|---|---|---|
| <p>ITEC 2301 Local Area Networking Administration 4 Credits, 4 Class Hours In this advanced course, students receive a thorough overview of the installation, management, maintenance and utilities of local area networks (LAN). The primary topics cover Novell's NetWare LAN hardware and software selection, implementation and administration. Additional topics include Inter- and Intra-LAN communications and the technical issues of NetWare implementations. One microcomputer per student is assigned for the course. <i>Prerequisite: ITEC 1330</i></p> | N | <p>ITEC 2404 Windows Database Application–Access 4 Credits, 4 Class Hours This course explores how the key concepts, features and commands of the leading Windows-based relational database program Access, are utilized to solve almost any business problem. The goal is to become familiar with database design and implementation in a Windows environment with emphasis on data maintenance, queries, form design, reporting and macro writing. The goal is accomplished by using practical examples that are typical of those that everyday users of Access will encounter. One computer per student is assigned for the course. <i>Prerequisite: ITEC1001, Co requisite: ITEC 2401</i></p> | N |
| <p>ITEC 2303 Internetworking 4 Credits, 4 Class Hours This course is a continuation of ITEC 2301, Local Area Networking Administration. Students explore the tasks and issues that anyone responsible for Local Area Network administration routinely faces. Topics include configuration management, tools and techniques in monitoring LAN performance, troubleshooting methods and tools as well as theory and troubleshooting concepts Configuration, maintenance and problem resolution of multiple protocol LANS are covered including TCP/IP, IPX, AFP, X.25 and other services. These topics are detailed in both stand-alone and simultaneous access implementations of hardware devices, management of system security, and overall tuning of systems communications. One computer per student is assigned for this course. <i>Prerequisite: ITEC 2301</i></p> | N | <p>ITEC 2406 Database Management 4 Credits, 4 Class Hours This course introduces the student to basic database systems and their design in an office environment. Emphasis is placed on the definition of the data requirements, data dictionaries usage and work flow analysis. The course utilizes the leading relational database software management system to create, manipulate, and extract reports for a database. An introduction to the industry's leading database software is also covered. One computer per student is assigned for the course. <i>Prerequisites: ITEC 1001 and ITEC 1004</i></p> | N |
| <p>ITEC 2310 Local Area Networking Engineering 4 Credits, 4 Class Hours This course presents a thorough overview, from client basics to advanced troubleshooting and optimization strategies of LAN engineering. Specific topics include design, installation, management and troubleshooting of LANs and WANs. Emphasis will be placed on either on an independent study basis or in a classroom situation. <i>Prerequisite: Department chairperson approval</i></p> | N | <p>ITEC 2408 Windows Applications 4 Credits, 4 Class Hours In this introduction to Windows applications, emphasis is placed on the various applications available within the windows environment. Topics include the use of a word processing package, a spreadsheet package, a communications package, and an object-oriented package, which gives direct access to the Graphics Device Interface. With the use of the object-oriented package, emphasis is placed on the features of multimedia applications. One computer per student is assigned for the course. <i>Prerequisites: ITEC 100, Co requisite: ITEC 2401</i></p> | N |
| <p>ITEC 2351 Windows 2000 Professional 4 Credits, 4 Class Hours This course will introduce the student to the Windows 2000 Professional operating system and how to network computers with 2000 Professional installed. In addition, the student will use hands-on projects and project cases for reinforcement. Topics to be covered in detail; installation of the operating system; user management, print services, file system management, user permissions. Troubleshooting and network support will also be covered. This course will help prepare the student to sit for the MCSE test for Windows 2000 Professional operating system. One computer per student is assigned for the course. <i>Prerequisite: ITEC 1330 and ITEC 2401</i></p> | N | <p>ITEC 2410 Desktop Publishing 4 Credits, 4 Class Hours A thorough overview of the state-of-the-art usage of computers in the graphic publishing environment is included in this course. An integrated approach covers topics including publishing, graphic painting, and basic publishing design software. The student combines text from word processors with graphics for an integrated publication. One computer per student is assigned for the course. <i>Prerequisite: ITEC 2401</i></p> | N |
| <p>ITEC 2380 Internet Case Study 4 Credits, 4 Hours In an interactive “real life,” classroom environment, the student is expected to apply skills acquired through previous course work as well as new skills acquired in this class. The students will work in a team environment designing, installing, programming and maintaining a web server and web site on the Internet. This course will be taken in the students, last semester of school. <i>Prerequisites: (ITEC 2171 & ITEC 2411) or (ITEC 2171 & ITEC 2102) or (ITEC 2372 & ITEC 2374), Co requisites: (ITEC 2172 & ITEC 2701) or (ITEC 2172 & ITEC 2412) or (ITEC 2376 & ITEC 2378)</i></p> | N | <p>ITEC 2420 Advanced Desktop Publishing 4 Credits, 4 Class Hours This is an advanced course in Desktop Publishing designed to enhance the DTP skills acquired in IT 2601, Desktop Publishing, fundamentals course. This course covers the concepts and practices applicable to the publishing and computer graphics marketplace. The student receives hands-on experience with Adobe PageMaker, Corel Draw, a slide presentation program, and graphics scanners. Topics include color separation, typography techniques, and the principles of document design. One computer per student is assigned for the course. <i>Prerequisites: ITEC 2410</i></p> | N |
| <p>ITEC 2401 Windows Operating System 4 Credits, 4 Class Hours This course provides a thorough overview of the Windows operating system environment. Emphasis is placed on the graphical user interface and the terminology within the Windows multi-tasking environment. Topics include usage of the Desktop, file management, settings, printing and managing hardware. The course also includes the use of DOS through the Windows environment, memory management, Network Neighborhood, troubleshooting and other tools to customize Windows. One computer per student is assigned for the course. <i>Prerequisites: Basic Keyboarding Skills and ITEC 1001</i></p> | N | <p>ITEC 2440 Help Desk Concepts 3 Credits, 3 Class Hours This course is an introductory course into the Help Desk profession. It will explore the different types of help desks, available career paths and the knowledge, skills, and abilities necessary to be successful in the help desk profession. <i>Prerequisites: ETEC 2814 and ITEC 1006, ITEC 1330</i></p> | N |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | |
|---|---|
| <p>ITEC 2705 Delphi-Rapid Application Development (RAD) N 4 Credits, 4 Class Hours This course is a survey course for computer programmers and systems analysts using rapid application development. Event-driven, visual, and structured programming concepts will be presented. Course emphasis will be on the total program development process through problem analysis, design, coding, testing, debugging and maintenance. Programming projects will involve common business problems that require data entry, display of calculated results, reports, query, conditional testing, arithmetic operations, control breaks, array management, data masking, lookup processing, data organizations, file I/O and Web development. Programs will be implemented using Borland's Delphi for Windows and the underlying Pascal language. One computer per student is assigned for the course. <i>Prerequisites: ITEC 1101, ITEC 1151, ITEC 1154, ITEC 1104 or program chair approval</i></p> | <p>ITEC 2903 Advanced Database Techniques N 4 Credits, 4 Class Hours A thorough overview of fourth generation database languages and compilers that support these languages in the automated office is presented in this course. Topics include PC Focus, dBase extension compilers such as Clipper and FoxBASE in single-user and multi-user environments, user-defined functions, and special device considerations. Emphasis is placed on an integrated structured system. One computer per student is assigned for the course.</p> <p>ITEC 2905 FOCUS 4GL Database Applications N 4 Credits, 4 Class Hours This course explores how the fourth- generation language FOCUS is used to implement and manage a large variety of programming applications. The goal is to clarify for the novice FOCUS user the basic techniques which are available in FOCUS for report writing, file maintenance, and developing entire database applications. The approach is from the point of view of both the programmer and the end user. One computer per student is assigned for the course.</p> |
| <p>ITEC 2710 JAVA Application Programming N 4 Credits, 4 Class Hours This course is a study of object-oriented programming covering the syntax and features of JAVA Programming. Topics include comparing JAVA to other programming languages, JAVA API's Web applets, stand-alone applications, input/output, multi-threading, exception handling, and network client/server applications. One computer per student is assigned for the course. <i>Prerequisites: ITEC 1101 or Department chairperson approval</i></p> | <p>ITEC 2907 Windows Multimedia Toolbook N 4 Credits, 4 Class Hours This comprehensive course explores the elements of sound and visual images that comprise multimedia productions within the Windows environment. Emphasis is placed on multimedia programming techniques using objects, the OpenScript programming language and MCI command strings. Prominent authoring systems within the Windows environment are utilized. One computer per student is assigned for the course.</p> |
| <p>ITEC 2720 Advanced Java Programming N 4 Credits, 4 Class Hours This course continues the principles and concepts of the first Java course (ITEC 2719) and adds the subjects of Advanced GUI, Java Media Framework, Custom Layouts, Servlets, Java Server Pages, Java Beans, Bean Development Kit, Wireless Programming with Java and Java Data Base Connection with Three-tier Architecture. <i>Prerequisite: ITEC 2710</i></p> | <p>ITEC 2910 Introduction to Powerbuilder N 4 Credits, 4 Class Hours This course introduces the student to Windows applications using Powerbuilder. Powerbuilder uses the visual environment to develop object-oriented programs in a user-friendly atmosphere. Included is the creation of windows, menus, data windows, functions, libraries, and databases. One computer per student is assigned for the course.</p> |
| <p>ITEC 2801 Special Problems I N 4 Credits, 4 Class Hours This course allows coverage of material not contained in other courses, either on an independent study basis or in a classroom situation. <i>Prerequisite: Department chairperson approval</i></p> | <p>ITEC 1901-1908 Technical Scholarship Program N 4 Credits, 300 Lab Hours Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible.</p> |
| <p>ITEC 2802 Special Problems II N 4 Credits, 4 Class Hours This course allows coverage of material not contained in other courses, either on an independent study basis or in a classroom situation. <i>Prerequisite: Department chairperson approval</i></p> | |
| <p>ITEC 2803 Special Problems III N 4 Credits, 4 Class Hours This course allows coverage of material not contained in other courses, either on an independent study basis or in a classroom situation. <i>Prerequisite: Department chairperson approval</i></p> | |
| <p>ITEC 2804 Special Problems IV N 4 Credits, 4 Class Hours This course allows coverage of material not contained in other courses, procedures and techniques are covered. Procedures and techniques for using a hard disk are presented. Writing across the curricula is stressed in this course, with technical writing skills and documentation techniques emphasized. One computer per student is assigned for the course. <i>Prerequisites: ITEC 1004, ETEC 2814</i></p> | |
| <p>ITEC 2902 Information Center Management N 4 Credits, 4 Class Hours This course covers the management of small to large-scale information support centers with a focus on the changing microcomputer environment. Emphasis is placed on the organization, control and support of the information resource environment. Each student is required to perform hardware, software, and end-user support in an actual information center.</p> | |

Landscape and Turfgrass Management

| | |
|--|---|
| <p>HORT 1000 Horticulture Plant Science N 3 Credits, 3 Class Hours This course offers the basic plant information needed for those persons working in the landscape industry. Topics covered are elementary plant physiology, plant soils and nutrition, and propagation techniques.</p> | <p>HORT 1100 Soil and Water N 3 Credits, 2 Class Hours; 2 Lab Hours This course covers the physical and chemical properties of soils, including soil texture, structure, density, soil water, and drainage, cation exchange capacity, pH, and soil surveys.</p> |
| <p>HORT 1200 Horticulture Pest Management N 3 Credits, 3 Class Hours Through physical example and lecture, the student is familiarized with the most common insects, diseases, and weeds. An overview of their management by the use of application and integrated biological techniques is presented. The student becomes familiar with the laws, calibration, application equipment, soil science, pH, and fertilization. In addition, this course helps prepare the student for the EPA Restricted Use Pesticide Certification Examination under the categories of Ornamentals and Turf, Aquatics, Right of Way and Interiors. It is also good preparation for state licensing. <i>Prerequisite: HL 1000 or advisor approval</i></p> | |

| | | |
|---|---|--|
| <p>HORT 1310 Plant Identification I 3 Credits, 2 Class Hours, 2 Lab Hours This course covers the identification, botanical names, cultural requirements and landscape/garden site uses of approximately 80 woody ornamental plants. The course covers basic plant morphology as it relates to woody ornamentals. Plants are taught from slides, textbook, line drawings, and fresh cut specimens when available. Some local field trips may be required.</p> | N | <p>addresses broad technical aspects of automatic irrigation and its use in commercial and residential landscapes</p> |
| <p>HORT 1400 Landscape Maintenance 3 Credits, 3 Class Hours This course covers the information necessary for the person involved with landscape maintenance. The course includes landscape maintenance techniques, seasonal scheduling, materials, equipment and labor estimation and budgeting. The course will review some basic plant nutrition and soil science (i.e., pH, soil types, water, soil tests). Students will learn how to calculate landscape square footages, and hard-good coverage requirements such as mulch, lime, weeding, mowing, edging, pruning, line trim, leaf removal, spade edging, seasonal color change, chemical applications, fertilization, irrigation, aeration, ice and snow removal, interiors, and scheduling and estimating these services. This course will also cover small engine and equipment maintenance and proper equipment selection.</p> | N | <p>HORT 2220 Irrigation Techniques II 3 Credits, 3 Class Hours This course is designed for students who have experience in irrigation and want to further their knowledge of the industry. Students will learn to design, build, install, maintain, trouble-shoot, and correct problems in existing irrigation systems. In addition, students will expand their knowledge of irrigation principals, design, and hydraulics of irrigation systems. <i>Prerequisite: HORT 2210 or advisor approval</i></p> |
| <p>HORT 1510 Turfgrass Management I 3 Credits, 3 Class Hours This course covers turfgrass selection, identification, and establishment procedures. The course is designed for persons working in the golf course or lawn care industry as well as the do-it-yourself homeowner. Cultural practices to be discussed include basic fertilization programs, irrigation practices, mowing, thatch control, identification and control of pests (weeds, insects, and diseases), and the calibration of equipment used for seeding, fertilization and weed control.</p> | N | <p>HORT 2300 Landscape Techniques 3 Credits, 2 Class Hours, 2 Lab Hours This course offers the student hands on experience and lecture on the proper landscaping techniques for the Mid-South. Topics covered in this course will be: bed preparation, planting, pruning, mowing, edging, leaf removal, mulching, hand watering, fertilizing and composting.</p> |
| <p>HORT 1250 Herbaceous Plants 3 Credits, 3 Class Hours This course is a continuation of Plant Identification II. The course covers the identification, botanical names, cultural requirements and landscape/garden site uses of approximately 120 herbaceous plants. Plants are taught from slides, textbooks, line drawings, and fresh cut specimens when available. Some local field trips may be required. <i>Prerequisite: HORT 2320 or advisor approval</i></p> | N | <p>HORT 2520 Turfgrass Management II 3 Credits, 2 Class Hours, 2 Lab Hours This course is designed for the person interested in specialized turfgrass management in the south. Detailed information on physiology, growth and development and different species and varieties of turfgrass will be presented. Students will develop complete programs for fertilization, weed and disease control, cultural practices, and establishment and renovation of all types of turfgrass areas including golf courses, athletic fields, lawns, and other recreational turfgrass areas. <i>Prerequisite: HORT 1510 or advisor approval</i></p> |
| <p>HORT 1275 Woody Ornamentals 3 Credits, 3 Class Hours This course is a continuation of Plant Identification I. This course covers the identification, botanical names, cultural requirements and landscape/garden site uses of approximately 120 woody ornamentals. Plants are taught from slides, textbooks, line drawings, and fresh cut specimens when available. Some local field trips may be required. <i>Prerequisite: HORT 1310 or advisor approval</i></p> | N | <p>HORT 2700 Chemical Applications 3 Credits, 2 Class Hours, 2 Lab Hours This course is designed to prepare the student for selecting the proper pesticide and using it correctly in turf and various horticultural settings. Proper calibration and operation of equipment and safety procedures for handling, storing, using, and disposing of hazardous chemicals will be covered. <i>Prerequisite: HORT 1200 or advisor approval</i></p> |
| <p>HORT 1450 Arboriculture 3 Credits, 3 Class Hours This course is for students who wish to enhance their knowledge of tree identification, function, evaluation and maintenance. The course also provides preparatory information and/or review for students interested in gaining the Certified Arborist designation through the International Society of Arboriculture. Some topics to be covered are tree biology, soil properties, water management, nutrition and fertilization, tree selection, pruning, disease and problem diagnosis.</p> | N | <p>HORT 2320 Plant Identification II 3 Credits, 2 Class Hours, 2 Lab Hours This course covers the identification, botanical names, cultural requirements and landscape/garden site uses of approximately 80 herbaceous ornamental plants. The course covers basic plant morphology as it relates to herbaceous plants. Plants are taught from slides, textbook, line drawings, and fresh cut specimens when available. Some local field trips may be required.</p> |
| <p>HORT 2100 Small Engines 3 Credits, 2 Class Hours, 2 Lab Hours This course is designed to familiarize the student with the internal combustion engine and the proper operation and maintenance as it relates to landscaping equipment. Student will purchase own tools.</p> | N | <p>HORT 2410 Landscape Design I 3 Credits, 3 Class Hours This course covers landscape design principles, steps involved in the landscape design process, the use of drafting and drawing tools to design a landscape design and a brief historical review of landscape design from different geographic regions and periods. Students will need to purchase their own portable drawing boards, drawing supplies, and any required textbook.</p> |
| <p>HORT 2210 Irrigation Techniques I 3 Credits, 3 Class Hours This course introduces the basic elements, principles, and techniques currently used in landscape irrigation installation and service. Students will study basic hydraulics and its practical application to all types of underground sprinklers, pipes, and valves. Automatic controls, backflow protection, and system troubleshooting are also covered during lectures and field trips. The material covered in this class</p> | N | <p>HORT 2420 Landscape Design II 3 Credits, 3 Class Hours This course is a continuation of Landscape Design I. Emphasis is placed on the design process and multiple design problems. An introduction to grading/drainage and further work on the more technical aspects of site scale design and drawing production is included. In addition to the supplies used in Landscape Design I, students will need to purchase a few additional supplies. <i>Prerequisite: HORT 2410 or advisor approval</i></p> |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|--|---|---|---|
| HORT 2600 Landscape Business Management 3 Credits, 3 Class Hours This course deals with the specific management concerns for the landscape business. Areas include accounting, records management, budgeting, estimating, job tracking, marketing, employment practices, business practices and applicable regulations. | N | SPAN 2010 Intermediate Spanish I 3 Credits, 3 Class Hours This course continues to develop Spanish-language competency levels in reading, writing, listening, and speaking. Through reading and lectures students develop a greater knowledge of the history and cultures of Spain and Hispanic American countries. <i>Prerequisites: SPAN 1010 or equivalent</i> | T |
| HORT 2800 Golf Course Operation and Maintenance 3 Credits, 2 Class Hours, 2 Lab Hours This course is designed to present the management of golf and sports turf maintenance operations as it relates to the superintendent's duties. Students will learn to groom turf, schedule work, manage equipment, keep records and budgets, manage irrigation systems, and practice proper cultural practices. <i>Prerequisite: HORT 1510 or advisor approval</i> | N | SPAN 2020 Intermediate Spanish II 3 Credits, 3 Class Hours This course continues to develop Spanish-language competency. It engages students in using languages as a whole, regardless of the particular skill involved, so that students read, write, speak, and hear Spanish more often than they work on specific vocabulary or grammatical items. Emphasis is also given to cultural studies of Spain and Hispanic American countries. <i>Prerequisite: SPAN 2010 or equivalent</i> | T |
| HORT 2850 Landscape Construction and Building Design 3 Credits, 3 Class Hours This course will cover landscape construction and installation, grading, bed preparation, tie walls, planting around decks, fences and stone work for residential and commercial projects. In addition, site problems caused by construction debris will be addressed. | N | SPAN 1000 Spanish for Special Purposes 3 Credits, 3 Class Hours This course is an elementary conversational Spanish course designed for people who need to communicate with Spanish speakers. Each individual section of the course is customized to meet the needs of a particular audience (health-care workers, criminal justice personnel, landscapers, bankers). This course does not transfer. | N |
| HORT 2950 Landscape and Turfgrass Management Internship I 13 Credits, 1 Lab Hour or 75 300 work Work hoursHours This course is required for all students seeking the AAS in Landscape or Turfgrass Management. This course should be taken during the students last year. The student will work for 300 hours in a supervised horticultural industry environment such as a park, landscape firm, golf course, or garden. The student will be evaluated on pre-selected criteria during consultation with advisor. | N | SPAN 1090 Review of Spanish Grammar 1 Credit, 1 Class Hour This review of the basic elements of Spanish grammar is designed for students who have not had recent Spanish-language studies. The uses of nouns, adjectives, and articles are included, as are the present, imperfect, preterite, conditional, and future verb tenses in the indicative. Formation and uses of the present subjunctive are the final component. <i>Prerequisite: two semesters of college Spanish or two years of high school Spanish</i> | N |
| Languages | | | |
| FREN 1010 Elementary French I 3 Credits, 3 Class Hours Elementary French I introduces students to the basic elements of the French language, including practice in speaking, listening, reading, and writing. Students learn to carry on simple conversations in the present, past, and simple future tenses. | T | SPAN 2030 Business Writing in Spanish 3 Credit, 3 Class Hours This intermediate-level course is designed to introduce students to the vocabulary, document format, and cultural elements relating to business correspondence and communication. Though writing skills are emphasized, reading and speaking are also crucial components. This course may be used as a general elective. <i>Prerequisite: ENGL 1010 or equivalent; SPAN 1020 or equivalent</i> | N |
| FREN 1020 Elementary French II 3 Credits, 3 Class Hours This course continues the basic study of French, including practice in speaking, listening, reading, and writing. Students read and write basic everyday French and carry on conversations on everyday subjects. <i>Prerequisites: FREN 1010 Elementary French I</i> | T | | |
| FREN 2010 Intermediate French I 3 Credits, 3 Class Hours This sophomore-level language course includes practicing oral skills, building vocabulary, and reading French literature with relative ease. <i>Prerequisite: FREN 1020 Elementary French II</i> | T | | |
| FREN 2020 Intermediate French II 3 Credits, 3 Class Hours This course is a continuation of Intermediate French I. It focuses on developing more in-depth language use. <i>Prerequisite: FREN 2010 Intermediate French I</i> | T | | |
| SPAN 1010 Elementary Spanish I 3 Credits, 3 Class Hours This course introduces the student to basic Spanish-language skills in reading, writing, listening, and speaking. Parts of speech and conjugation of present and past tenses are included. Students also study the culture of both Spain and Hispanic American countries. <i>Prerequisite: DSPW 0800 and DSPR 0800 or equivalent</i> | T | | |
| SPAN 1020 Elementary Spanish II 3 Credits, 3 Class Hours Reading, writing, listening, and speaking skills in Spanish are further developed in this course. The cultures of Spain and Hispanic American countries are strongly stressed. <i>Prerequisite: SPAN 1010 or equivalent</i> | T | | |
| Library Use/Information | | | |
| | | LIBR 1010 Library Research Skills 1 credits This course is a computer-based research course designed to introduce the student to the most current Internet technology and terminology, newsgroups and e-mail. Students will utilize various search engines to navigate the World Wide Web and produce research materials for use in college courses and in life. Resources explored on the Web will include many databases, libraries, career exploration pages, other educational sites and various commercial sites. Class format includes lecture/demonstration and individualized hands-on computer lab activities. Course may be taken on-line. | N |

Management

MGMT 1000 Introduction to Business

3 Credits, 3 Hours

This course is a survey of business principles, problems, and procedures. It examines the nature of business organizations, production, office procedures, management and distribution of goods. It also analyzes personnel problems, budgets, financing, and technological forecasting. Included topics are pricing and promotion, motivation, leadership, labor unions, human resources, risk management, and international business.

MGMT 1200 Introduction to Quality

3 Credits, 3 Class Hours

This course covers major approaches to quality assurance and productivity management including the Deming, the Juran, the Ishikawa, and the Crosby approaches. Readings and discussions on these philosophies are an integral part of the course. Introduction to the tools and methods of quality improvement is provided.

MGMT 1400 Survey of World Regions

3 Credits, 3 Class Hours

This course includes a survey of the economic, cultural, and physical traits that are characteristic of developing and developed nations. The focus is on geographic problems and aspects of the development of Third World nations in Latin America, Africa, Asia, and Oceania. The course also focuses on the global position of the world's developed nations (Commonwealth of Independent States, Western Europe, Great Britain, North America, Japan, and Australia) and the geographical landscapes of those regions.

MGMT 1900 Externship in Quality

3 Credits, 225 Lab Hours

Students participate in quality improvement projects in both local businesses and government.

MGMT 1931 Business Cooperative Internship I

3 Credits, 225 Lab Hours

This work experience affords the student participation in the employer/ employee relationship and on-the-job experience with public and private businesses, or governmental agencies. By being an integral part of the work environment, the student encounters the true meaning of work, experiences the physical and psychological security work provides, and should gain an appreciation of the impact work has on today's society.

MGMT 1932 Business Cooperative Internship II

3 Credits, 225 Lab Hours

This course consists of supervised employment in the student's chosen field. The student should acquire knowledge of the importance and use of data processing in industry; accounting systems used, and witness the practical application of management principles. *Prerequisite:* MGMT 1931

MGMT 1933 Business Cooperative Internship III

3 Credits, 255 Lab Hours

Supervised employment continues in the student's chosen field. The assumption of limited responsibilities should offer the student an opportunity to make a valuable contribution to the accomplishment of the organization's objectives and goals. *Prerequisite:* MGMT 1932

MGMT 2000 Project Management

3 Credits, 3 Hours

This course is designed to increase project success for both new and experienced Project Managers. It presents a proven, customizable, best practices approach and provides a practical set of management tools, templates and techniques for planning, scheduling and controlling project activities to meet project performance, cost, and time activities.

MGMT 2010 Principles of Management I

3 Credits, 3 Class Hours

This course is a study of the human elements in management. Focusing on understanding self, examining factors of need-recognition, decision-making, leadership attitudes, group dynamics, effective communications, promoting supervisory development, and organizational development skills required to make modern organizations effective.

MGMT 2020 Principles of Management II

3 Credits, 3 Class Hours

A short history of various management styles with emphasis on the systems approach and the role leadership plays in business success is included. Regardless of managerial level, students experience the dynamics of being a change agent interacting with all levels of the organization.

MGMT 2040 Strategic Planning

3 Credits, 3 Class Hours

This course provides an introduction to strategic planning with an emphasis on the integration of quality as an integral part of that plan. Included is a study of how Cost of Quality systems can point the way to problem areas. Emphasis is placed on the link between strategic planning and leadership and customer and market focus.

Prerequisites: MGMT 2030, MGMT 1850, ISDS 2830

MGMT 2060 Small Business Management

3 Credits, 3 Class Hours

This course includes preparation for the selection and logical operation of a small business. A balanced program of all major aspects includes finance, personnel, sales, and physical and human factors. Case studies and projects are used to supplement the text. *Prerequisites:* ACCT 1210, MATH 1130, or approval of advisor

MGMT 2070 Principles of Supervision

3 Credits, 3 Class Hours

This survey course combines lecture, case studies, and role-playing techniques to provide maximum student participation in management, human relations, and decision-making. Emphasis is placed on understanding self, examining factors of need-recognition, decision-making, self-development, leadership attitudes, effective communications, and promoting supervisory development. The student is involved in actual managerial problems to stimulate his or her desire to learn and to be better prepared emotionally and psychologically for management responsibilities.

MGMT 2300 Managing for Quality

3 Credits, 3 Class Hours

This course covers process analysis and control systems, problem-solving techniques, and the body of knowledge for the Certification for Quality Manager exam (CQM). A methodology for implementing Total Quality is also discussed. *Prerequisites:* MGMT 2010, MGMT 1200, ISDS 2830, MGMT 2040

MGMT 2240 Business Ethics

3 Credits, 3 Class Hours

This course is an analysis of business ethics and the responsibilities of business firms to employees, owners, consumers, and society. *Prerequisites:* DSPR 0800 or equivalent, DSPW 0800 or equivalent
Corequisite: ENGL 1010—English Composition

MGMT 2410 Warehouse Management

3 Credits, 3 Class Hours

This course offers theories of warehousing systems, documentation, layout, inventory management, materials handling, hazardous materials storage and shipping, and receiving fundamentals.

MGMT 2500 Human Resources Management

3 Credits, 3 Class Hours

In this course, the principles of organization and management of personnel are covered. In the discussion of human resources management, emphasis is placed upon recruitment, selection, placement, and evaluation. Also addressed are grievances, merit rating, discipline, compensation and benefits, along with principles and practices of instructing and training employees.

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions

T – Denotes courses designed for transfer to four-year institutions

N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|---|---|--|---|
| <p>MGMT 2505 Managing Diversity in the Workforce 3 Credits, 3 Class Hours Today's workforce consists of employees of diverse gender, race, nationality, and cultural backgrounds. Whether a company is successful and competitive in corporate America today depends upon the ability of its managers to get their employees with diverse backgrounds to work together effectively and harmoniously. This special course discusses problems created by this diversity in the workforce and explores solutions to these problems.</p> | N | <p>MGMT 2809 ISO 9000 3 Credits, 3 Class Hours The International Organization for Standardization is a consortium of virtually all industrialized trade. This course teaches these standards to meet customer expectations and requirements. It also teaches how to develop a Quality Manual.</p> | N |
| <p>MGMT 2506 Organizational Behavior 3 Credits, 3 Class Hours This course investigates personal and group behavior at work while pursuing the nature of group dynamics and corporate culture. Positive and negative behavioral motivation is investigated. Principles of effective psychological work attitudes are developed using contemporary concepts of organizational behavior authorities. <i>Prerequisites: DR0084—Developmental Reading or equivalent, DE0084—Developmental English or equivalent, MGMT 1000—Introduction to Business</i></p> | N | <p>MGMT 2900 Transfer Credit in Mid-Management Specialization Area 0-6 Credits This course number reflects credit awarded for CLEP examination, USAFI courses or tests, military service school, industrial training, cooperative education or college credit related to a Mid-Management technical specialty.</p> | N |
| <p>MGMT 2507 Labor Management Relations 3 Credits, 3 Class Hours The history of the American labor movement, wage policy, productivity, collective bargaining, labor mobility, and government regulations of management and unions are explored.</p> | N | <p>MGMT 2905 Mid-Management Specialty Work Experience 0-16 Credits This course number reflects credit awarded for documented work experience of a managerial or supervisory nature. A maximum of 16 hours (8 hours credit for each year in excess of a three-year apprenticeship) can be credited to this course.</p> | N |
| <p>MGMT 2508 Compensation Management 3 Credits, 3 Class Hours This course covers the four basic policies that every employer must consider in managing compensation: 1) internal consistency; 2) external competitiveness; 3) employee contributions; and 4) administration of the pay system. The integrating of these four factors plus compliance, the Government's role in compensation, pay discrimination, managing the system, and the role unions play in salary administration are discussed.</p> | N | <p>MGMT 2906 Special Topics in Business 1-3 Credits, 1-3 Class Hours In-depth study of selected business administration topic(s) designed to reinforce basic business knowledge and to further develop problem-solving and research skills. Explores specific business issues in which to apply basic problem-solving techniques and skills. <i>Prerequisites: Permission of an advisor</i></p> | N |
| <h2>Marketing</h2> | | | |
| <p>MGMT 2800 International Business 3 Credits, 3 Class Hours The objective of this course is to provide students with an understanding of the growing global market place. Emphasis is placed on international cultural differences, global trade, monetary systems, marketing strategies, operations management, foreign direct investment, regional economic integration and the political economy of various countries. <i>Prerequisites: DSPR 0800 or equivalent, DSPW 0800 or equivalent, MGMT 1000</i></p> | N | <p>MKTG 2000 Principles of Marketing 3 Credits, 3 Class Hours This course covers aspects of marketing history and the current marketing environment. Detailed analysis of product strategy including information for decision-making and selection of target markets is included. Basic practices and principles in retailing, wholesaling, and industrial areas of marketing are also covered. Case problems are utilized to integrate course materials. <i>Corequisite: MGMT 1000 Introduction to Business</i></p> | N |
| <p>MGMT 2805 International Business Management 3 Credits, 3 Class Hours Emphasis on understanding relevant concepts, the analytical framework and scope, marketing activities on important managerial functions and influential social and cultural forces in the international business community are covered in this class.</p> | N | <p>MKTG 2005 Salesmanship 3 Credits, 3 Class Hours A study of the salesman's role in the business firm, planning and preparation of the sales presentation, and importance of product knowledge and understanding are covered in this class. Basic principles for successful selling are covered. Organizing the selling strategy and prospecting, presenting, closing and building future sales are stressed. Case studies and oral sales presentations are included.</p> | N |
| <p>MGMT 2806 Freight Claims 3 Credits, 3 Class Hours This course is designed for transportation and distribution professionals and covers freight loss and damage claims in a practical manner. Documentation principles and practices are also explained.</p> | N | <p>MKTG 2006 Principles of Retailing 3 Credits, 3 Class Hours This class is a study of basic concepts and principles needed to function in the mid-management role of the retailing environment.</p> | N |
| <p>MGMT 2807 International Traffic Management 3 Credits, 3 Class Hours This course is designed for transportation and distribution professionals and covers freight loss and damage claims in a practical manner. Documentation principles and practices are also explained.</p> | N | <p>MKTG 2007 Principles of Advertising 3 Credits, 3 Class Hours Introduces origins and development of advertising. Discusses trade marking, packaging, legal structuring, ethics, and targeting. Emphasis is placed on the media including advantages, disadvantages, selection, and evaluation.</p> | N |
| <p>MGMT 2808 International Documentation 3 Credits, 3 Class Hours This course focuses on export documentation, letters of credit, and international business procedures. Also, the role of the traffic administrator in the world market is emphasized.</p> | N | <p>MKTG 2040 Purchasing and Materials Management 3 Credits, 3 Class Hours This introductory course addresses modern practices and techniques of the purchasing function. Included in the coverage of purchasing are organization, quality, supplier selection, price determination, inventory and disposal, foreign purchasing, acquisition of capital assets and strategy. <i>Prerequisites: DSPM 0850 or equivalent, and MGMT 1000</i></p> | N |

MKTG 2100 Principles of Transportation N
3 Credits, 3 Class Hours
 This is an introductory course providing an overview of the transportation and distribution industry. Historical development, legislation, and significant trends are discussed.

MKTG 2105 Physical Distribution and Logistics N
3 Credits, 3 Class Hours
 This course offers an overview of the structure and management of a physical distribution system. Course content includes warehousing, order processing, packaging, inventory control, physical location analysis, classifications and material handling.
Prerequisite: MKTG 2100 or approval of advisor

MKTG 2300 International Marketing & Distribution N
3 Credits, 3 Class Hours
 Emphasis is placed on understanding relevant concepts, the analytical framework and scope, marketing activities on important managerial functions and influential social and cultural forces in the international business community.

MKTG 2400 Global Internet Marketing & Advertising N
3 Credits, 3 Class Hours
 This course investigates the strategic implications of using the Internet for marketing and advertising. It develops the concepts and techniques of planning, implementing, and controlling the marketing function. Monitoring environmental conditions, assessing opportunities, delineating target markets, conducting consumer/buyer research, planning and strategy procedures in a global network environment are also stressed. These topics are followed by a detailed study of the marketing mix and its management, with product, promotions, and pricing components being emphasized. *Prerequisites: ENGL 1010, ISDS 2605, or permission of an advisor.*

MKTG 2500 Introduction to Importing and Customhouse Brokerage N
3 Credits, 3 Class Hours
 This course introduces and examines the concepts and mechanics involved in importing merchandise into the United States. This course focus will be on the preparation of the necessary documentation in Customs Brokerage process. Course content will also address aspects relating to the legal and commercial entities involved in the process. Topics include U.S. Customs, importers, brokers, modes of transportation, automation, documents, cargo release, entry issues.

MKTG 2505 Principles of Classification N
3 Credits, 3 Class Hours
 Principles of Classification provides a detailed study of each chapter of the Harmonized Tariff Schedules used to enter imported merchandise into the U.S. and determine duty rates. Students will learn about the laws and regulations concerning the use of the HTSUS as well as receive practical exercises on each of the 99 Chapters, General, Chapter, Section and Explanatory Notes. There are no prerequisites to this course.

MKTG 2506 Introduction to Customs Valuation N
3 Credits, 3 Class Hours
 This course is designed for the accurate appraisal of merchandise for Customs purposes. The emphasis is on a detailed study of 19 CFR 152, which contains the rules for imported goods for U.S. Customs under the Department of the Treasury.

MKTG 2507 Customs Modernization Act & Miscellaneous Issues in Importing N
3 Credits, 3 Class Hours
 This course is designed to use the Modernization Act by the U.S. Customs Service in a comprehensive effort to streamline and automate commercial operations. It presents the methods for importers and brokerage management to improve compliance with Customs laws and regulations.

MKTG 2508 U.S. Customs Regulations N
3 Credits, 3 Hours
 This course provides a detailed review of the key regulations provided in Title 19 of the Code of Federal Regulations (19 CFR). Title 19 of the CFR contains the rules that are enforced by Customs and by which importers and customhouse brokers must operate their business.

Mathematics

◆**MATH 1010 Foundations of Mathematics I** T
3 Credits, 3 Class Hours
 Introduction to set theory, logic, numeration systems, algorithms, and the real number system. *Prerequisite: DSPM 0850 (Intermediate Algebra) or demonstrated proficiency on the placement examination or the mathematics component of the ACT*

◆**MATH 1020 Foundations of Mathematics II** T
3 Credits, 3 Class Hours
 Study of equations, relations and functions, matrices, coordinate geometry, probability and statistics.
Prerequisite: MATH 1010 (Foundations of Mathematics I)

◆**MATH 1130 College Algebra (PreCal)** T
3 Credits, 3 Class Hours
 Exploration of the real number system: relations and functions, graphing techniques, linear and quadratic systems of equations and inequalities, matrices and determinants, conic sections, polynomial functions and theory of equations, exponential and logarithmic functions, natural number functions. *Prerequisite: DSPM 0850 (Intermediate Algebra) or demonstrated proficiency on the placement examination or the mathematics component of the ACT*

◆**MATH 1530 Statistics** T
3 Credits, 3 Class Hours
 Study of basic statistical concepts including data organization and analysis including frequency distributions, measures of central tendency and dispersion; probability theory and distributions; sampling methods; estimation; hypothesis testing; regression and correlation analysis. *Prerequisite: MATH 1130 (College Algebra)*

◆**MATH 1720 College Trigonometry** T
3 Credits, 3 Class Hours
 Study of functions and graphing technique theories; circular functions and their graphs; trigonometric functions with applications to right and general triangles; complex numbers; logarithms; inverse trig functions; identities; trigonometric equations. *Prerequisite: MATH 1130 (College Algebra)*

MATH 1740 Algebra and Trigonometry I T
3 Credits, 3 Class Hours
 Study of algebra encompassing linear equations, quadratic equations, functions, graphs of functions, and systems of equations; study of the trigonometry of the right triangle, radian measure, trigonometric functions of any angle, vectors, trigonometry of oblique triangles, the Law of Sines, the Law of Cosines, and graphs of trigonometric functions. *Prerequisite: DSPM 0850 (Intermediate Algebra) or demonstrated proficiency on the placement examination or the mathematics component of the ACT.*

MATH 1750 Algebra and Trigonometry II T
3 Credits, 3 Class Hours
 Continuation of Algebra and Trigonometry I encompassing the trigonometric form of complex numbers, powers and roots of complex numbers, trig identities, trig equations, inverse trig functions, polar coordinates; also, conic sections, exponential and logarithmic functions, inequalities, variations, sequences and series. *Prerequisite: MATH 1740 (Algebra and Trigonometry I)*

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
 T – Denotes courses designed for transfer to four-year institutions
 N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

◆MATH 1830 Elementary Calculus

4 Credits, 4 Class Hours

Introduction to concepts and methods of elementary calculus of one real variable as related to rational, exponential and logarithmic functions; nature of derivatives; differentiation; applications of derivatives; nature of integration; definite integral; applications of the definite integral. *Prerequisite:* MATH 1130 (College Algebra) or permission of department chair. *NOTE: Only one of MATH 1830 (Elementary Calculus) or MATH 1910 (Calculus and Analytic Geometry I) may be used to satisfy degree requirements.*

◆MATH 1910 Calculus and Analytic Geometry I

4 Credits, 4 Class Hours

Study of tangents, limits and continuity, differentiations and its applications, anti-differentiations and the definite integral. *Prerequisite:* MATH 1750 (Algebra and Trigonometry II), or MATH 1130 (College Algebra) and MATH 1720 (College Trigonometry). *NOTE: Only one of MATH 1830 (Elementary Calculus) or MATH 1910 (Calculus and Analytic Geometry I) may be used to satisfy degree requirements.*

◆MATH 1920 Calculus and Analytic Geometry II

4 Credits, 4 Class Hours

Study of the definite integral and its applications, exponential and logarithmic functions, transcendental functions, techniques of integration, and infinite series. *Prerequisite:* MATH 1910 (Calculus and Analytic Geometry I)

◆MATH 2110 Calculus and Analytic Geometry III

4 Credits, 4 Class Hours

Study of Taylor and Maclaurin series, conic sections, vectors in two and three dimensions, partial differentiations, multiple integration, and selected topic in vector calculus. *Prerequisite:* MATH 1920 (Calculus and Analytic Geometry II)

◆MATH 2120 Differential Equations

3 Credits, 3 Credit Hours

Study of ordinary differential equations, including first order equations, second order linear equations, higher order linear equations, models and applications, series solutions, la place transforms. *Prerequisite:* MATH 2110 (Calculus and Analytic Geometry III)

Mechanical Engineering Technology

MEET 1134 Engineering Materials

4 Credits, 3 Class Hours, 2 Lab Hours

This course includes the study of the characteristics of ferrous and nonferrous engineering materials, plastics, wood, and concrete along with their production, fabrication, and heat treating processes. The student will gain hands-on experience dealing with hardness testing, tensile testing, heat treatment, and metallurgical equipment, methods, and analysis. *Prerequisite:* DSPM 0850 or approval of Program Coordinator

MEET 1144 Machines Technology

4 Credits, 3 Class Hours, 2 Lab Hours

In this course, the student is introduced to engineering technology and the study of modern production methods and practices. The introduction phase emphasizes the field of engineering technology, unit systems, conversions, the hand-held calculator, technical mathematics, safety, measuring instruments, library usage, problem solving, and laboratory exercises/reports. The machines phase emphasizes the use of production tools, machines, and equipment. The student is introduced to Geometric Dimensioning and Tolerancing (GDT). *Prerequisite:* DSPM 0850 or approval of Program Coordinator

MEET 1154 Statics and Dynamics

4 Credits, 3 Class Hours, 2 Lab Hours

This course covers the two areas of engineering mechanics - statics and dynamics. The statics section covers problems solving techniques dealing with resultants, free-bodies, trusses, center of gravity, equilibrium, moment of inertia, and friction. The dynamics section covers problems solving techniques dealing with dynamic force

T systems, kinematics, kinetics, work and energy, impulse, momentum, power, and friction. *Prerequisites:* MATH 1740, PHYS 1110 or approval of Program Coordinator

MEET 1184 Design Principles

4 Credits, 3 Class Hours, 2 Lab Hours

This course is designed as a first course in engineering drafting and design. The course includes a series of educational experiences relating to the field of engineering design beginning with lines and lettering and building to the final graphical communication sent to the production line. These educational experiences include instruments and drafting techniques, lettering, geometric constructions, sketching, multiview projection, axonometric projection, oblique projection, auxiliary and normal views, section, threads and fasteners, geometric dimensioning and tolerancing, and welding symbology. *Prerequisite:* DSPM 0850 or approval of Program Coordinator

MEET 1210 CAD Design I

4 Credits, 3 Class Hours, 2 Lab Hours

This course is the first mechanical engineering course in Computer-Aided Design (CAD). It consists of a series of educational experiences relating to the field of engineering graphics that includes fundamental drafting principles, geometric constructions, orthographic projection, isometric projection, sectional views, and dimensioning techniques. The course presents logical and well-tested, step-by-step instruction about the AutoCAD commands, mode setting, drawing aids, shortcuts, and other valuable characteristics of AutoCAD. *Prerequisite:* DSPM 0850 or approval of Program Coordinator

MEET 1220 CAD Design II

4 Credits, 3 Class Hours, 2 Lab Hours

CAD Design II is a continuation of MEET 1210. Its drafting topics consist of Geometric Dimensioning and Tolerancing, (GDT), threads and fasteners, welding notation, assembly drawings, working drawings, auxiliary views, piping schematics, and electrical schematics. AutoCAD topics covered include effective use of layers, colors, and line types as well as symbol libraries, blocks, and system variables. Lecture and laboratory go hand-in-hand as the student develops intricate technical drawings. *Prerequisite:* MEET 1210 or approval of program coordinator

MEET 1303 Technical Presentations

3 Credits, 2 Class Hours, 2 Lab Hours

This course utilizes design and presentation software to create multimedia presentations for use by engineering and technical staff in industry. The course also covers presentations using Power Point and the Internet. Additional topics cover video capture technology and editing techniques as well as basic technical writing and graphic design. *Note- Proficiency with MS Word, MS Works, or Word Perfect is recommended as is familiarity with MS Windows. *Prerequisite:* INET 1004, or approval of Program Coordinator

MEET 1314 Non-Destructive Testing

3 Credits, 2 Class Hours, 2 Lab Hours

This course examines the industry standard methods used to test material without causing damage. The student will study Non-Destructive Testing (NDT) methods including ultrasonic, magnetic particle, radiographic, eddy current, and liquid penetrant. Additionally, the student will gain hands-on experience with ultrasonic, liquid penetrant, and magnetic particle equipment. *Prerequisite:* MEET 1134, INET 1004 or approval of Program Coordinator

MEET 1324 Destructive Testing

4 Credits, 3 Class Hours, 2 Lab Hours

This course studies the major methods employed by industry to test materials for specified properties. The student will gain hands-on experience with tensile testing, hardness testing, impact testing, chemical analysis, test standards, specimen preparation, metallography and weld testing. *Prerequisite:* MEET 1134, INET 1004 or Program Coordinator approval

| | | |
|---|---|--|
| <p>MEET 2144 Machine Design and Special Problems 4 Credits, 3 Class Hours, 2 Lab Hours Machine Design and Special Problems is a course in which the principles of engineering technology are applied to the design of machines and mechanical systems. Calculations determining the size and shape of machine elements and the selection of materials are emphasized. In the laboratory portion of this course, the student utilizes the knowledge gained in this and previous courses to design, fabricate, analyze and report formally on a project selected by the student and approved by the instructor. <i>Prerequisite: CCET 2203, MEET 1220, INET 1004 or approval of program coordinator</i></p> | N | <p>MEET 1932 Cooperative Education Work Experience II N 3 Credits, 225 Lab Hours In this course the student receives supervised work experience in any of the many facets of mechanical engineering technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: MEET 1931 or MEET 1941</i></p> |
| <p>MEET 2154 Fluid Systems 4 Credits, 3 Class Hours, 2 Lab Hours The major divisions of this course include characteristics of noncompressible fluids; pressure, head and force; buoyancy and displacement; flow rate, velocity, and power; Bernoulli's equation and energy relationships; orifices, nozzles, and other flow devices; series and parallel pipe systems; flow in non-circular cross sections; open channel flow; flow measurement; pump selection; and forces created by fluids. <i>Prerequisites: MATH 1750, PHYS 1110 or approval of program coordinator</i></p> | N | <p>MEET 1942 Cooperative Education Work Experience II-A N 4 Credits, 300 Lab Hours In this course the student receives supervised work experience in any of the many facets of mechanical engineering technology. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements. <i>Prerequisite: MEET 1931 or MEET 1941</i></p> |
| <p>MEET 2163 Electro-Mechanical Devices 3 Credits, 2 Class Hours, 3 Lab Hours This course includes electrical and electronic nomenclature and symbols; the use of the VOM, VTVM, and oscilloscope; direct and alternating current; transformers and regulators; motors and generators; electrical circuits; and techniques of electrical component selection. <i>Prerequisites: MATH 1750, PHYS 1120 or approval of program coordinator</i></p> | N | <p>MEET 1933 Cooperative Education Work Experience III N 3 Credits, 225 Lab Hours The student acquires work experience in the mechanical engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Mechanical Engineering Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: MEET 1932 OR MEET 1942</i></p> |
| <p>MEET 2173 Air Conditioning 3 Credits, 2 Class Hours, 3 Lab Hours This is a course wherein air conditioning is used to introduce the student to the principles of thermodynamics and heat transfer. Topics covered include basic thermodynamic principles, heat and the change of state, heat transfer, psychometric chart techniques, human comfort factors, load and load calculations, equipment selection, mechanical refrigeration, fluid flow, evaporative systems, air distribution, and control systems. <i>Prerequisites: MATH 1750, PHYS 1110 or approval of program coordinator</i></p> | N | <p>MEET 1943 Cooperative Education Work Experience III-A N 4 Credits, 300 Lab Hours The student acquires work experience in the mechanical engineering technology field under the supervision of an engineer or senior technician. The student utilizes knowledge gained in any or all Mechanical Engineering Technology courses to accomplish tasks as assigned by the engineer. <i>Prerequisite: MEET 1932 or MEET 1942</i></p> |
| <h2>Medical Laboratory Technology</h2> | | |
| <p>MEET 2210 3D Modeling I 4 Credits, 3 Class Hours, 2 Lab Hours The purpose of this course is to provide students with an understanding of the features, limitations, and considerations associated with the operation of a parametric Computer-Aided Design (CAD) 3D system. Emphasis is placed on the operation of Mechanical Desktop and Inventor 3D software. A variety of industrial-type problems are included as an integral part of the laboratory activities. <i>Prerequisite: MEET 1220 or approval of Program Coordinator</i></p> | N | <p>MLT 1110 Orientation to Medical Laboratory N 3 Credits, 2 Lecture Hours, 2 Lab Hours This course explores clinical laboratory sciences with an analysis of routine tests performed in the medical laboratory, including terminology, basic laboratory skills, and an introduction to the health care team.</p> |
| <p>MEET 2220 3D Modeling II 4 Credits, 3 Class Hours, 2 Lab Hours This course is a continuation of MEET 2210 in which students continue to build their 3D skills. Students will develop 3D assemblies and mechanical systems for analysis. The models will be given surface textures and rendered to produce photo-realistic images. Students will also cover the basics of 3D model animation. <i>Prerequisite: MEET 2210 or approval of Program Coordinator</i></p> | N | <p>MLT 1500 Phlebotomy N 3 Credits, 2 Lecture Hours, 2 Lab Hours This course covers the study of skin puncture and venipuncture in collecting blood for laboratory testing, including principles of proper phlebotomy techniques, specimen distribution, patient care, preparation and maintenance of equipment, record keeping and basic principles of anatomy and physiology.</p> |
| <p>MEET 1931 Cooperative Education Work Experience I N 3 Credits, 225 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.</p> | N | <p>MLT 1550 Phlebotomy Seminar N 2 Credits, 2 Lecture Hours Interpersonal skills for phlebotomists are discussed, including basic concepts of communication, stress management, professional behavior, legal implications, current issues and a review of laboratory phlebotomy principles and procedures and a comprehensive examination. Emphasis is placed on specimen processing and computer entry data. <i>Prerequisites MLT 1110 and 1500 and admission to PLT program</i></p> |
| <p>MEET 1941 Cooperative Education Work Experience I-A N 4 Credits, 300 Lab Hours From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.</p> | N | |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|---|---|--|---|
| <p>MLT 1570 Phlebotomy Clinical Assignment 12 Credits, 12 Lab Hours This course involves a supervised training at various clinical facilities to provide experience in skin puncture, venipuncture, patient care, and specimen handling/distribution. Includes computer skills development. <i>Prerequisite: MLT 1110 Orientation to the Medical Laboratory, MLT 1500 Phlebotomy, permission of instructor, and admission to the PLT program. Co-requisite: 1570 Phlebotomy Seminar.</i></p> | N | <p>MLT 2820 Clinical Assignments II 10 Credits, 10 Lab Hours Continuation of Clinical Assignment I. <i>Prerequisite: MLT 2810 or permission of instructor</i></p> | N |
| Medical Terminology | | | |
| <p>MLT 2100 Medical Biochemistry 5 Credits, 8 Lecture Hours, 8 Lab Hours This course involves instruction in basic anatomy and pathophysiology of the urinary, digestive, circulatory, respiratory, endocrine and reproductive systems, including structure and metabolism of carbohydrates, lipids, NPN compounds, hormones, minerals, enzymes, electrolytes, fluids and drugs and their variation in disease. Principles of quality control and instrumentation are also covered. <i>Prerequisite: CHEM 1010 or CHEM 1070 or CHEM 1111, admission to the MLT program or permission of the instructor.</i></p> | N | <p>AHS 1020 Medical Terminology 3 Credits, 3 Class Hours Medical terminology is the study of words that relate to body systems, anatomical structures, medical processes and procedures, drugs and a variety of diseases that afflict humans. Prefixes, suffixes, abbreviations, plural endings, word roots, and combined forms are covered. Terms are presented that relate to all areas of medical science, hospital service and paramedical facilities.</p> | N |
| Merchandising | | | |
| <p>MLT 2120 Medical Hematology 6 Credits, 6 Lecture Hours, 10 Lab Hours This course is a study of clinical hematology with emphasis on the complete blood count and peripheral blood differential and the basic anatomy and physiology of the kidney, including principles of homeostasis, cell maturation, anemia, leukemias and other blood dyscrasias, making and staining blood smears, various routine test procedures, quality control, anatomy and physiology relative to hematopoiesis and cellular metabolism, and a study of the physiochemical and chemical properties of urine and the microscopic examination of urinary sediment. <i>Prerequisite: Admission to MLT or permission of instructor</i></p> | N | <p>MRCH 1470 Visual Merchandising and Store Promotion 3 Credits, 3 Lecture Hours, 3 Lab Hours This course surveys store promotions including visual, advertising, publicity, and special events with application through simulation activities.</p> | N |
| <p>MLT 2320 Medical Microbiology 7 Credits, 7.5 Lecture Hours, 10 Lab Hours The student studies microorganisms of medical importance to man and the body's immunological response to infectious agents, including anatomy and physiology relative to cellular and humoral immunity, principles of the immune response, structure and function of antigens and antibodies, antigen/antibody reactions, serological methods, proper collection, handling and examination of specimens, culture techniques, identification methods, drug sensitivity testing, and quality control procedures. <i>Prerequisite BIOL 2410, MLT 1110, and admission to MLT program or permission of instructor.</i></p> | N | <p>MRCH 1700 Retail Merchandising 3 Credits, 3 Class Hours This course introduces enterprises, activities, operations and practices in the fashion industry, with emphasis on merchandising terminology and techniques.</p> | N |
| <p>MLT 2510 Immunohematology 3 Credits, 6 Lecture Hours, 10 Lab Hours The student studies blood banking with emphasis on human blood group antigens and antibodies, including principles of donor requirements and phlebotomy, blood component preparation and use, blood storage, blood compatibility, genetics, problem solving techniques, quality control, and anatomy and physiology relative to transfusion therapy. <i>Prerequisite admission to MLT program or permission of instructor.</i></p> | N | <p>MRCH 2700 Merchandise Planning and Control 3 Credit, 3 Class Hours This is an investigation of retail store organization with emphasis on the merchandising division. Topics include dollar merchandise planning, assortment planning unit control, inventory control, and merchandise selection.</p> | N |
| <p>MLT 2710 Clinical Seminar 2 Credits, 2 Lecture Hours This course is an analysis of organizational management, structure and current issues in the clinical laboratory, a review of medical laboratory principles and procedures and a comprehensive examination and presentation of topics by students and healthcare practitioners. <i>Prerequisites: MLT 1110, MLT 1500, MLT 2100, MLT 2120, MLT 2320, MLT 2510, or permission of the instructor</i></p> | N | <p>MRCH 2720 Applied Merchandising Techniques 3 Credits, 3 Class Hours This course applies merchandising practices, procedures, techniques, and activities. Emphasis is on skills development and simulated experiences.</p> | N |
| Military Science (Army ROTC) | | | |
| <p>These courses are offered in cooperation with the University of Memphis.</p> | | | |
| <p>MILT 1100 Leadership Laboratory (Fall) 1 Credit Two laboratory hours per week.</p> | | | |
| <p>MILT 1101 Introduction to Military Science (Fall) 1 Credit Introduction to Army ROTC with hands-on approach through several basic military skills. Lectures and practical exercises in military rappelling and mountaineering, fundamentals in weapons training and an overview of the role of the United States Army. There is no military obligation. <i>Corequisite: MILT 1100</i></p> | | | |
| <p>MILT 1111 Principles of Leadership and Confidence Building (Spring) 2 Credits This course begins the leader development process by providing the skills, knowledge and attitudes necessary for the student to exhibit the leadership characteristics and traits. Students study orienteering and the fundamentals of survival training. There is no military obligation. <i>Corequisite: MILT 1115</i></p> | | | |
| <p>MILT 1115 Leadership Laboratory (Spring) 1 Credit Two laboratory hours per week</p> | | | |
| <p>MLT 2810 Clinical Assignment I 4 Credits, 4 Lab Hours Selected clinical experiences at the extended medical campuses, which provide students with an opportunity to develop competencies in hematology, immunology, microbiology, immunohematology, urinalysis, and medical biochemistry under the supervision of medical technologists. <i>Prerequisites: MLT 1110, MLT 1500, MLT 2100, MLT 2120, MLT 2320, MLT 2510, or permission of the instructor</i></p> | N | | |

MILT 2200 Leadership Laboratory (Fall) 1 Credit
Two laboratory hours per week

MILT 2201 American Military History (Fall)
3 Credits
Developments since colonial period; emphasis on background and growth of national military and naval establishments, military and naval thought, difficulties accompanying modernization and assumption of global responsibilities and problem of relationship between civilian and military-naval sectors in democracy. There is no military obligation. *Corequisite: MILT 2200*

MILT 2211 Fundamental Survival Skills (Spring)
1 Credit
A continuation of the leader development process with an emphasis on military first aid and survival planning. There is no military obligation. *Corequisite: MILT 2215*

MILT 2215 Leadership Laboratory (Spring)
1 Credit Two laboratory hours per week

MILT 2221 Small Unit Tactics I (Fall)
2 Credits
This course emphasizes preparation of the individual for combat. It includes preparation of potential leaders in combat through study of the knowledge and skills needed by an individual soldier. Skills are developed in planning and organizing by combat patrols. The course includes a series of field practicums. There is no military obligation.

MILT 2231 Small Unit Tactics II (Spring)
2 Credits
Advanced concepts in reconnaissance, raid and ambush patrolling techniques, extended patrolling operations and application techniques for specialized equipment. Leadership skills through student-led patrols. Includes series of field practicums. Expands material taught in MILT 2221 but may be taken independently of MILT 2221. There is no military obligation.

Music

◆MUS 1030 Music Appreciation T
3 Credits, 3 Class Hours
Music Appreciation is designed to increase the student's enjoyment and understanding of music. This course assists the student in listening to, recognizing and synthesizing elements that can apply to any musical work. The student discovers contemporary music of America as well as music of other periods and cultures.

MUS 1050 Fundamentals of Music N
3 Credits, 3 Class Hours
This course is an introduction to basic music structural elements including notation, rhythm, scales intervals, and triads. Writing, sight-singing, ear-training, and keyboarding skills are developed.

MUS 1080 Introduction to Music History N
3 Credits, 3 Class Hours
This course presents a broad base survey of music history. Studies include a review of fundamentals and a study of European and American music history.

MUS 1150 Basic Music Theory I T
3 Credits, 3 Class Hours, 2 Lab Hours
This course is a continuation of written and aural skills acquired in Fundamentals of Music. Emphasis is on utilizing these skills in writing music with a focus on developing working knowledge of musical notation, grammar, and vocabulary.

MUS 1160 Basic Music Theory II T
3 Credits, 3 Class Hours, 2 Lab Hours
This course is a continuation of Basic Music Theory I, with an emphasis on the harmonic aspects of music. An introduction to harmonic analysis and part writing along with continued work on more complex aspects of melody and rhythm is included.
Prerequisite: MUS 1150 Basic Music Theory I

MUS 1200 Music and Worship N
2 Credits, 2 Class Hours
This course provides an understanding of the use of music in all phases of church life.

MUS 1220 Basic Choral Conducting N
2 Credits, 2 Class Hours
This course is an introduction to choral techniques including basic musicianship, reading a score, gesture, voice training, and style.

MUS 1230 Hymnology N
2 Credits, 2 Class Hours
This course is a study of the origin, development, and perpetuation of hymns and tunes.

MUS 1250 Concert Choir T
2 Credits, 3 Studio Hours
This course contains instruction in singing difficult music from all musical periods and styles. Audition required. Required course for all vocal music majors.

MUS 1350 Jazz Ensemble N
2 Credits, 3 Studio Hours
This course involves the performance of jazz, rock, and contemporary idioms. Enrollment by audition.

MUS 1380 Class Percussion T
2 Credits, 2 Lab Hours
This course involves instruction and daily practice in the percussion fundamentals. This class is open to all students.

MUS 1450 STCC Singers N
2 Credits, 3 Studio Hours
This course requires performance of gospel, spirituals and pop-jazz vocal music by a select choral ensemble of 15-25 singers. The group performs with rhythm section from the jazz ensemble.

MUS 1600 Class Piano T
2 Credits, 2 Studio Hours
This course contains instruction and daily practice on the piano. No previous training required.

MUS 1700 Class Voice T
2 Credits, 2 Class Hours
This course presents instruction in basic vocal technique involving development of breath technique, production of a good vocal sound, vowel formation and pronunciation in song and vocal literature.

MUS 1800 Class Guitar T
2 Credits, 2 Class Hours
Instruction in fundamentals, principles and daily practice of guitar emphasizing positions, note reading, tone production and the mastery of simple songs is presented.

MUS 2110 Arranging and Writing Music N
2 Credits, 2 Class Hours
This course is a study of music rhythm, melody, harmony, texture, timbre and form. Emphasis is on analysis, composition, music reading, ear training and arranging.

MUS 2120 Intermediate Music Theory I T
3 Credits, 3 Class Hours, 2 Lab Hours
This course is a continuation of written and aural skills acquired in Basic Music Theory II with emphasis on analysis of musical examples. It includes musical elements and how they affect the sound and performance of music from different style periods.
Prerequisite: MUS 1160 Basic Music Theory II

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
T – Denotes courses designed for transfer to four-year institutions
N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

MUS 2130 Intermediate Music Theory II
3 Credits, 1.3 Class Hours, 2 Lab Hours
 This is a continuation of written and aural skills acquired in Intermediate Music Theory I. This course emphasizes analysis and writing, and addresses modulation and chromaticism of part-writing and analysis.
Prerequisite MUSC 2120 *Intermediate Music Theory*

MUS 2990 Music Seminar
1-3 Credits, 1-3 Class Hours
 This course is an in-depth study in the music field. Topics vary according to student needs.

MUS 0510, 1510, 2510 Private Brass Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course presents individualized brass instruction at student's level and rate of development on the trumpet, horn, trombone, euphonium, or tuba.

MUS 0560, 1560, 2560 Private Percussion Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course presents individualized percussion instruction at student's level and rate of developments.

MUS 0660, 1660, 2660 Private Guitar Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course presents individualized guitar instruction at student's level and rate of developments.

MUS 0760, 1760, 2760 Private Woodwind Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course presents individualized woodwind instruction at student's level and rate of development.

MUS 0910, 1910, 2910 Private Piano Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course presents individualized piano instruction at student's level and rate of development.

MUS 0920, 1920, 2920 Private Organ Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course provides individualized organ instruction at student's level and rate of development. Audition required or permission through conference with instructors.

MUS 0950, 1950, 2950 Private Voice Instruction
1-2 Credits, 1 Credit Equals 1/2 hr Private Instruction
 This course provides individualized voice instruction at student's level and rate of development.

Natural Sciences

NSCI 1000 Environmental Sciences
3 Credits, 3 Lecture Hours
 This course is designed to meet core requirements for certain career programs. This core does not meet General Education Requirements for A.A. and A.S. degrees. The course includes an application of biological and physical concepts. It also includes an appreciation of man's relationship with his living and non-living environments.

NSCI 1001 Environmental Sciences Laboratory
1 Credit, 3 Lab Hours
 This course is designed to meet core requirements for career programs but not for A.A. or A.S. degrees. Application of biological and physical science concepts. Includes an appreciation of man's relationship with his living and non-living environments.

NSCI 1010 Special Topics in Natural Sciences
1-6 Credits
 A series of topics designed to attract students from all academic areas. Special topics titles are published in the class schedule as the topics are offered. Emphasis on appreciation of the natural sciences and their application to humanity.

Nursing

NURS 1114 Foundations of Nursing
4 Credits, 4 Class Hours
 This course introduces the concepts of health, the nursing process, and man's adaptive responses. Emphasis is placed on utilizing the nursing process based on a set of universal needs according to Maslow's Hierarchy of Needs to assist clients in adapting to problems interfering with homeostasis. *Prerequisites: Admission to the nursing program, eligibility to enroll in college-level courses. Co-requisites: BIOL 2010 Anatomy and Physiology I, college-level mathematics, NURS 1126, NURS 1136, NURS 1141*

NURS 1126 Foundations of Nursing Clinical
2 Credits, 6 Clinical Hours
 Clinical experiences are planned to correlate with classroom theory and provide learning opportunities that increase competence in the components of the nursing process.
Prerequisites: Admission to the nursing program, eligibility to enroll in college-level courses. Co-requisites: BIOL 2010 Anatomy and Physiology I, college-level mathematics, NURS 1114, NURS 1136, and NURS 1141

NURS 1136 Nursing Skills Laboratory
1 Credit, 3 Lab Hours
 The nursing skills laboratory course presents nursing procedures in the nursing process format. Skills competency is a major component with 100% competency expectation in the laboratory before transferring skills to the patient population. Critical thinking skills are incorporated in various ways throughout the course to assist students in applying critical thinking to clinical situations. *Prerequisites: Admission to the nursing program, eligibility to enroll in college-level courses. Co-requisites: NURS 1114, NURS 1126, NURS 1141, BIOL 2010 Anatomy and Physiology I, college-level mathematics*

NURS 1141 Dosages and Solutions
1 Credit, 1 Class Hour
 Dosages and Solutions provides information essential for calculating dosages and understanding drug orders and labels. The student learns and practices the skills of dosages and calculations. Students learn to recognize common abbreviations and select correct dosages for medication administration. Critical thinking skills are applied to medication situations to emphasize the importance of accuracy and the avoidance of medication errors.
Prerequisites: Admission to the Nursing program, eligibility to enroll in college-level courses. Co-requisites: NURS 1114, NURS 1126, NURS 1136, BIOL 2010 Anatomy and Physiology I, college-level mathematics

NURS 1213 Adult Health Nursing I
3 Credits, 6 Class Hours
 Development of knowledge articulates with the concepts and clinical skills, adaptation and the nursing process including physiological, psychosocial, and health teaching aspects of client care in diverse health care settings. Emphasis is placed on problem-solving and critical thinking skills in determining client's adaptive responses to the interruption of his/her health status. This is a half semester course.
Prerequisites: NURS 1114, NURS 1126, NURS 1136, NURS 1141, BIOL 2010 Anatomy and Physiology I, college-level mathematics. Co-requisites: NURS 1226, NURS 1242, NURS 1613, NURS 1626, BIOL 2020 Anatomy and Physiology II

NURS 1226 Adult Health Nursing I Clinical
2 Credits, 12 Clinical Hours
 Clinical experiences include planning and providing clinical caring interventions for clients in diverse health care settings. Emphasis is placed on developing healthcare competencies in clinical decision making, communication, assessment, teaching and learning. This is a half semester course. *Prerequisites: NURS 1114, NURS 1126, NURS 1136, NURS 1141, BIOL 2010 Anatomy and Physiology I, college-level mathematics. Co-requisites: NURS 1213, NURS 1242, NURS 1613, NURS 1626, BIOL 2020 Anatomy and Physiology II.*

| | | | |
|--|---|--|---|
| <p>NURS 1242 Pharmacology 2 Credits, 2 Class Hours This course acquaints the students with drug classifications used in treating common conditions. Content will focus on actions, uses, side effects, and nursing implications for commonly used drugs. <i>Prerequisites:</i> NURS 1114, NURS 1126, NURS 1136, NURS 1141, BIOL 2010 Anatomy and Physiology I, college-level mathematics. <i>Co-requisites:</i> NURS 1213, NURS 1226, NURS 1613, NURS 1626, BIOL 2020 Anatomy and Physiology II</p> | N | <p>half semester course.<i>Prerequisites:</i> Successful Completion of the Level I Proficiency Exam; BIOL 2020 Anatomy and Physiology II; college-level mathematics, NURS 1213, NURS 1226, NURS 1242, NURS 1613, NURS 1626. <i>Co-requisites:</i> NURS 2313, NURS 2326, NURS 2113</p> | |
| <p>NURS 1613 Nursing of the Childbearing Family 3 Credits, 6 Class Hours The focus is on the study of the pregnant client and her family throughout the pregnancy. Emphasis is on the adaptive processes needed to maintain a healthy equilibrium. A major focus will be on the introduction of normal maternal and neonatal health concepts and their deviations. This is a half semester course. <i>Prerequisites:</i> NURS 1114, NURS 1126, NURS 1136, NURS 1141, BIOL 2010 Anatomy and Physiology I, college-level mathematics <i>Co-requisites:</i> NURS 1213, NURS 1226, NURS 1242, NURS 1626, BIOL 2020 Anatomy and Physiology II</p> | N | <p>NURS 2313 Mental Health Nursing 3 Credits, 6 Class Hours The course focuses on aspects of the individual's adaptive response to the external and internal environment along the mental health continuum. The concepts of holistic man, therapeutic use of self, self-awareness, culture and the nursing process are emphasized. Theories of personality development are presented as well as concepts of psychobiology and stress. Theory focuses on therapeutic approaches to psychiatric care and its application in the clinical and community setting with clients experiencing alterations in psychosocial adaptation. This is a half-semester course. <i>Prerequisites:</i> Successful Completion of the Level I Proficiency Exam; BIOL 2020 Anatomy and Physiology II, college-level mathematics, NURS 1213, NURS 1226, NURS 1242, NURS 1613, NURS 1626 <i>Co-requisites:</i> NURS 2326, NURS 2113, NURS 2126.</p> | N |
| <p>NURS 1626 Nursing of the Childbearing Family Clinical 2 Credits, 12 Clinical Hours This course involves the implementation of care for the expectant family during the antepartum, intrapartum, postpartum, and newborn period. The nursing process involving critical thinking will be utilized to give total and individualized client care. This is a half-semester course. <i>Prerequisites:</i> NURS 1114, NURS 1126, NURS 1136, NURS 1141, BIOL 2010 Anatomy and Physiology I, college-level mathematics. <i>Co-requisites:</i> NURS 1213, NURS 1226, NURS 1242, NURS 1613, BIOL 2020 Anatomy and Physiology I</p> | N | <p>NURS 2326 Mental Health Nursing Clinical 2 Credits, 12 Clinical Hours Clinical experiences focus on therapeutic caring intervention approaches to psychiatric care, and their application in clinical and community settings with clients experiencing alterations in psychosocial adaptation. This is a half-semester course. <i>Prerequisites:</i> Successful Completion of the Level I Proficiency Exam; BIOL 2020 Anatomy and Physiology II; College-level mathematics, NURS 1213, NURS 1226, NURS 1242, NURS 1613, NURS 1626. <i>Co-requisites:</i> NURS 2313, NURS 2126, NURS 2113</p> | N |
| <p>NURS 1914 Professional Nursing Transitions 4 Credits, 4 Class Hours This course builds on the Licensed Practical Nurse's knowledge of the nursing process, health-illness continuum, and the individual's responses to internal/external stressors. <i>Prerequisites:</i> Admission to the Nursing program LPN Mobility Track, Current LPN licensure, eligibility for college English, BIOL 2010 Anatomy and Physiology I, BIOL 2020 Anatomy and Physiology II, and college-level mathematics. <i>Co-requisites:</i> NURS 1926 Professional Nursing Transitions Clinical, NURS 1242 Pharmacology</p> | N | <p>NURS 2412 Nursing Management 2 Credits, 2 Class Hours This course involves discussion of problems, issues, and stressors inherent in adaptation from student to practitioner. This course reviews management principles and explores the expanded role of the nurse, including educational preparation differences of the RNs. Risk Management, ethical/political principles, and job readiness skills. There is discussion of the health care system as it exists in today's society and the inherent stressors of this system. The use of the nursing process and communication skills in the role of a team leader are stressed. Emphasis is placed on the synthesis of knowledge, responsibilities of delegation and nursing management. <i>Prerequisites:</i> NURS 2313, NURS 2326, NURS 2113, NURS 2126. <i>Co-requisites:</i> NURS 2414, NURS 2426, NURS 2436</p> | N |
| <p>NURS 1926 Professional Nursing Transitions Clinical 1 Credit, 3 Class Hours This course builds on the Licensed Practical Nurse's implementation of the nursing process as it relates to the individual's responses to internal/external stressors and health-illness continuum. <i>Prerequisites:</i> Admission to the Nursing program LPN Mobility Track, Current LPN licensure, eligibility for college English, BIOL 2010 Anatomy and Physiology I, BIOL 2020 Anatomy and Physiology II, and college-level mathematics. <i>Co-requisites:</i> NURS 1914 Professional Nursing Transitions, NURS 1242 Pharmacology</p> | N | <p>NURS 2414 Adult Health Nursing II 4 Credits, 4 Class Hours This course is a continuation of developing knowledge of health, adaptation, and the nursing process and includes incorporating physiological and psychosocial data in delivering individualized nursing care to clients, developing skills in utilizing principles of therapeutic communication and teaching learning for the client's specific development stage. <i>Prerequisites:</i> NURS 2313, NURS 2326, NURS 2113, NURS 2126 <i>Co-requisites:</i> NURS 2426, NURS 2412, NURS 2436</p> | N |
| <p>NURS 2113 Nursing of Children 3 Credits, 6 Class Hours Focus is on the adaptation of the child to physical and developmental changes from infancy to adolescence. Emphasis is on using the nursing process in caring for the sick child and the family with common health problems including a comparative study of the healthy child. This is a half-semester course. <i>Prerequisites:</i> Successful Completion of the Level I Proficiency Exam; BIOL 2020 Anatomy and Physiology II, college level mathematics, NURS 1213, NURS 1226, NURS 1242, NURS 1613, NURS 1626. <i>Co-requisites:</i> NURS 2313, NURS 2326, NURS 2126</p> | N | <p>NURS 2426 Adult Health Nursing II Clinical 2 Credits, 6 Clinical Hours Adult Health Nursing II clinical is designed to develop the competencies of critical thinking, collaboration, accountability, and lifelong learning activities upon the entry into practice. <i>Prerequisites:</i> NURS 2313, NURS 2326, NURS 2113, NURS 2126. <i>Co-requisites:</i> NURS 2414, NURS 2412, NURS 2436</p> | N |
| <p>NURS 2126 Nursing of Children Clinical 2 Credits, 12 Clinical Hours This course places emphasis on the use of the nursing process for the care of the child in the sick role, and adaptive behaviors used by the family and the child in the sick role. A comparative study of the healthy child is provided through observational experiences in community agencies. Hospital clinical experiences provide the student with opportunities to apply principles of pediatric nursing. This is a</p> | N | | |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

NURS 2436 Nursing Management Clinical N
1 Credit, 3 Clinical Hours
 This course complements the management theory, utilizing the synthesis of knowledge acquired. The student is given the opportunity to apply principles of management in the clinical setting.
Prerequisites: NURS 2113, NURS 2126, NURS 2313, NURS 2326
Co-requisite: NURS 2412, NURS 2414, NURS 2426

NURS 2990 Special Topics in Nursing N
1-3 Credits, 1-3 Class Hours
 In-depth study of concepts related to selected aspects of nursing. Permission of the Department Chair required.

Occupational Safety and Environmental Health Technology

ENVI 1023 Hazard Communication and Multimedia Reporting N
3 Credits, 3 Class Hours
 This course will inform the student on what the Hazard Communications Standard is and how to implement it within the work place. Other forms of required industrial and commercial environmental reporting will be addressed; storm water permits, wastewater discharge permits, hazardous waste permits, air permitting and community toxic chemical release reporting will be covered.

ENVI 2003 OSHA Hazardous Waste Operations N
3 Credits, 2 Class Hours, 2 Laboratory Hours
 This course is designed to provide the training required under 29 CFR 1910.120 for hazardous waste site personnel. Topics include hazard recognition, hazard control, monitoring, work practices, emergency response, and rights and responsibilities.

ENVI 2013 Solid and Hazardous Waste Management N
3 Credits, 3 Class Hours
 This is a course covering the generation, storage, transportation and disposal of solid and hazardous waste. Emphasis is placed on waste minimization and treatment, handling procedures, manifestation and contingency planning to ensure compliance with regulatory requirements.

ENVI 2023 Ergonomics N
3 Credits, 3 Class Hours
 This course is the study of harmonizing the work environment to the physical and mental capabilities and limitations of people. The entire work system is examined through the application of industrial engineering, psychological and physiological principles to design jobs and maximize productivity.

ENVI 2033 Fire Protection and Accident Prevention N
3 Credits, 3 Class Hours
 This course is a study of the principles and techniques used in industrial or business related fire, accident and disaster preparedness. It also includes prevention, response and recovery planning, as well as management of the safety program.

ENVI 2044 Industrial Hygiene N
4 Credits, 4 Class Hours
 This course prepares the student to recognize and evaluate occupational hazards: noise, heat, dust, solvents, ionizing, and nonionizing radiation. Control measures such as ventilation, personal protection equipment and respiratory protection are covered. Government regulations and their impact upon the industry are addressed. Technical report writing is emphasized and the student is required to write formal reports on projects.
Prerequisite: CHEM 1121

Office Administration

CMPT 1010 Computers in Business N
3 Credits, 3 Class Hours
 An introduction to computer concepts and terms, the use of computers in business and selected software packages for those without prior training or knowledge. Topics included are operating systems, information systems, file management, programming, hardware, software, and social and ethical considerations. This course also includes an overview of selected business word-processing, spreadsheet, and database management application software: Keyboard proficiency recommended. Students who receive credit for CMPT 1010 cannot receive credit for COMP 1010, Computer Literacy.

OFAD 1050 Business Communication N
3 Credits, 3 Class Hours
 The course is a study of logical, effective and creative methods of business communication. The course covers business writing styles, proper physical presentation of written communication, selected business letter types, memoranda, and reports, and resume and application letters. *Prerequisite: ENGL 1010*

OFAD 1080 Computer Data Entry N
3 Credits, 3 Class Hours
 Development of ten-key data entry skills and introduction to data management systems will be covered. Use of data management software to create and modify file structure, update database files, retrieve, search for, and print information, and generate simple reports and mailing labels. *Prerequisite: OFAD 1110*

OFAD 1110 Keyboarding I N
3 Credits, 3 Class Hours
 This is an introductory course to develop basic keyboarding skills that are needed to input alphabetic and numeric information accurately and quickly by touch on microcomputers. Emphasis on learning the touch operation of the computer keyboard is stressed, as well as building speed and accuracy. Basic document formatting is taught.

OFAD 1120 Keyboarding II N
3 Credits, 3 Class Hours
 This course provides practice on the alphabetic keyboard to develop competencies for employment testing. Development of speed and accuracy is emphasized. This course includes detailed and precise information for preparing and formatting business documents using word processing. Emphasis is placed on using proper formatting in the preparation of business letters, memoranda, reports, and tables. Keyboarding proficiency required. Students must demonstrate ability to type 25 wpm at the first class meeting.

OFAD 1130 Keyboarding III N
3 Credits, 3 Class Hours
 This course is designed to further build speed and accuracy on the keyboard. This is a continuation of keyboarding including office correspondence and other documents. *Prerequisite: OFAD 1120 or proven keyboarding speed of 40 wpm for 5 minutes with no more than one error per minute.*

OFAD 1140 Records Management N
3 Credits, 3 Class Hours
 This course explores methods for temporary and permanent record storage including alphabetic, geographic, numeric, and subject filing systems. It covers mechanical, computerized and manual filing and retrieval methods, control of filed information, micro records, and the organization and operation of records management programs.

OFAD 1210 Microsoft Word I N
4 Credits, 4 Class Hours
 The application of word processing concepts and skills in entering editing, formatting, and executing commands using the various functions available in Microsoft Word for Windows are emphasized in this course. Some of the features taught include: copying and moving text, character and paragraph formatting, wizards and templates, merging, working with tabs, working with multiple documents, document references (headers, footers, footnotes and endnotes). This course meets MOUS certification requirements. Students must demonstrate ability to type 25 wpm at the first class meeting.

| | | |
|---|---|---|
| <p>OFAD 1220 WordPerfect I 3 Credits, 3 Class Hours The application of word processing concepts and skills in entering, editing, formatting, and executing commands using the various features available in WordPerfect for Windows are emphasized in this course. The occupational production level of business letters, memorandums, reports, and tables are also emphasized. Line spacing, alignment, fonts, margins, indents, and tabs to documents to enhance their professional appearance are among the basic document formats discussed. <i>Prerequisite:</i> OFAD 1110</p> | N | <p>are use of Excel databases, PivotTables, and data analysis tools such as Goal Seek, Solver, and Scenarios. This course meets Expert MOUS certification requirements. <i>Prerequisite:</i> OFAD1410</p> |
| <p>OFAD 1410 Excel I 4 Credits, 4 Class Hours This course is a hands-on course in which the student uses an electronic spreadsheet to plan, create, manipulate, and print worksheets. Topics include entering and editing data, formatting a worksheet, use of formulas and common functions, charts, advanced printing, and linking worksheets. This course meets Core MOUS certification requirements. Students must demonstrate ability to type 25 wpm at the first class meeting.</p> | N | <p>OFAD 2610 Administrative Office Management 3 Credits, 3 Class Hours This course is a study of practices and procedures of current office concepts including travel arrangements, itinerary planning, conference arrangements, etc. Also included are supervision of office personnel and labor-management relations. <i>Prerequisites:</i> OFAD 1120, ACCT 1210, OFAD 1140, and OFAD 1510 or CMPT 1010 <i>OFAD 2640 Medical Terminology, Anatomy and Physiology I</i></p> |
| <p>OFAD 1510 Microcomputer Office Applications 4 Credits, 4 Lecture Hours This course is designed to provide the student with computer skills in the Windows environment. Hands-on instruction covers Windows, word processing, spreadsheets, database management, presentations, and desktop information management. Students must demonstrate ability to type 25 wpm at the first class meeting.</p> | N | <p>OFAD 2640 Medical Terminology, Anatomy and Physiology I 3 Credits, 3 Class Hours This course will combine the relationship of anatomy, physiology and medical terminology as they relate to the body systems, anatomical structures and variety of diseases that afflict humans. Prefixes, suffixes, abbreviations, plural endings, word roots, and combined forms are covered. Terms and structures are presented that relate to all areas of medical science, hospital service, and paramedical facilities. Emphasis will be on the planes of the body as well as the digestive, urinary, reproductive, nervous, and respiratory systems.</p> |
| <p>OFAD 2040 Word Processing Transcription 4 Credits, 4 Class Hours This is a course designed to develop skill in the use of transcription equipment including transcribing recorded communication quickly and accurately on the microcomputer. Emphasis is placed on vocabulary building, proper punctuation, spelling, letter styles and placement, proofreading, and grammar. <i>Prerequisites:</i> OFAD 1210 or OFAD 1220</p> | N | <p>OFAD 2650 Medical Terminology, Anatomy and Physiology II N Second of two semester courses for the medical administrative assistant curriculum requirements. Students will study terminology associated with the structure and function of the circulatory, lymphatic, muscular, skeletal, integumentary, endocrine systems, and the sense organs. Additional emphasis will be placed on oncology, nuclear medicine, pharmacology and psychiatry. <i>Prerequisite:</i> OFAD2640</p> |
| <p>OFAD 2210 Microsoft Word II 4 Credits, 4 Class Hours This course teaches the advanced Microsoft Word features needed for the expert user. Students will create personalized form letters with envelopes and mailing labels; formal and technical reports; proposals and studies; newsletters, brochures, and manuals; and forms. Integrating Word with other programs and the World Wide Web will also be taught. This course meets MOUS certification requirements. <i>Prerequisite:</i> OFAD 1210</p> | N | <p>OFAD 2450 Desktop Publishing Using Word 3 credits, 3 Class Hours This course is a study of publishing techniques used with microcomputers. Design techniques and desktop functions will be discussed and used. Types of desktop documents will be discussed and created. <i>Prerequisite:</i> OFAD 1120 or minimum keyboarding speed of 40 words per minute and OFAD 2210</p> |
| <p>OFAD 2220 WordPerfect II 3 Credits, 3 Class Hours This course covers the advanced word processing applications including desktop publishing, macros, sorting, merging, etc., using WordPerfect for Windows. Special emphasis is placed on formatting documents for the business world. <i>Prerequisite:</i> OFAD 1220</p> | N | <p>OFAD 2700 Beginning Medical Office Transcription 3 Credits, 3 Lecture Hours Beginning Medical Office Transcription is designed to introduce the student to the use of dictation and transcription equipment used in medical office reports and correspondence. Reports include memos, letters, history and physicals, consultations, office notes, SOAP notes, operative reports, discharge summaries and simple radiological reports. Skill in the following areas will also be stressed: medical terminology grammar, keyboarding and the introduction of reference materials. <i>Prerequisites:</i> OFAD2640, OFAD 1210 or OFAD 1220</p> |
| <p>OFAD 2310 PowerPoint and Outlook 3 Credits, 3 Class Hours This course develops skills in using PowerPoint and Outlook needed for the expert user. In creating presentations using PowerPoint, students will learn to add visual elements, bring data in from other sources, modify and customize a presentation, and prepare presentations for distribution. Students will learn to use Outlook to organize their work and to communicate with others by using all the components of Outlook such as the journal, notes manager, mail client, contact and task managers, and calendar. Integrating PowerPoint and Outlook with other programs and the world wide web will also be taught. This course meets MOUS certification requirements. <i>Prerequisites:</i> OFAD 1110 or advisor approval</p> | N | <p>OFAD 2710 Advanced Medical Office Transcription 3 Credits, 3 Lecture Hours Advanced Medical Office Transcription is designed to enhance the student's skill in the transcription of dictation used in medical office and hospital reports. Reports include MRI brain scans, letters, discharge summaries, neuropsychological reports, history and physicals, chart notes, pathology reports, consultations and autopsy reports. Skill in the following areas will also be stressed: medical terminology from a variety of medical specialties, grammar skills, keyboarding skills, and the use of reference materials. <i>Pre-requisite:</i> OFAD 2700</p> |
| <p>OFAD 2410 Excel II 4 Credits, 4 Class Hours This course teaches the advanced Microsoft Excel features needed for the expert user. Topics include custom and conditional formatting, importing and exporting data, using range names, use of templates, managing multiple workbooks, consolidating worksheets, workgroup functions and security, auditing features, and macros. Also included</p> | N | |

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
 T – Denotes courses designed for transfer to four-year institutions
 N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|--|---|--|---|
| <p>OFAD 2730 Medical Office Practice 3 Credits, 3 Lecture Hours Technical, practical information is presented through realistic medical office simulations. Role playing situations, project assignments, and medical vocabulary review for the office assistant are included. <i>Prerequisites: OFAD2640, OFAD 1110</i></p> | N | <p>proceedings, the various kinds of law books and the law library, and the American system of law. Special attention is given to learning legal terminology. <i>Prerequisites: DSPR 0800, DSPW 0800 or equivalent</i></p> | |
| <p>OFAD 2740 CPT Coding I 3 Credits, 3 Lecture Hours In this course the student explores the major changes that have been implemented in processing insurance and patient information in the medical office environment. CPT Coding and ICD-9 classification standards are emphasized, using various systems for processing insurance claims and payment reimbursements. <i>Prerequisite: AHS 1110, OFAD 1210 or 1220</i></p> | N | <p>LEGL 1045 Legal Research 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. Students learn to perform legal research using federal and state statutes, legal encyclopedias, treatises, form books, government publications, and state and national reporters. Students also learn the proper method of citation and how to brief and analyze court cases. <i>Prerequisite: LEGL 1040 with a "C" or better</i></p> | T |
| <p>OFAD 2750 CPT Coding II 3 Credits, 3 Lecture Hours This course focuses on the current advanced-level descriptive terms and five-digit identifying codes and modifiers for reporting medical services performed by physicians. CPT and ICD-9 descriptive terms, numeric identifying codes and modifiers for reporting medical services, and procedures recommended by the American Health Information Management Association are covered extensively. <i>Prerequisite: OFAD 2740</i></p> | N | <p>LEGL 1050 Family Law 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. Laws, procedures, and documents involved in marriage, annulment, divorce, adoption, and child custody/child support are included. Students learn how to interview clients with family law problems and to prepare family law documents. <i>Prerequisite: LEGL 1040 with a "C" or better</i></p> | T |
| <p>OFAD 2760 Ethics and Law For Healthcare 3 Credits, 3 Lecture Hours This course will emphasize the analysis of human values and basic ethical positions which guide people's lives as they relate to the healthcare profession. Laws that guide contemporary medical practice, biological innovations, and the impact of scientific and technological advancements will be reviewed.</p> | N | <p>LEGL 1055 Legal Ethics and Professionalism 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. Students study the Canons of Ethics, the model Rules of Professional Responsibility, the unauthorized practice of law, and the various roles a legal assistant plays in a law office. <i>Prerequisites: DSPR 0800, DSPW 0800 or equivalent</i></p> | T |
| <p>OFAD 2990 Special Topics in Office Administration 1-3 Credits, 1-3 Class Hours This course is an in-depth study of selected office technology topic(s) designed to reinforce basic knowledge and to further develop problem-solving skills. Departmental approval required.</p> | N | <p>LEGL 1060 Real Estate Law 3 Credits, 3 Class Hours This course includes the study of zoning and easements, leases, and contracts and deeds. Special attention is given to the preparation of real estate contracts, closing statements, and other documents used in basic real estate transactions. Students also study title insurance and the various types of financing sources available in real estate transactions. This course is required for students in the real estate concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | T |
| <p>OFAD 1931 Cooperative Education I 3 Credits, 225 Laboratory Hours In this course the student receives supervised work experience in the office of an established business. Placement is made by the Office of Cooperative Education upon completion of one semester of technical coursework, or after all requirements for employment are met. The student utilizes knowledge gained in any or all the Office System courses to accomplish tasks as assigned within the modern office setting. <i>Prerequisite or Corequisite: Financial Administrative Assistant Concentration: completion of one semester or technical coursework; Administrative Assistant Concentration: OFAD 2210, OFAD 2610; Legal Assistant Concentration; LEGL 1080; Medical Administrative Assistant concentration: LEGL 1080, OFAD 2730, Insurance Administrative Assistant concentration: FINR 2000, FINR 2010</i></p> | N | <p>LEGL 1070 Torts 3 Credits, 3 Class Hours This course involves the study of traditional tort law and covers private or civil wrongs or injuries. Areas of study include intentional torts, negligence, appropriate standards of conduct, strict liability, and no-fault laws. Particular attention is given to the nature of personal injury litigation and its documentation and practices. This course is required for students in the litigation concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | T |
| <p>OFAD 1932 Cooperative Education Work Experience II 3 Credits, 225 Laboratory Hours This course consists of supervised employment in the student's chosen professional track. The cooperative education experience may substitute for a course in the student's major with the approval of the division chairperson. A significant amount of experience must relate to the course content for which the cooperative education is substituted. <i>Prerequisite: OFAD 1931</i></p> | N | <p>LEGL 1080 Law Office Management 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. It is designed to help the student develop skills for successful law office management. Course material includes human resource management, law office structure, basic financial management, and office communications. <i>Prerequisite: LEGL 1040 with a "C" or better</i></p> | N |
| | | <p>LEGL 1100 Constitutional Law 3 Credits, 3 Class Hours This course covers the development of fundamental principles in constitutional law and integrates the study of United States Supreme Court decisions. Course material includes judicial review, federalism, the Bill of Rights, and the powers of the Supreme Court, Congress, and the President. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N |

Paralegal Studies

LEGL 1040 Introduction to Law T
3 Credits, 3 Class Hours
 This introductory course is required for all students in the Paralegal Studies program, and is designed to provide a general overview of the legal system and various substantive areas of the law, such as contracts, criminal law, torts, and real estate. Students are introduced to the structure and functions of the court systems, the steps in legal

| | | | |
|---|---|--|---|
| <p>LEGL 1150 Legislative Analysis and Drafting 3 Credits, 3 Class Hours This course acquaints the student with legislative procedure as well as analysis and drafting of legislation. Students review the role of the three branches of government in law making, the procedural and legal requirements for drafting legislation, the methods used for analysis and construction (interpretation) of legislation, and the constitutional implications to be considered in drafting legislation. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>LEGL 2035 Courts and Procedures II 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program and builds on the rules and procedures learned in LEGL 2030. Students draft a variety of pleadings, motions and discovery documents, including interrogatories, requests for production of documents, and requests for admissions. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better, LEGL 2030, and ITEC 1001</i></p> | T |
| <p>LEGL 1200 Administrative Law 3 Credits, 3 Class Hours This course introduces the student to the theory and practice of administrative law through a study of the sources of administrative law, the study of administrative procedures, and the study of the relationship between judicial review and the administrative process. Course material includes the study of the Social Security Administration, Immigration and Naturalization Services, and Tennessee Workers' Compensation laws. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>LEGL 2040 Legal Writing 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. Emphasis on legal writing skills includes precision, clarity and accuracy, legal citation and proper format. Students draft a variety of documents including office and trial memoranda, letters, trial court briefs, contracts and operative documents. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better, ITEC 1001 and ENGL 1020</i></p> | T |
| <p>LEGL 1400 Juvenile Law 3 Credits, 3 Class Hours This course focuses on the history and development of juvenile law, the impact of the law on minors as victims as well as law-breakers, and the contemporary juvenile justice system and its three major components of law enforcement, the juvenile court system, and corrections. <i>Prerequisite: LEGL 1040 with a "C" or better</i></p> | N | <p>LEGL 2045 Legal Internship 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program and should be taken during the student's last semester. The student works in a supervised legal environment in a law firm, agency or corporate legal department as a paralegal intern for a total of 60 hours during the semester. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better, LEGL 1055, LEGL 2030 and LEGL 2040; an average of 3.0 or better in all LEGL designated courses</i></p> | N |
| <p>LEGL 1450 Alternative Dispute Resolution 3 Credits, 3 Class Hours This course provides an overview of dispute resolution mechanisms used in the American legal system such as negotiation, mediation and arbitration. Students explore the various statutes, regulations and ethical standards applicable to alternative dispute resolution and learn the basic skills needed to work with parties in conflict. <i>Prerequisite: LEGL 1040 with a "C" or better</i></p> | N | <p>LEGL 2050 Probate Law 3 Credits, 3 Class Hours This course covers the effect of various types of ownership upon passage of property at owner's death, with or without a will; basic requirements for trusts and wills; administration of a decedent's estate; and local Probate Court rules. Students prepare a variety of documents including a last will and testament, and petitions to open and close an estate. This course is an option for students in the real estate concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N |
| <p>LEGL 2010 Employment Law 3 Credits, 3 Class Hours This course covers the history of labor and employer/employee relationships, unemployment compensation, employment discrimination, arbitration, and grievance procedures. This course is an option for students in the corporate and banking concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | T | <p>LEGL 2055 Health Care Law 3 Credits, 3 Class Hours This course addresses the topic of health care law with an emphasis on the corporate, regulatory, and financial structure of health care delivery as well as the emerging law of bioethics and other legal aspects of the changing medical/technological field. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N |
| <p>LEGL 2020 Corporate Law 3 Credits, 3 Class Hours This course includes the study of corporations and other forms of businesses. Students prepare documents such as a partnership agreement, corporate charter, bylaws, minutes of directors and shareholders meetings, dissolutions, and charter amendments. This course is required for students in the corporate and banking concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | T | <p>LEGL 2060 Evidence 3 Credits, 3 Class Hours This course provides an overview of the rules of evidence. Course material includes the general rules governing admissibility of evidence, the use of documentary and opinion evidence, evidential privileges, circumstantial evidence, confessions, admissions, witnesses, and the "hearsay rule" and its exceptions. This course is an option for students in the litigation concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N |
| <p>LEGL 2025 Contract Law 3 Credits, 3 Class Hours This course provides an overview of the substantive area of contract law and includes the study of the elements of a contract; the legal effect of offer, acceptance, and consideration; and the enforcement and regulation of contracts. Students are introduced to the Uniform Commercial Code, and draft and analyze different types of contracts. This course is an option for students in the real estate concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>LEGL 2065 Intellectual Property Law 3 Credits, 3 Class Hours This course is designed to acquaint the student with various aspects of intellectual property law. Students explore the various statutes and regulations related to traditional aspects of trademark, trade secrets, copyright, and patent law and review various documents and forms commonly used in these areas. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | T |
| <p>LEGL 2030 Courts and Procedures I 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. The jurisdiction and structure of the courts in the federal, state and local systems are explored. Students also study federal, state and local rules of procedure. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | | |

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
T – Denotes courses designed for transfer to four-year institutions
N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | |
|--|---|--|
| <p>LEGL 2070 Bankruptcy and Creditor Rights 3 Credits, 3 Class Hours This course covers the study of bankruptcy procedures and includes the initial filing, meetings of creditors, adversarial proceedings and final discharge hearings, automatic stay, adequate protection, and proceedings under Chapters 7, 11 and 13. Students also study the debtor's obligations and rights, secured and unsecured creditors' priorities, preferences and fraudulent transfers, and the bankruptcy court rules. Students identify assets and liabilities and prepare various bankruptcy forms. This course is an option for students in the corporate and banking concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>tual obligations, intellectual property, privacy, and liability. <i>Prerequisites: DSPR 0800, DSPW 0800, LEGL 1040 or FINR 2300 Business Law</i></p> |
| <p>LEGL 2075 Environmental Law 3 Credits, 3 Class Hours This course addresses the topic of environmental law by focusing on an analysis of various environmental statutes as well as on the procedural issues common to the environmental field, including standing to sue and the standard of judicial review. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>LEGL 1931 Cooperative Education Work Experience I 3 Credits, 225 Lab Hours This course provides the student with supervised work experience in a legal environment. Placement is made by the Office of Cooperative Education after all requirements for employment are met. The Paralegal Studies cooperative education coordinator acts as supervisor. The student utilizes knowledge gained in any or all of the concentrations to accomplish assigned tasks in a legal office setting. <i>Prerequisite: Completion of two semesters of technical course work or permission of the chairperson</i></p> |
| <p>LEGL 2080 Criminal Law and Procedure 3 Credits, 3 Class Hours This course covers the substantive aspects of criminal law and includes the general principles of criminal liability, specific analysis of particular crimes, and the substantive defenses to crimes. Constitutional safeguards and procedures from arrest through trial, sentencing, punishments, and appeals are also studied. This course is an option for students in the litigation concentration. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>LEGL 1932 Cooperative Education Work Experience II 3 Credits, 225 Lab Hours This course consists of supervised employment in the student's chosen field. The cooperative education experience may substitute for a course in the student's major with the approval of the chairperson. A significant amount of experience must relate to the course content for which the cooperative education is substituted. <i>Prerequisite: LEGL 1931</i></p> |
| <p>LEGL 2085 Immigration Law 3 Credits, 3 Class Hours This course addresses the area of immigration law and procedure in the United States. Materials focus on statutory and regulatory aspects of the immigration process and assess the impact criminal statutes have on this process. In addition, students examine court opinions applicable to immigration law. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better</i></p> | N | <p>LEGL 1933 Cooperative Education Work Experience III 3 Credits, 225 Lab Hours This course consists of supervised employment in the student's chosen field. The cooperative education experience may substitute for a course in the student's major with the approval of the chairperson. A significant amount of experience must relate to the course content for which the cooperative education is substituted. <i>Prerequisite: LEGL 1932</i></p> |
| <p>LEGL 2090 Interviewing and Investigation 3 Credits, 3 Class Hours This course provides practical exposure to the skills needed to gather information through interviews with clients, witnesses, and other persons. Students study how to take statements, search records and documents, and preserve facts and evidence gathered for trial. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better, and LEGL 1055</i></p> | N | <p>Pharmacy</p> <p>PHRM 1010 Introduction to Pharmacy Operations 3 Credits, 3 Class Hours This course includes a definition of the pharmacy technician role and responsibilities; opportunities available to graduates of the Pharmacy Technician Program; and a generalized overview of the practice of pharmacy. The student is oriented to the institutional setting, including equipment and laws pertaining to the practice of pharmacy. <i>Prerequisite: Permission from instructor. Co-requisite: PHRM 1020, 1030, 1040, 1050</i></p> |
| <p>LEGL 2100 Computer Research and Legal Software 3 Credits, 3 Class Hours This course is required for all students in the Paralegal Studies program. Students are exposed to computer-assisted legal research and to various types of computer software commonly used in law offices through lecture, instructional software or hands-on exercises. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better, and ITEC 1001</i></p> | T | <p>PHRM 1030 Measurement and Calculations 3 Credits, 3 Class Hours This course reviews basic math computation including Roman Numerals, addition, subtraction, multiplication, division of whole numbers, and fractions. This course covers all health, measurements in the area of avoirdupois, apothecary, and metric systems as related to pharmaceutical calculations. <i>Prerequisite: Permission from instructor. Co-requisites: PHRM 1010, 1020, 1040, 1050</i></p> |
| <p>LEGL 2500 Advanced Computer Research 3 Credits, 3 Class Hours This course expands on the concepts covered in LEGL 2100 and focuses on the utilization of computerized research to perform tasks specific to the law office environment. Advanced instruction in computer-assisted legal research includes using the Internet and CD-ROM databases as well as Lexis and Westlaw to obtain information. <i>Prerequisites: LEGL 1040 and LEGL 1045 with a "C" or better, LEGL 2100 and ITEC 1001</i></p> | N | <p>PHRM 1040 Structure and Function of Body Systems 3 Credits, 3 Class Hours This course focuses on the structure and function of the nine body systems. Each system is discussed in detail with a focus on medications applicable to that system. Emphasis is placed throughout the course on presenting the human body as a living, functioning, hemostatic organism. <i>Prerequisite: Permission from instructor. Co-requisites: PHRM 1010, 1020, 1030, 1050</i></p> |
| <p>LEGL 2550 Internet Law 3 Credits, 3 Class Hours This course is designed to acquaint the student with various legal aspects of Internet commerce, also called electronic commerce. Students explore the various statutes, regulations, constitutional and common law affecting Internet commerce, with emphasis on contrac-</p> | N | <p>PHRM 1050 Personal-Vocational Relationships 3 Credits, 3 Class Hours This course is a study of human relations, including oral and written communication. <i>Prerequisite: Permission from instructor. Co-requisites: PHRM 1010, 1020, 1030, 1040</i></p> |

PHRM 1060 Sterile Products
3 Credits, 3 Class Hours

This course introduces the operation of an intravenous admixture program. Specific study topics include medications and parenteral administration; facilities; equipment; supplies utilized in admixture preparation, techniques utilized in parental product compounding; terminology and calculations used in preparation of parenteral products; parenteral medication incompatibilities; and quality assurance in the preparation of parenteral products. *Prerequisite: Permission from instructor*

PHRM 1070 Pharmacology
3 Credits, 3 Class Hours

This course is a practical study of the various aspects of drug activity. Emphasis is placed on drug classification, dosages, routes of administration, generic and trade names of drugs, and appropriate use of references. *Prerequisite: Permission from instructor. Co-requisites: PHRM 1060, 1080, 1090, 1100*

PHRM 1080 Computer Sciences
3 Credits, 3 Class Hours

This course is an introduction to fundamental computer operations, which includes general computer terminology and the alphabetic and numeric keyboard using the touch method of operation. *Prerequisite: Permission from instructor*
Co-requisites: PHRM 1060, 1070, 1090, 1100

PHRM 1090 Pharmacy Practice
3 Credits, 3 Class Hours

This course acquaints the student with prescription and medication order policies and procedures in all pharmacy settings. Students interpret, label, compound and dispense prescriptions. Students will utilize profile systems and describe inventory control procedures. Students will utilize profile systems and describe inventory control procedures. Students will become familiar with unit dose drug distribution, floor stock distribution, narcotic control, and inventory control. Drug information references and compounding, with an emphasis on the prescription balance and weight are also reviewed. *Prerequisite: Permission from instructor*

PHRM 1100 Third Party Reimbursements
3 Credits, 3 Class Hours

This course introduces the use of insurance, TennCare, Medicare and other third party providers. The student will be able to identify and complete common insurance forms. In addition, the student will be able to explain the use of insurance codes in processing insurance forms. *Prerequisite: Permission from instructor. Co-requisites: PHRM 1060, 1070, 1080, 1090*

PHRM 1110 Clinical Pharmacy Experience I
3 Credits, 3 Class Hours

This course is a clinical practicum in a hospital pharmacy setting. *Prerequisites: Completion of PHRM 1010, 1030, 1040, 1050, 1060, 1070, 1080, 1090, 1110*

PHRM 1120 Clinical Pharmacy Experience II
3 Credits, 3 Class Hours

This course is a clinical practicum in retail pharmacy setting. *Prerequisites: Completion of PHRM 1010 through 1100*

Philosophy

◆PHIL 1030 Introduction to Philosophy
3 Credits, 3 Class Hours

This course is an introduction to basic philosophical problems in exploring the meaning of human life and reflecting our position in the world. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

PHIL 2010 Introduction to Logic
3 Credits, 3 Class Hours

This course is a study of deductive logical methods and their use in scientific inquiry, common-sense reasoning and formal systems. Topics include a study of informal fallacies and the logic and semantic tools required for analysis of fallacious arguments and misleading claims

N and a study of elementary symbolic logic. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

◆PHIL 2030 Values in the Modern World
3 Credits, 3 Class Hours

T
The course examines the different ways religion, political theory, science, and ethics define values and their relevance to responsible moral choices in today's society. This course may be used as a Humanities or general elective. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

N Physical Education

◆HPER 1530 Concepts of Fitness and Wellness
2 Credits, 2 Class Hours

T
This course promotes individual responsibility for optimal well being, encompassing local and national health concerns, personal health risk factors, life-style behaviors, and preventive health measures.

N HPER 2480 Fundamentals and Techniques of Baseball and Softball
2 Credits, 2 Class Hours

N
This course explores the complexities of baseball. Emphasis is on discussions of fundamentals, teaching situations, history, and styles of plays.

N ◆PHED 1110 Basketball
2 Credits, 1 Class Hour, 2 Lab Hours

N
Instruction in basic basketball fundamentals is presented.

N ◆PHED 1130 Bowling
2 Credits, 1 Class Hour, 2 Lab Hours

T
This course provides instruction in the basics of bowling, including equipment rules, scoring, stance, delivery and release.

N ◆PHED 1300 Golf
2 Credits, 1 Class Hour, 2 Lab Hours

T
This course provides introduction to the game of golf, including the basics of the grip, stance and swing, equipment, history, rules, etiquette, scoring, and playing on the course.

N ◆PHED 1380 Racquetball
2 Credits, 1 Class Hour, 2 Lab Hours

T
The fundamentals of racquetball, including equipment, skills, strategy, competition, and techniques are taught.

N ◆PHED 1510 Physical Conditioning
2 Credits, 1 Class Hour, 2 Lab Hours

T
This course is designed to improve individual's flexibility, strength, and cardiovascular endurance.

N ◆PHED 1550 Aerobics
2 Credits, 1 Class Hour, 2 Lab Hours

T
A workout class focused on a variety of cardio-respiratory endurance exercise, walking, aerobic dance, kickboxing, and bench aerobics-with resistance and flexibility exercises. It includes concepts of exercise, health and fitness as they relate to cardiovascular health.

N ◆PHED 1560 Bench Step Aerobics
2 Credits, 1 Class Hour, 2 Lab Hours

T
This course provides instruction in bench-step activity to enhance cardiovascular fitness and develop muscle strength, endurance, and flexibility. Other topics include fitness concepts, exercise facts, diet, weight control, and consumer education.

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
T – Denotes courses designed for transfer to four-year institutions
N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

| | | | |
|---|---|---|---|
| <p>◆PHED 1570 Body Sculpting: Shape, Tone and Tighten 2 Credits, 1 Class Hour, 2 Lab Hours This course contains instruction in body sculpting through calisthenic exercises and includes health related fitness concepts, exercise principles, diet, nutrition, weight control, contra-indicated exercises, and consumer education.</p> | T | <p>PTA 2420 PTA Clinical Arts I 1 Credits, 3 Lab Hours This course includes patient care skills fundamental to the practice of physical therapy including patient positioning and turning, transfer training, wheelchair management, gait training, aseptic techniques, assessment of vital signs, and introduction to special equipment. <i>Prerequisite: Acceptance into the PTA program</i></p> | N |
| <p>◆PHED 1680 Self-defense/Karate 2 Credits, 1 Class Hour, 2 Lab Hours The student develops skills through practice of the basic kicks, blocks, and punches in Karate. Various strategies for individual self-defense are introduced.</p> | T | <p>PTA 2430 PTA Seminar I 1 Credit, 1.5 Class Hours/week for entire term, 4 Clinic Hours/week last 4 weeks of term. This course is an introduction to the profession of physical therapy and responsibilities of the physical therapist assistant, and includes study of the history of physical therapy and role of the physical therapist assistant in the health care system. Unit on medical terminology; practice in reviewing medical records, documentation and charting; sessions on improving interpersonal communication skills in clinical practice; and clinical experience consisting of one-half day per week for the final four weeks of the term are also included. <i>Prerequisite: Acceptance into the PTA program</i></p> | N |
| <p>◆PHED 1880 Tennis 2Credits, 1 Class Hour, 2 Lab Hours This is a lifetime recreational course to enable students to acquire a reasonable level of proficiency in the fundamental skills of Tennis and develop an understanding of the game.</p> | T | <p>PTA 2440 PTA Clinical Education I 1 Credit, 40 Clinic Hours/week for two weeks at end of Summer Term This course is a supervised clinical experience during which students practice skills and apply knowledge learned in classroom to patient care activities. Students affiliate for two weeks in area physical therapy clinics at end of Summer Term. <i>Prerequisite: Admission to the PTA program and successful completion of all Summer Term courses preceding this course</i></p> | N |
| <p>◆PHED 1940 Volleyball 2 Credits, 1 Class Hour, 2 Lab Hours Instruction in basic skills, history, rules, strategy, and team play of volleyball are presented in this course.</p> | T | <p>PTA 2450 Kinesiology for the PTA 3 Credits, 3 Class Hours, 3 Lab Hours This course reviews kinematics, kinetics, muscle and nerve physiology, and surface anatomy. An emphasis is placed on actions, origins, insertions, and innervations of skeletal muscle. <i>Prerequisite: Acceptance into the PTA program</i></p> | N |
| <p>◆PHED 1960 Weightlifting 2 Credits, 1 Class Hour, 2 Lab Hours The student receives introduction to the various lifting methods involved in the development of muscular tone and conditioning. In all lifting methods, safety is stressed.</p> | T | <p>PTA 2510 PTA Clinical Procedures II 2 Credits, 1 Class Hours, 3 Lab Hours This course includes basic theory and application of clinical electrotherapy used in the practice of physical therapy. <i>Prerequisite: Successful completion of Summer Term PTA courses</i></p> | N |
| <p>PHED 1990 Special Topics in Health and Physical Education 1-3 Credits This course is a study of special topics and development of specific skills as related to each topic.</p> | N | <p>PTA 2520 PTA Clinical Arts II 4 Credits, 3 Class Hours, 3 Lab Hours This course presents an overview of basic orthopedic and medical conditions that may require therapeutic exercise. <i>Prerequisite: Successful completion of Summer Term PTA courses</i></p> | N |
| <p>◆PHED 1980 Exercise Machines: Weights and Aerobics 2 Credits, 1 Class Hour, 2 Lab Hours This is an exercise class designed to enhance the health related aspects of fitness through the utilization of machine/free weight resistance equipment and cardiovascular endurance machines including a treadmill, stepper and exercise bikes.</p> | T | <p>PTA 2530 PTA Seminar II 2 Credits, 2 Class Hours Basic teaching/learning principles are applied to patient education activities and include discussion of student's role in clinical education, e.g., assuming responsibility for learning, evaluating learning experiences, and appropriate clinical behavior. <i>Prerequisite: Successful completion of Summer Term PTA course.</i></p> | N |

Physical Sciences

| | |
|--|---|
| <p>◆PSCI 1010 Physical Science I 4 Credits, 3 Lecture Hours, 3 Lab Hours This course is the first of a two-semester lab course for non-science majors. Topics include measurement, motion, force, energy, heat, sound, optics, electric and magnetism, atomic physics and nuclear physics.</p> | T |
| <p>◆PSCI 1020 Physical Science II 4 Credits, 3 Lecture Hours, 3 Lab Hours This course is a continuation of Physical Science I. Topics include chemical bonding, chemical reactions, astronomy, environmental science, geology and meteorology.</p> | T |

Physical Therapy Assistant

| | |
|---|---|
| <p>PTA 2410 PTA Clinical Procedures I 3 Credits, 3 Class Hours, 3 Lab Hours This course explores the basic theory and application of clinical procedures and physical agents used in the practice of physical therapy. Thermal agents are the primary topic, but the course also includes instruction in positioning and draping, massage, cold LASER, intermittent pneumatic compression, and elastic (ACE) wraps. <i>Prerequisite: Acceptance into the PTA program</i></p> | N |
| <p>PTA 2540 PTA Clinical Education II 1 Credit , 40 Clinic Hours/week for the final two weeks of Fall Semester This course includes supervised clinical experiences during which students practice skills and apply knowledge learned in the classroom to patient care activities. Students are assigned to area physical therapy clinics for two weeks, full-time. <i>Prerequisite: successful completion of all Fall semester courses preceding this course</i></p> | N |
| <p>PTA 2550 Pathophysiology for the PTA 2 Credits, 2 Class Hours Introduces diseases and disorders commonly encountered in patients referred to physical therapy. Etiology, signs and symptoms, general treatment considerations, and prognosis of each disease/disorder are discussed. <i>Prerequisite: successful completion of Summer Term PTA courses</i></p> | N |

| | | | |
|---|---|--|---|
| <p>PTA 2560 Assessment Techniques for the PTA 3 Credits, 2 Class Hours, 2.5 Lab Hours This course includes common assessment techniques used by the PTA in clinical practice and includes assessment of patient orientation, sensation, edema, joint motion (goniometry), muscle strength (manual muscle testing), posture and gait. <i>Prerequisite: Successful completion of Summer term courses</i></p> | N | <p>PHYS 1120 Applied Physics II 4 Credits, 3 Lecture Hours, 2 Lab Hours A continuation of Applied Physics I. This course covers DC & AC electricity, atomic and nuclear physics, and modern physics. Algebra and Trig-based math are used. Laboratory experiments are included. <i>Prerequisite: PHYS 1110 or equivalent.</i></p> | N |
| <p>PTA 2610 PTA Clinical Procedures III 3 Credits, 6 Class Hours, 2 Lab Hours/week for first 5 weeks of semester This course includes physical therapy management of patients will cardiac, pulmonary, vascular and lymphatic disorders and instruction in wound management, prosthetics and orthotics. <i>Prerequisite: Successful completion of Fall Semester PTA courses</i></p> | N | <p>PHYS 1210 Physics for the Health Sciences 4 Credits, 3 Class Hours 3 Lab Hours This course introduces physics applications in allied health technology. Topics include measurement techniques, force and motion, energy, heat, fluids, sound, electricity and magnetism, optics, atomic physics, and radioactivity. <i>Prerequisite: MATH 0810 Intermediate Algebra or permission of instructor.</i></p> | N |
| <p>PTA 2620 PTA Clinical Arts III 4 Credits, 7 Class Hours, 5 Lab Hours/week for first 5 weeks of semester This course covers normal development from conception to birth, normal reflex development and developmental milestones after birth. General concepts of aging included as basis for understanding problems encountered by patients with neuromotor and neuromuscular disorders. Physical therapy management of patients with cerebrovascular accidents, head trauma, cerebral palsy, and spinal cord injuries included. Primary neurophysiological approaches (NDT, PNF, Brunnstrom, and Rood) are covered, as well as a variety of other treatment techniques ND therapeutic exercises. <i>Prerequisite: Successful completion of Fall Semester PTA courses</i></p> | N | <p>◆PHYS 2010 General Physics I 4 Credits, 3 Class Hours, 3 Lab Hours This is the first of a two-semester lab course for science majors, pre-professional students and pre-engineering students. Topics include vectors with application to statics, kinematics and dynamics, Newton's laws and their applications to motion and equilibrium, concepts and applications of energy and momentum conservation principles, fluid dynamics, harmonic motion, wave motion, and thermodynamics. <i>Prerequisite or corequisite: MATH 1130 College Algebra or MATH 1720 Trigonometry or MATH 1830 Elementary Calculus or permission of instructor</i></p> | T |
| <p>PTA 2630 PTA Seminar III 1 Credit, 4 Class Hours per week for first 5 weeks of semester This course includes unit on medical ethics, introduction to clinical research in physical therapy, and sessions on physical therapy administration and management. <i>Prerequisite: Successful complete of Fall Semester PTA classes</i></p> | N | <p>◆PHYS 2020 General Physics II 4 Credits, 3 Class Hours, 3 Lab Hours This course is a continuation of General Physics I. Topics include principles/applications of electricity and magnetism, geometrical and physical optics, radioactivity and modern physics. <i>Prerequisite: PHYS 2010 General Physics I or permission of instructor</i></p> | T |
| <p>PTA 2640 PTA Clinical Education III 4 Credits, 40 Clinic Hours/week for eight weeks at end of Spring semester This course includes supervised clinical experiences during which student practices skills and applies knowledge learned in the classroom to patient care activities. Students are assigned to area physical therapy clinics for two four-week, full-time affiliations. <i>Prerequisite: Successful completion of Spring semester PTA courses preceding this course</i></p> | N | <p>◆PHYS 2110 Physics for Science and Engineering I 4 Credits, 3 Class Hours, 3 Lab Hours First of a two-semester lab course for science majors and pre-engineering students. Topics include vectors, kinematics, dynamics of motion, work and energy, collision, oscillations, gravitation, and the kinetic theory of gases. <i>Prerequisite: MATH 2110 Analytic Geometry and Calculus or permission of instructor</i></p> | T |
| | | <p>◆PHYS 2120 Physics for Science and Engineering II 4 Credits, 3 Class Hours, 3 Lab Hours Continuation of Physics for Science and Engineering I. Topics include thermodynamics, electrostatics, simple circuits, electromagnetic waves, Maxwell equations, geometrical and physical optics, and light and quantum physics. <i>Prerequisite: PHYS 2110 Physics for Science Engineering I or permission of instructor</i></p> | T |

Physics

| | | | |
|--|---|---|---|
| <p>PHYS 1001 Technical Physics 3 Credits, 2 Class Hours, 2 Laboratory Hours This course is for students in career programs such as Industrial Maintenance Technology, Automotive Service Technology, and Electronic Technology. The course includes a study of measurement, forces, energy and power, heat, gas laws, hydraulics, and simple D.C. circuits. Lab experiences are included. <i>Prerequisite: DSPM 0850 Intermediate Algebra or equivalent</i></p> | N | <p>PHYS 2250 Atomic and Nuclear Physics 4 Credits, 3 Class Hours, 3 Lab Hours This course is a study of the major topics of modern physics, with lab experiments. <i>Prerequisites: PHYS 1120 and MATH 1910</i></p> | N |
| <p>◆PHYS 1010 Introduction to Physics 4 Credits, 3 Lecture Hours, 3 Lab Hours An introductory study of physics involving a minimum of mathematics for non-science majors. Topics include motion, properties of matter, heat, sound, electromagnetism, light and modern physics.</p> | T | | |
| <p>PHYS 1110 Applied Physics I 4 Credits, 3 Lecture Hours, 2 Lab Hours The first of a two-semester laboratory science course primarily for AAS degree students. This course covers the equations of motion, laws of motion, rotational motion, vectors, energy, momentum, heat, gas laws, and thermodynamics. Algebra-based mathematics is used. Laboratory experiments are included. <i>Prerequisite: DSPM 0850 Intermediate Algebra or equivalent. Corequisite: MATH 1740 Algebra and TRIG I or equivalent</i></p> | N | | |

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

Political Science

POLI 2010 American National Government

3 Credits, 3 Class Hours

The course presents the development, structure and process of the American system of government.

Prerequisites: DSPW 0800, DSPR 0800 or equivalent

POLI 1040 Internship

3-6 Credits, 3-6 Class Hours

This internship offers the opportunity to gain hands-on experience or to upgrade skills for students either aspiring to careers or seeking professional advancement in public administration, public affairs, law or other interdisciplinary fields. Approximately 45 work experience hours per semester equals 1 hour of credit. Students may enroll for a second time. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

POLI 1070 American National Government: The Institutional Process

3 Credits, 3 Class Hours

Politics and institutions will be compared to the Grand Political Game, Institutional Functionalism, and how power is distributed and authority is conferred by groups and the politically powerful entities.

Prerequisites: DSPW 0800, DSPR 0800, or equivalent

POLI 2030 International Relations

3 Credits, 3 Class Hours

Students survey the concepts, processes, and relationships involved in the interactions of nations. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

POLI 2040 The Diversity of Socio-Politics

3 Credits, 3 Class Hours

This course is designed to identify and investigate contemporary social, legal, economic and political elements that are relevant to quality of life and are considered to be educationally controversial in nature. This course will serve as an introduction and orientation to policy study, critical thinking, and problem solving techniques for students.

Prerequisites: DSPW 0800, DSPR 0800 or equivalent

POLI 2050 Politics of Feminist Theory

3 Credits, 3 Class Hours

This course is an examination of contemporary feminist analyses of gender relations, how they are constituted and experienced and how social structures maintaining sexist hierarchies intersect with hierarchies of race, class and ethnicity. Connections between practice and theory will be investigated. *Prerequisites: DSPW 0800, DSPR 0800, or equivalent*

POLI 2120 Black Politics

3 Credits, 3 Class Hours

Examines the past, present and future roles of African Americans in the American political system. The key focus will encompass the economic, social and political position of blacks as related to the larger population, which includes the study of hyperpluralism. *Prerequisites: DSPW 0800, DSPR 0800, or equivalent*

Psychology

PSYC 1010 General Psychology I

3 Credits, 3 Class Hours

The course introduces students to social aspects of psychology as a behavioral science. Studies include personality, abnormal behavior, psychotherapy, intelligence, social, developmental, psychology, and applied psychology. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

PSYC 1020 General Psychology II

3 Credits, 3 Class Hours

This course introduces students to the biological aspects of psychology as a behavioral science. Studies include learning, sensation and perception, physiological and comparative psychology, and psychopharmacology. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

PSYC 1040 Human Growth and Development

3 Credits, 3 Class Hours

Principles and processes of human growth and development from conception to death are explored. Students examine physical, mental, and social development from a life-span perspective. *DSPW 0800, DSPR 0800 or equivalent*

PSYC 2030 Human Relations at Work

3 Credits, 3 Class Hours

Development of principles and techniques affecting human behavior and motives in situations where people work together is the primary focus in this course. Emphasis is placed on business, industrial, hospital and other institutional settings. The course includes leadership development, organizational hierarchy, communication, group processes, team spirit, and mutual helpfulness. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

PSYC 2010 Child Development and Services

3 Credits, 3 Class Hours

Students study the psychological and physiological growth and development of children beginning with conception and continuing to adolescence. Special attention is given to social and health services that enhance this developmental process. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

PSYC 2020 Abnormal Psychology

3 Credits, 3 Class Hours

Basic concepts of psychopathology with emphasis on the development of behavior deviations, descriptions of various neurotic and psychotic reactions, and an introduction to methods of psychotherapy will be studied. *Prerequisite DSPW 0800, DSPR 0800 or equivalent*

Radiologic Technology

RADT 1010 Introduction to Radiologic Technology

3 Credits, 3 Class Hours

This course is an introduction to the basic aspects and principles of radiologic technology and the health care system including radiation protection, patient care and safety, agency structure and function, and radiology ethics. Open to all students.

RADT 1020 Fundamentals of Radiologic Technology I

3 Credits, 3 Class Hours

This course provides basic material necessary to an understanding of the necessity of radiation protection, of the basic photographic supplies, equipment and principles of radiographic production, of the prime factors used in radiographic production, and of the various types of equipment used in the field of radiography. *Prerequisite: RADT 1010. Co-requisite: RADT 1710*

RADT 1030 Fundamentals of Radiologic Technology II

3 Credits, 3 Class Hours

This course provides instruction in accessory equipment used to obtain the optimum image. Emphasis is on practical aspects of equipment capabilities, film/screen combinations, grids, beam restricting devices, and patient condition. *Prerequisite: RADT 1020. Co-requisite: RADT 1320, RADT 1520, RADT 1220, RADT 1920*

RADT 1210 Radiologic Physics I

3 Credits, 3 Class Hours

This course presents a study of radiation physics and radioisotopes including the theoretical basis for understanding the nature, production and interaction of radiation with matter, atomic and electrical physics as it pertains to radiation production and control. *Prerequisites: RADT 1020 and RADT 1710. Co-requisites: RADT 1510, RADT 1310, and RADT 1910.*

| | | | |
|---|---|--|---|
| <p>RADT 1220 Radiologic Physics II 3 Credits, 3 Class Hours This course presents a study of the physics of radiation production control and characteristics of basic imaging modalities including computer imaging and computer assisted image resolution and provides background for the understanding of radioactivity and its application in nuclear medicine and radiation therapy. <i>Prerequisite:</i> RADT 1210. <i>Co-requisites:</i> RADT 1320, RADT 1520, and RADT 1920, RADT 2010</p> | N | <p>RADT 1920 Radiologic Clinic II 2 Credits, 2 Class Hours This course provides a continuation of practicum in routine diagnostic radiography. <i>Prerequisite:</i> RADT 1910. <i>Co-requisites:</i> RADT 1220, RADT 1320, and RADT 1520, and RADT 2010</p> | N |
| <p>RADT 1230 Essentials of Radiobiology 2 Credits, 2 Class Hours This course is a survey of natural and artificial radiation sources and their effects on cell tissue and organisms including basic criteria and methods of survey, patient and occupational dose analysis and control effects on environmental quality. It covers familiarity with control agencies and appropriate regulations, legal aspects of control, accidents and radiation incidents, and facility/area design.</p> | N | <p>RADT 1930 Radiologic Clinic III 4 Credits, 4 Class Hours Concentrated clinical practice in routine diagnostic radiography involving 35 hrs of clinic work per week (Summer I session). <i>Prerequisite:</i> RADT 1920</p> | N |
| <p>RADT 1310 Radiographic Anatomy and Physiology I 2 Credits, 2 Class Hours This course presents a study of gross structure of the human body with radiographic anatomy including radiographs and demonstrations. <i>Prerequisites:</i> RADT 1710, RADT 1020. <i>Co-requisites:</i> RADT 1510, RADT 1210, and RADT 1910.</p> | N | <p>RADT 2020 Fundamentals of Radiologic Technology III 3 Credits, 3 Class Hours This course is a continuation of RADT 2010 with emphasis on radiographic image analysis including exposure factors, radiation dose, demonstrated anatomy and pathology, selection, and testing of film/ screen combination with consideration for radiographic detail, contrast, density distortion. <i>Prerequisite:</i> RADT 2010. <i>Co-requisites:</i> RADT 1530, RADT 1230, and RADT 2920</p> | N |
| <p>RADT 1320 Radiographic Anatomy and Physiology II 2 Credits, 2 Class Hours This course is a continuation of RADT 1310 covering the cardiovascular system, the gastrointestinal system, nervous system, and genitourinary system. <i>Prerequisite:</i> RADT 1310. <i>Co-requisites:</i> RADT 1520, RADT 1220, RADT 1920, and RADT 2010</p> | N | <p>RADT 2030 Fundamentals of Radiologic Technology IV 3 Credits, 3 Class Hours This course is a continuation of RADT 2020 with a study of patient care from the aspects of economics and quality. It also presents an introduction to quality assurance including personnel staffing, work flow studies, patient education, in-service education, continuing education, and facility and equipment usage and emphasizes learning as a continuous process with self examination and proficiency testing. <i>Prerequisite:</i> RADT 2020. <i>Co-requisites:</i> RADT 2110 and RADT 2930</p> | N |
| <p>RADT 1510 Radiographic Procedures I 3 Credits, 3 Class Hours This course provides an investigation of the procedures used in patient positioning and radiation safety instruction for radiographic demonstration of anatomical parts of the chest, abdominal upper extremity, pelvic girdle, lower extremity, and shoulder girdle; and includes topographical anatomy, patient and part positioning, equipment selection and use, and patient-film orientation of radiographic anatomy. <i>Prerequisites:</i> RADT 1710 and RADT 1020. <i>Co-requisites:</i> RADT 1310, RADT 1210, RADT 1910</p> | N | <p>RADT 2040 Fundamentals of Radiologic Technology V 3 Credits, 3 Class Hours This course is a continuation of RADT 2030 with an emphasis on application of theory and practice correlation in patient care and imaging. <i>Prerequisite:</i> RADT 2030 <i>Fundamentals of Radiologic Technology IV</i></p> | N |
| <p>RADT 1520 Radiographic Procedures II 3 Credits, 3 Class Hours This course presents an investigation of procedures used in patient positioning and radiation safety instruction for radiographic demonstration of anatomic parts of the axial skeleton, bony thorax, gastrointestinal system and urinary system. <i>Prerequisites:</i> RADT 1220, RADT 1920, and RADT 2010</p> | N | <p>RADT 2110 Introduction to Pathology 2 Credits, 2 Class Hours This course provides a study of inflammatory disorders, disorders of vascular origin, degenerative changes, and pathology of infectious diseases. Attention is given to organic systematic disease, pathologic anatomy, disturbed physiology, correlated with clinical signs and symptoms and radiographic exposure techniques in pathologic conditions. Emphasis is on the principles of radiographic management for diagnosis, with an introduction to the several systems. <i>Prerequisite:</i> RADT 1530. <i>Co-requisites:</i> RADT 2030, RADT 2930</p> | N |
| <p>RADT 1530 Radiographic Procedures III 3 Credits, 3 Class Hours This course presents an investigation of procedures used in patient positioning and radiation safety for imaging procedures with special imaging equipment, CT, MRI, mammography exroradiography, including topographic anatomy, patient, and part positioning with related structure systems, equipment selection and usage. <i>Prerequisite:</i> RADT 1520. <i>Co-requisite:</i> RADT 1230, RADT 2020, and RADT 1920</p> | N | <p>RADT 2910 Radiologic Clinic IV 4 Credits, 4 Class Hours This course is a continuation of RADT 1930. As the first course or the second year of study, the student assumes a more responsible role of the radiologic technologist. 35 hrs of clinic work per week (Summer II session). <i>Prerequisite:</i> RADT 1930</p> | N |
| <p>RADT 1710 Clinical Radiologic Laboratory 2 Credits, 1 Class Hour, 3 Lab Hours This course gives an overview of radiography and its role in health care delivery. Student responsibilities will be outlined as a part of orientation to the academic and clinical structure of the program. The student will also be introduced to ethics, legal responsibilities, and to the process of patient care. <i>Prerequisite:</i> RADT 1010. <i>Co-requisite:</i> RADT 1020</p> | N | <p>RADT 2920 Radiologic Clinic V 3 Credits, 3 Class Hours This course is a continuation of RADT 2910, including increased proficiency in routine diagnostic radiologic procedures. New competencies required include the cranium, and new specialized diagnostic procedures. Additional work under indirect supervision in general radiography is required. <i>Prerequisite:</i> RADT 2910, <i>Co-requisites:</i> RADT 1530, RADT 1230, and RADT 2020</p> | N |
| <p>RADT 1910 Radiologic Clinic I 2 Credits, 2 Class Hours This course is a practicum in routine diagnostic radiography in the art of radiographic positioning technique and development of professional responsibility and ethical practice and moral patient care. <i>Prerequisites:</i> RADT 1710 and RADT 1020. <i>Co-requisites:</i> RADT 1310, RADT 1510, and RADT 1210</p> | N | | |

◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
 T – Denotes courses designed for transfer to four-year institutions
 N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

RADT 2930 Radiologic Clinic VI N
3 Credits, 3 Class Hours
 This course requires an observation of and participation in all aspects of diagnostic radiology, including advanced imaging modalities of MRI, CT, sonography, radiation oncology, nuclear medicine, and angiography. Final competencies in general radiography are required. *Prerequisite: RADT 2920, Co-requisites: RADT 2110 and RADT 2030*

Real Estate

FINR 1611 Principles of Real Estate N
4 Credits, 4 Class Hours
 This course provides a basic understanding of real estate and prepares students for the Tennessee Real Estate License Examination. Subject matter includes terminology, ethics, contract laws, mortgages, trust deeds, leases, financing, mathematics, and closing statements. The course consists of 60 classroom hours and is required for pre-licensure of affiliate brokers.

FINR 1612 Real Estate Salesmanship N
2 Credits, 2 Class Hours
 This course acquaints the student with basic sales techniques that are essential to the marketing of residential real estate. Attention is given to prospecting and qualifying buyers, preparing comparative market analyses, servicing listings, time management, negotiating and closing sales.

FINR 1613 1033 Real Estate Appraisal N
2 Credits, 2 Class Hours
 This course presents a broad view of the principles, procedures, and theories underlying all appraisals. All types of real property and leases are evaluated using the standard appraisal process with emphasis on residential, small commercial lands and farms. A complete market analysis of each type of property is taught. This course is approved by the Tennessee Real Estate Appraisal Commission.

FINR 1614 Real Estate Law N
2 Credits, 2 Class Hours
 This course is designed to acquaint the student with terminology, common law precedents, and federal/state statutes relative to the law of real property. The legal basis and ramifications of real property, contract instruments and ethical conduct as they relate to the business of real estate brokerage are discussed.

FINR 1615 Real Estate Finance N
2 Credits, 2 Class Hours
 This course acquaints the student with real estate financing concepts, instruments and financial institutions that deal with estate capital transactions. Students are exposed to the financial aspects associated with individual and corporate ownership, partnerships, syndicates and trusts and the financing of various types of properties.

FINR 1616 Real Estate Office Management N
2 Credits, 2 Class Hours
 This course is designed to cover the management functions critical in developing and operating a successful real estate brokerage firm. Methods and techniques for increasing productivity and efficiency are taught and Tennessee real estate law is emphasized.

FINR 1617 USPAP N
1 Credit, 1 Class Hour
 This course provides a basic understanding of the Uniform Standards of Professional Appraisal Practices and what they mean. Topics will include how and why the standards were written, how they became law under TITLE XI of the Financial Institution Reform, and the Recovery and Enforcement Act of 1989 (FIRREA).

FINR 1618 Real Estate Course for New Affiliates N
2 Credits, 2 Class Hours
 This course is designed for affiliate brokers who receive their Tennessee real estate license after January 1, 1994. The course assists agents to qualify buyers and sellers, maintain a client record base, interact with

other agents, and become more proficient with contracts and other listing and selling documents.

Sociology/Social Work

SWRK 1010 Introduction to Social Welfare T
3 Credits, 3 Class Hours
 Introduction to welfare is designed to provide students with professional entry-level knowledge and skills, and a values framework for providing a wide range of social services that link people and agencies with resources, services and opportunities. Licensing requirements and regulations governing caregiver facilities and personnel are also discussed. *Prerequisites: DSPW0800, DSPR0800 or equivalent*

SWRK 1020 Overview of Psychological/Sociological Conditions T
3 Credits, 3 Class Hours
 This course provides an overview of conditions that may confront persons who supervise services to individuals with special psychological and social needs. Various methods for providing services to the identified clientele are discussed. Emphasis will be placed on issues that impede optimal development during the life span. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SWRK 1030 Caregiver Administration Internship T
3 Credits, 3 Class Hours
 The Caregiver Administration internship allows the student to participate in the caregiver environment. The student is exposed to the daily responsibilities and experiences associated with caregiver administration, and is given the opportunity to apply educational training to actual work situations as they relate to clients. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*
Co-requisite: AT 1003, permission of the instructor

SOCI 1010 Introduction to Sociology T
3 Credits, 3 Class Hours
 This course introduces students to the field of sociology – its concepts, methods, theories and theorists. The sociological perspective is used in examining social interaction, social structures and social change. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SOCI 1020 Social Problems T
3 Credits, 3 Class Hours
 A critical reasoning approach is used in examining social problems and issues from the micro-social and global perspectives. Primary emphasis is placed on understanding the “social construction” of social problems—their magnitude, severity, causes, consequences and possible solutions. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SOCI 2030 Race, Class and Gender T
3 Credits, 3 Class Hours
 Using a socio-historical perspective and a critical reasoning approach, the consequences associated with race, class and gender inequalities in American social institutions are examined. Attention will be given to the impact of more recent demographic shifts in the cultural characteristics of society and to the global nature, of race, class and gender issues. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SOCI 2020 Marriage and the Family T
3 Credits, 3 Class Hours
 The study of the family as a social institution primarily emphasizes relationships among the family, society and individual members, and cultural variations based on class differences, ethnicity, and religion. The course also explores the family’s adaptation to changing societal forces and problems confronting contemporary family life. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SOCI 2010 The Family in Global Perspective T
3 Credits, 3 Class Hours
 This course focuses on the family as a global social institution and its responses to modernization, industrialization, and urbanization. Perspectives are presented from a sociological, anthropological and ecological frame of reference. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SOCI 2040 Sociology of the Black Family and Community T
3 Credits, 3 Class Hours
 This course is an analysis of the sociological complexities of education, religion, government, law enforcement, housing, and industry in the black family. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

SOCI 2060 The Study of Aging T
3 Credits, 3 Class Hours
 This course will focus on aging in sociological contexts. Students will discuss current beliefs, values, and norms regarding aging; structural location of aging in society; and implications of ageism in employment, poverty, private and institutional housing, crime, physical illness and mental illness. *Prerequisites: DSPW 0800, DSPR 0800 or equivalent*

Speech

SPCH 1110 Public Speaking T
3 Credits, 3 Class Hours
 This course is the study of ethical and effective public speaking with practice on constructing and delivering various types of speeches. Major focus will be placed on informative and persuasive speaking. This course fulfills the oral communication requirements for the general Education Core. *Prerequisites: DSPW 0800 and DSPR 0800*

SPCH 1310 Black Communication T
3 Credits, 3 Class Hours
 This course is a study of the speeches and rhetoric of the Black American. Emphasis is on major black speakers in America. *Prerequisites: DSPW 0800 and DSPR 0800*

SPCH 1620 Voice and Articulation T
3 Credits, 3 Class Hours
 Voice and Articulation is a 3-hr course designed to assist students in the development of effective speaking skills. The focus of the course will be on the improvement of pronunciation, voice, and articulation. Emphasis will be placed on the study of the International Phonetic Alphabet and oral presentations.

SPCH 2010 Oral Communication T
3 Credits, 3 Class Hours
 This course provides an introduction to the principles of oral communication, with particular emphasis on public speaking, group discussion, and mass media. *Prerequisites: DSPW 0800 and DSPR 0800*

SPCH 2610 Basic Oral Interpretation T
3 Credits, 3 Class Hours
 This course is an introduction to the oral performance of literature. The focus of the course is on the development of oral communication skills through the dramatic performance of prose and poetry.

SPCH 2620 Intermediate Oral Interpretation T
3 Credits, 3 Class Hours
 Continuation of Basic Oral Interpretation with emphasis on the sense of rhythm, style and technique necessary for speaking poetry, prose, and dramatic literature. *Prerequisite: SPCH 2610*

Telecommunication Engineering Technology

TLET 1010 Electronic Circuits I N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course explores the function and utilization of today's electronic circuits. These are designed and tested using diodes, transistors, and integrated circuits for applications in op-amps, photosensitive devices, integrators, differentiators, etc. Both digital and analog situations are examined along with applications for all electronic areas. Devices selected for investigation are used in later courses where they are presented in greater depth. *Corequisite: ELET 1120*

TLET 2020 Electronic Circuits II N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course involves the theory and mathematics of the circuits presented in Electronic Circuits I. The realities of using 20 percent components and even wider variations in discrete active elements are presented as problems to be solved by the student, using the proper combination of mathematics, test equipment, and cut and try. Solutions of assigned problems by the use of the computer are required. *Prerequisite: TLET 1010*

TLET 2144 Telecommunications and UHF N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is a continuation in electronic communications but emphasizes data communications, telephony, and microwave transmission. Current techniques used for high efficiency transmission of analog and digital signals are studied. Also covered are digital data techniques, transmission paths, radio link systems, earth station criteria, facsimile communications, and fiber optic transmission links. A field trip to a local communications facility is made. A fiber optics transmitter/receiver is constructed and tested by the student in the laboratory. Problems requiring a computer solution are assigned as part of laboratory projects. *Prerequisite: TLET 2214*

TLET 2214 Electromagnetic Radiation and Reception N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course covers communication systems using electromagnetic radiation in broadcast and point-to-point terminals. The ability of the system to transfer information from one point to another is studied in the presence of noise, which adversely affects the transmission and reception of radio frequency signals. Amplitude modulation (AM), single sideband (SSB), and frequency modulation (FM) are studied and comparisons are made as to the advantages and disadvantages of each system. The student writes computer programs that relate to topics covered in both the classroom and in the laboratory. The student also constructs and tests a complete AM transmitter and receiver system, using integrated circuits. Television systems are discussed and analyzed. *Prerequisites: ELET 1120, TLET 1010*

TLET 2233 Electrical/Electronic CAD Drawing N
3 Credits, 2 Class Hours, 2 Lab Hours
 This course introduces the student to the use of the computer for making electronic drawings. The primary goal of this course is to familiarize the student with the menus and commands of a computer-aided-drafting system. Skills will be developed to enable the student to manipulate lines, symbols, and text on the computer screen to produce an acceptable drawing before it is plotted. Block, logic, schematic, and printed circuit drawings will be covered in this course. *Prerequisite: ELET 1010 OR ENTC 1114*

TLET 2244 Telecommunication Design N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course provides for the application of theory covered in previous courses. The student is assigned projects having certain prescribed standards of operation. His or her responsibility is to use all knowledge gained to design, build, and test the circuitry to verify that it has met the prescribed standards. Topics typically covered in the course include active filters and frequency shaping networks, time domain multiplexing and frequency division multiplexing, D-A/A-D conversion, Norton amplifiers and transconductance amplifiers. This course also includes a minimum of three written reports with one formal engineering report. *Prerequisites: CPET 1124, TLET 2020*

- ◆ – Denotes transfer courses that fulfill minimum degree core requirements in all Tennessee Board of Regents institutions
- T – Denotes courses designed for transfer to four-year institutions
- N – Denotes courses not designed for transfer to four-year institutions

For full explanation, see introductory material for Course Descriptions section of this Catalog.

TLET 2344 Telecommunications for Technicians N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course is an overview of the telecommunication area and emphasizes data communications, telephony, and microwave transmission. Current techniques used for high efficiency transmission of analog and transmission paths, radio link systems, earth station criteria, and facsimile communications facility are made. A fiber optics transmitter/receiver is constructed and tested by the student in the laboratory. *Prerequisites: TLET 1010*

TLET 2444 Special Topics N
4 Credits, 3 Class Hours, 2 Lab Hours
 This course permits coverage of material not contained in other courses. Primary emphasis is placed on the application of current devices and trends in the electronic communication field.
Prerequisite: TLET 1010

TLET 1901-1908 Technical Scholarship Program N
4 Credits, 300 Lab Hours
 Students work part-time at their sponsoring companies training in areas related to their majors. Supervisors at the companies plan the work schedules to coincide with class schedules when possible.
Prerequisite: Permission of the Dean and Department Chair; may take as many as eight courses

TLET 1931 Cooperative Education Work Experience I N
3 Credits, 225 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

TLET 1941 Cooperative Education Work Experience I-A N
4 Credits, 300 Lab Hours
 From this experience the student participates in the employer/employee relationship. By being an integral part of the work atmosphere, the student encounters the true meaning of work, the physical and security needs it provides, plus the impact it has on today's society.

TLET 1932 Cooperative Education Work Experience II N
3 Credits, 225 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of the electronic industry. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements.
Prerequisite: TLET 1931 or TLET 1941

TLET 1942 Cooperative Education Work Experience II-A N
4 Credits, 300 Lab Hours
 In this course the student receives supervised work experience in any of the many facets of the electronic industry. The student performs technician-level work applying knowledge gained in the first-year technical courses to meet actual world-of-work requirements.
Prerequisite: TLET 1931 or TLET 1941

TLET 1933 Cooperative Education Work Experience III N
3 Credits, 225 Lab Hours
 The student acquires work experience in the electronic industry under the supervision of an engineer or senior technician. The student utilizes knowledge gained in electronic courses to accomplish tasks as assigned by the engineer. *Prerequisite: TLET 1932, or TLET 1942*

TLET 1943 Cooperative Education Work Experience III-A N
4 Credits, 300 Lab Hours
 The student acquires work experience in the electronic industry under the supervision of an engineer or senior technician. The student utilizes knowledge gained in electronic courses to accomplish tasks as assigned by the engineer. *Prerequisite: TLET 1932 or TLET 1942*

Television Production

TVPR 1710 TV Production I N
3 Credits, 3 Class Hours
 This course provides hands-on instruction in basic television production. Exposure to color and black/white television production equipment with emphasis on production principles, terminology, and vocations are included.

TVPR 1720 TV Production II N
3 Credits, 3 Class Hours
 This is a study of "on-the-air" production theory and practice with additional voice training and control. Emphasis is placed on production differences among mass media, film, and live theater. *Prerequisite: TVPR 1710.*

Theater

◆THEA 1030 Theater Appreciation T
3 Credits, 3 Class Hours
 This course is designed to develop an understanding and critical appreciation of live theater. Through reading and analyzing important plays, viewing filmed dramas, and attending and evaluating theatrical productions, students will be introduced to performance and technical components of theater and develop an understanding of theater's designation as a "collaborative art." *Prerequisites: DSPW 0800 and DSPR 0800*

THEA 1310 Theatre Crafts I T
3 Credits, 1 Class Hour, 3 Shop Hours
 This course covers theater and job hierarchies with emphasis on stage manager duties and includes hands-on approach to converting basic drawings to full realized scenery elements using tools and fasteners as well as painting techniques; reading light plots; and hanging, focusing, and getting instruments.

THEA 1320 Theatre Crafts II T
3 Credits, 1 Class Hour, 3 Shop Hours
 This course covers problem-solving in applying design ideas to unusual spaces and implementing design ideas on restricted budgets, with emphasis on designing sets, lights, and costumes. It includes script analysis and development of stage terminology.
Prerequisite: THEA 1310

THEA 1510 Basic Acting T
3 Credits, 3 Class Hours
 This course contains instruction in basic body and voice control techniques and exploration of actor's resources and class exercises to develop relaxation, concentration, imagination, and improvisation skills.

THEA 1520 Intermediate Acting T
3 Credits, 3 Class Hours
 This course is a continuation of basic body and voice control techniques with introduction to role analysis, characterization development and scene interpretation. *Prerequisite: THEA 1510 or permission of instructor*

THEA 1910 Production Laboratory T
1 Credit
 This course is an introduction to the technical demands of the theater through day-to-day operations. Student may select work hours to fit their schedule and may select an area of particular interest if possible.

Tennessee Board of Regents

The Honorable Don Sundquist
Chairman, Ex Officio, Governor of Tennessee

The Honorable Frank Barnett,
Knoxville

The Honorable Edgar R. "Buddy" Bowers,
Harriman

The Honorable Demetra Godsey Boyd,
Clarksville

The Honorable Noble Cody,
Cookeville

The Honorable Robert Jack Fishman,
Morristown

The Honorable Arles B. Greene,
Goodlettsville

The Honorable Patricia L. Roark,
Faculty Member, Tennessee Technology Center at Elizabethton

The Honorable Jane G. Kisber,
Jackson

The Honorable W. Keith McCord,
Knoxville

The Honorable Leslie Pope,
Johnson City

The Honorable J. Stanley Rogers,
Manchester

The Honorable Maxine A. Smith, Ph.D.,
Memphis

The Honorable William H. Watkins Jr.,
Vice Chairman, Memphis

The Honorable Derreck Whitson,
Student, Johnson City

The Honorable Faye Taylor,
Commissioner of Education, ex officio

The Honorable Richard D. Rhoda, Ph.D.,
Executive Director, Tennessee Higher Education Commission, ex officio

The Honorable Dan Wheeler,
Commissioner of Agriculture, ex officio

Administration

Nathan L. Essex, President
B.S., Alabama A&M University, 1964; M.S., Jacksonville State University, 1972; Ph.D., University of Alabama, 1975

John Floyd, Internal Auditor
B.S., University of Tennessee, Martin, 1970

**H. Arch Griffin, Vice Provost/
Campus Executive Officer, Union
Avenue Campus**
B.A., Arkansas Technical University, 1964; M.A., New Mexico Highlands University, 1965; M.S., University of Memphis, 1986

**Dwight Johnson, Vice President,
Business, Finance and Information
Systems**
B.S., Central State University, 1966; M.B.A., Xavier University, Ohio, 1976

**John Kirk, Vice Provost/Campus
Executive Officer, Macon Cove
Campus**
B.S., Rose-Hulman Institute of Technology, 1960; B.S., Mississippi State University, 1972; M.B.A., University of Memphis, 1967

**Andrea L. Miller, Provost, Executive
Vice President, Academic and
Student Affairs**
B.S., Lemoine-Owen College, 1976; M.S., Atlanta University, 1978; Ph.D., Atlanta University, 1980

**Karen F. Nippert, Vice President,
Institutional Advancement**
B.S., University of Memphis, 1974; M. Ed., University of Memphis, 1988

**Paul Thomas, Director of
Affirmative Action**
B.B.A., Tennessee State University, 1987

**Jim Willis, Vice President, Workforce
Development & Continuing
Education**
B.A., Auburn University, 1974; M.A., Pepperdine University, 1976; Ed.D., University of Memphis, 1997

Academic Deans

**Ada C. Shotwell, Professor, Dean,
Liberal Studies and Education**
B.A., Southern University, 1961; M.Ed., University of Memphis, 1974; Ph.D., University of Mississippi, 1986

**Glenn Swinny, Associate Professor,
Dean, Mathematics, Science and
Allied Health**
B.S., University of Memphis, 1963; M.A., University of Memphis, 1964 Registered Radiologic Technologist

**Donna R. Toole, Interim Dean,
Business, Career Studies and
Technology**
B.S., Delta State University, 1970; M.Ed., Delta State University, 1975

Administrative Deans

**Joanne H. Bassett, Professor, Dean
of Distance Education and
Instructional Technology**
B.A. University of Memphis, 1971; M.A., University of Memphis, 1973; Ed.D., University of Memphis, 1985.

**Thomas Walker, Dean of Student
Affairs**
B.A., University of North Carolina at Chapel Hill, 1984; M.P.A., University of Memphis, 1996

Faculty Directory

A

Bettie Abernathy-Phillips, Instructor, Business and Administration and College Webmaster
A.A.S., State Technical Institute at Memphis, 1996; B.A., Christian Brothers University, 1996; M.B.A., Christian Brothers University, 1998

Elaine F. Adams, Director, Center of Emphasis, and Professor, Developmental Studies, Reading
B.S., University of Memphis, 1969; M.S., University of Memphis, 1980; Ed.D., University of Memphis, 1991

Martha Anderson, Assistant Professor, Hospitality Management
A.S., State Technical Institute at Memphis, 1980; B.S., Memphis State University, 1973; M.S., Memphis State University, 1975

Vicki Armstrong, Instructor, Landscape and Turfgrass Management
B.P.S., University of Memphis, 1981; M.B.A., University of Memphis, 1996

Jerry Atwood, Associate Professor, Information Technology
B.B.A., University of Memphis, 1964; M.B.A., University of Memphis, 1967; Ph.D., University of Sarasota, 1971

B

Kathleen M. Baker, Associate Professor, Information Technology
B.A., University of Mississippi, 1966; M.S., University of Mississippi, 1969

Saeid Baki-Hashemi, Chair, Natural Sciences, and Associate Professor, Biology
B.A., University of Louisville, 1980; M.S., Murray State University, 1983

Ed Barnard, Chair, Computer/Information Technology and Graphic Arts Technologies, and Assistant Professor, Graphic Arts Technology
B.F.A., University of Memphis, 1971; M.B.A., Union University, 2001

Deborah B. Barton, Professor, Mathematics
B.S., Rust College, 1976; M.S., Wayne State University, 1978; Ed.D., University of Memphis, 1996

Mickey Beloate, Instructor, Developmental Studies, Mathematics
B.S., University of Memphis, 1974; M.S., University of Memphis, 1979; B.S.E.T., University of Memphis, 1982

Clair Berry, Associate Professor, English
B.S., Newcomb College, New Orleans, 1963; M.S., Louisiana State University, 1965; M.A., University of Memphis, 1981; M.A., University of Memphis, 1993

Stephen L. Black, Associate Professor, Developmental Studies, Writing
B.S., Rhodes College, 1972; M.A.T., University of Memphis, 1984

Cheryl A. Blake, Instructor, Education
B.A., Clark-Atlanta University, 1994; M.A.T., University of Memphis, 1999

Todd W. Blankenbeckler, Instructor, Geographic Information Systems
B.S., University of Memphis, 1996; M.S., University of Memphis, 1999

Mary Ann Bodayla, Associate Professor, History
B.A., Newark State College, 1973; M.A., New York University, 1976

Barbara B. Boswell, M.T.(ASCP), Associate Professor, Medical Laboratory Technology
B.S.MT, University of Memphis, 1976; M.S., University of Memphis, 1983

Joan W. Boswell, Instructor, Medical Transcription
B.S. Thomas Edison College, 1997; Certified Medical Technologist

David A. Brace, Associate Professor, Allied Health
B.S., New York University, 1971

Douglas J. Branch, Instructor, English
B.A., West Virginia Wesleyan College, 1987; M.A., University of Mississippi, 1991

Carolyn S. Brown, Associate Professor, Nursing
B.S.N., University of Tennessee, 1978; M.S.N., University of Tennessee, Memphis, 1984

Charles E. Bryant, Associate Professor, Developmental Studies, Mathematics
B.S., Austin Peay State University, 1974; M.A.T., University of Memphis, 1983

Ray D. Burkett, Professor, Biology
B.A., Stephen F. Austin State University, 1961; M.A., University of Kansas, 1964; Ph.D., University of Kansas, 1969

Jeremy C. Burnett, Interim Chair, Accountancy, Office Administration and Career Studies, and Instructor, Hospitality Management
B.S., University of Tennessee, 1998

Larry Butts, Assistant Professor, Business Administration
A.S., State Technical Institute at Memphis, 1982; B.S., Tusculum College, 1988; M.A., Tusculum College, 1989

Yoon Byunn, Associate Professor, Mathematics
B.S., King College 1963; M.A., University of North Carolina, 1966

C

Cynthia B. Calhoun, Chair, Social and Behavioral Sciences, and Associate Professor, Sociology
B.A., Fisk University, 1974; M.A., Memphis State University, 1976

Dollie Calloway, Assistant Professor, Developmental Studies, Reading
B.S.E., University of Memphis, 1971; M.Ed., University of Memphis, 1984

Dwight Campbell, Assistant Professor, Accountancy
B.A., University of Memphis, 1973; J.D., University of Memphis, 1982; CPA, Tennessee.; Licensed Attorney, Tennessee

George P. Carney, Professor, Physics
B.S., St. Mary's College, 1945; M.S., Illinois Institute of Technology, 1957

Kenneth A. Carpenter, Associate Professor, Biology
B.S., Tennessee State University, 1976; M.S., Tennessee State University, 1978

Joseph C. Carson, Associate Professor, English and Spanish
B. A., Memphis State University, 1969; M. A., Baylor University, 1970; M. A., Memphis State University, 1991

Richard C. Casey, Associate Professor, Business Administration
B.B.A., University of Mississippi, 1971; M.B.A., University of Mississippi, 1974

Gail H. Chambers, Associate Professor, Office Administration
B.S., University of Tennessee, 1969; M.S., University of Tennessee, 1972

James S. Champion, Professor, Mathematics
B.S., Millsaps College, 1961; M.S., University of Mississippi, 1964; M.P.S., Loyola University, 1988

Kun-San Chang, Professor, Physics
B.S., Taiwan Normal University, 1963; M.S., College of William and Mary, 1971; Ph.D., College of William and Mary, 1977

Clarence Christian, Associate Professor, Sociology, and Director, Honors Academy
B.A., LeMoyne-Owen College, 1968; M.A.S.W., University of Chicago, 1970

Cheryl S. Cleaves, Professor, Developmental Studies, Mathematics, and Executive Assistant, AMATYC Office
B.S., University of Memphis, 1966; M.S.T., University of Memphis, 1971; Ph.D., University of Mississippi, 1986

William I. Coburn, Associate Professor, Information Technology
B.S., Christian Brothers College, 1965; M.B.A., Memphis State University, 1969; Ed.D., University of Sarasota, 1989

Thad Cockrill, Instructor, English
B.S., Arkansas State University, 1986; M.A.,
University of Mississippi, 1992

**Lisa Inzer Coleman, Associate Professor,
English**
B.S.E., Henderson State University, 1978;
M.A., University of Arkansas, 1980

**Mary N. Cook, Associate Professor, Health,
Physical Education and Recreation**
B.S., University of Mississippi, 1964; M.Ed.,
University of Memphis, 1972; ACE Certified
Group Exercise Instructor; NDITA Certified
Personal Trainer

Mary P. Cook, Associate Professor, Chemistry
B.S., Christian Brothers College, 1982; Ph.D.,
University of Memphis, 1990

Vava E. Cook, Professor, Human Services
B.S., University of Tennessee, 1969; M.S.,
Cornell University, 1972; Ed.D., University of
Memphis, 1989

**Cecil J. Coone, Associate Professor, Math-
ematics**
B.A., David Lipscomb University, 1969; M.S.,
Middle Tennessee State University, 1973;
M.B.A., University of Memphis, 1988

**Jody C. Couch, Assistant Professor, Develop-
mental Studies, Mathematics**
B.S., Mississippi State University, 1968;
M.S.E., Arkansas State University, 1969;
Ed.D., University of Memphis, 1993

**Carolyn E. Coward, Associate Professor,
Languages and Literature**
B.A., LeMoyne-Owen College, 1975; M.A.,
Atlanta University, 1977

**Amy Cox, Assistant Professor, Medical
Laboratory Technology**
BSMT, University of Memphis; 1975; M.A.T.
University of Memphis, 1992

Grace B. Cox, Associate Professor, Sociology
R.T., Good Samaritan Hospital School of X-
Ray Technology, 1965; B.A., University of
Memphis, 1974; M.A., University of
Memphis, 1975

**Phyllis G. Cox, Associate Professor,
Mathematics**
B.S., Lambuth University, 1971; M.S.T.,
University of Memphis, 1975

Lovberta A. Cross, Professor, Sociology
A.A., Los Angeles Community College, 1970;
B.A., Pepperdine University, 1971; M.A.,
Pepperdine University, 1973; Ed.D., Nova
University, 1993

Rose Cummings, Assistant Professor, Nursing
Nursing Diploma, St. Louis Municipal School
of Nursing, 1970; B.S.N., University of
Tennessee, 1978; M.S.N., University of
Tennessee, Memphis, 1984; ANCC Certifica-
tion, FNP, 1985

**Thomas E. Curry, Associate Professor,
Business Administration**
B.S., Murray State University, 1970; M.A.,
Murray State University, 1972; Ed.S., Murray
State University, 1973; M.B.A., Murray State
University, 1976

Maxwell Cutler, Associate Professor,

Computer Engineering Technology
B.S., Glasgow University, 1957

D

David A. Darnall, Professor, Chemistry
B.S., Murray State University, 1965; M.S.,
Murray State University, 1968; Ph.D.,
University of Memphis, 1972

Douglas Darnall, Baseball Coach Instruction
A.S., Shelby State Community College, 1988;
B.S., Western Kentucky University, 1990;
M.S., University of Memphis, 1993

**Fred L. Davis, Associate Professor, Business
Administration**
B.B.A., University of Memphis, 1964; M.B.A.,
University of Memphis, 1967

**Georgia H. Davis, Associate Professor,
Developmental Studies, Reading**
B.S., LeMoyne Owen, 1968; M.Ed.,
University of Memphis, 1972

**Theodore W. Davis, Associate Professor,
Developmental Studies, Mathematics**
A.S., Manatee Jr. College, 1966; B.A.,
University of Memphis, 1969; M.S.,
University of Memphis, 1978

**Charles A. Demetriou, Professor, Mathemat-
ics**
B.S., Christian Brothers College, 1965; M.S.,
University of Mississippi, 1967

Bob F. Drake, Assistant Professor, Biology
B.S., University of Tennessee, Martin, 1965;
M.S., University of Memphis, 1968

**Kenneth F. Dunn, Associate Professor,
Graphic Arts Technology**
A.A.S., City College of Chicago, 1975; B.A.,
Northeastern Illinois University, 1987; M.S.,
University of Memphis, 2002

**Sarah Dunn, Instructor, Information
Technology**
B.S., Northwestern Illinois University, 1991

E

Holly Enterline, Professor, Paralegal Studies
B.S.Ed., Millersville University, 1968; J.D.,
University of Memphis Law School, 1988;
Licensed Attorney, Tennessee

**Shiphrah Williams-Evans, Department Chair,
Nursing**
B.S.N., University of Tulsa, 1974; M.S.,
University of Oklahoma, 1981; Ph.D.,
Oklahoma State University, 1989

**Gwendolyn Ewing, Professor, Office
Administration**
B.B.A., University of Memphis, 1971; M.Ed.,
University of Memphis, 1972; Ed.D.,
University of Memphis, 1995

F

**Patsy R. Fancher, Instructor, Graphic Arts
Technology**
A.A., Northwest Mississippi Community
College, 1979; B.F.A., Memphis Academy of
Arts, 1983; B.F.A., Memphis Academy of Art,
1984; M.F.A., Memphis College of Art, 2000

**Glenn A. Faight, Associate Professor,
Emergency Medical Technology**
A.A.S., Georgia Military College, 1978; B.S.,
University of Memphis, 1987; M.S.,
University of Memphis, 1993

**Louis V. Ferrante, Associate Professor,
Mathematics**
B.S., Memphis State University, 1979; M.S.,
Memphis State University, 1983

**David C. Ferrier Jr., Assistant Professor,
Information Technology**
A.S., State Technical Institute at Memphis,
1975; B.B.A., Memphis State University, 1991

**Donald V. Feuerborn, Assistant Professor,
Electrical Engineering Technology**
A.S., State Technical Institute at Memphis,
1975; A.S., State Technical Institute at
Memphis, 1975; B.S.E.T., University of
Memphis 1979

**E. Lynn Fly, Associate Professor,
Developmental Studies, Mathematics**
B.S., Murray State University, 1964; M.A.,
Memphis State University, 1966

James P. Foley, Associate Professor, Art
B.F.A., University of Memphis, 1968; M.F.A.,
University of Memphis, 1977

**Gerald J. Foon, Associate Professor, Emer-
gency Medical Technology**
B.S., University of Missouri, 1974; M.S.,
University of Memphis, 1990

Fonda Fracchia, Instructor, Education
B.S., University of Memphis, 1997; M.A.,
Delta State University, 1999

**Tracy R. Freeman, Instructor, Radiologic
Technology**
B. S., R.T., LeMoyne-Owen College, 1997

**John D. Friedlander, Associate Professor,
English**
B.A., Santa Clara University, 1969; M.A.,
University of Chicago, 1971

Lisa V. Fuller, Associate Professor, Music
B.Mu., Baylor University, 1979; M.Mu.,
University of Memphis, 1990

G

**Louis Gamble, Instructor, Information
Technology**
B.A., University of GUAM, 1974; M.A.,
Georgia Southern, 1976

**Derek Gardner, Program Coordinator,
Radiologic Technology**
B.S.R.T., University of Central Arkansas,
1991; M.S., University of Arkansas, 1992

Lafayette Gatewood, Associate Professor, Health, Physical Education and Recreation B.A., University of Memphis, 1976; M.Ed., University of Memphis, 1977

Carol Gazik, Instructor, Information Technology B.S.E., Arkansas State University, 1968; M.S.E., Arkansas State University, 1969; MS, Christian Brothers University, 1991

Ashley G. Geisewite, Assistant Professor, Business Administration B.B.A., University of Mississippi, 1989; M.B.A., University of Mississippi, 1990

Ronald L. Gephart, Associate Professor, Speech and Theater B.S., University of Findlay, 1980; M.F.A., University of Memphis, 1982

Sara K. Germain, Associate Professor, Biology B.S., University of Tennessee, 1968; M.S., University of Tennessee, Memphis, 1972

Douglas F. Gill, Instructor, Automotive Service Technology B.M.E., University of Memphis, 1977; ASE Certified Master Automobile Technician, ASE Certified Automobile Advanced Level Engine Performance

Victoria Gray, Instructor, History B.A., University of Mississippi, 1986; M.A., University of Mississippi, 1991

Merry Grizzard, Instructor, Emergency Medical Technology A.A.S., Shelby State Community College, 1984

H

Rosie Hale, Associate Professor, Accountancy A.S., State Technical Institute at Memphis, 1979; A.S., State Technical Institute at Memphis, 1980; B.S., Christian Brothers College, 1983; M.B.A. University of Memphis, 1990

Stephen W. Haley, Professor, History B.A., University of Memphis, 1965; M.A., University of Memphis, 1968; Ed.D., University of Memphis, 1978

Frankie E. Harris, Associate Professor, Mathematics B.S., LeMoyné-Owen College, 1972; M.Ed., Memphis State University, 1974

Thelma J. Harris, Associate Professor, Clinical, Nutrition, Dietetics and Food Service Administration B.S., Tuskegee University, 1969; M.S., University of Memphis, 1983

Deborah A. Haseltine, Associate Professor, Information Technology B.S.E., Central Methodist College, 1973; A.A.S., State Technical Institute at Memphis, 1990

Judy M. Hatmaker, Associate Professor, Geography B.A., University of Memphis, 1977; M.S., University of Memphis, 1979; M.A., University of Memphis, 1981; M.A.T., University of Memphis, 1986

Carl G. Heinrich, Associate Professor, Civil/Construction Engineering Technology A.E., State Technical Institute at Memphis, 1972; A.S., State Technical Institute at Memphis, 1974; B.S.E.T., Memphis State University, 1976; M.S., University of Arkansas, 1988 Certified Manufacturing Technologist

M. Anastasia Herin, Associate Professor, Speech and Theatre B.S., University of Memphis, 1960; M.A., University of Memphis, 1969

Steve Hester, Associate Professor, Business Administration B.A., Vanderbilt University, 1971; M.B.A., Memphis State University, 1985; Certified Public Accountant, Tennessee

Lorraine Hicks, Professor, Accountancy B.A., Ouachita Baptist University, 1967; M.B.A., University of Memphis, 1969; Certified Public Accountant, Tennessee; Certified Public Accountant, Arkansas

James A. Hight Jr., Professor, Mathematics B.A., Memphis State University, 1965; M.S., Memphis State University, 1967

Dean Honadle, Associate Professor, Telecommunication Engineering Technology A.S., Shelby State Community College, 1979; B.S., Memphis State University, 1981

May-Chuen Hsieh, Instructor, Information Technology A.S., Ming Chuan College, Taipei, Taiwan, 1984; B.B.A., University of Memphis, 1992; M.S., University of Memphis, 1994

Lynn Huggins, Associate Professor, Information Technology B.B.A., Memphis State University, 1963; M.S., University of Memphis, 1997

Deborah W. Hunt, Associate Professor, Developmental Studies, Reading B.S., Memphis State University, 1971; M.Ed., Memphis State University, 1976

Marcia E. Hunter, Associate Professor, Psychology B.S., Oakwood College, 1977; M.S., Alabama A & M University, 1981; Ed.S., Memphis State University, 1986

Martrice Hurrah, Assistant Professor, Criminal Justice B.A., University of Detroit, Mercy, 1981; M.A., Clark Atlanta University, 1989

Gwynne Hutton, Professor, Paralegal Studies B.A., University of Memphis, 1978; J.D., University of Memphis Law School, 1981; Licensed Attorney, Tennessee

J

Lillie Miller Jackson, Associate Professor, English B.S., North Carolina A&T State University 1970; M.A., Southern Illinois University, 1972

Irving L. Jason, Associate Professor, Accountancy B.B.A., Memphis State University, 1972; M.S., Memphis State University, 1976; Certified Public Accountant, Tennessee

Brenda C. Jinkins, Associate Professor, Developmental Studies, Mathematics B.S., University of Tennessee, 1966; M.S., University of Tennessee, 1970

Betty J. Johnson, Chair - Education, Professor, Education B.A., Tougaloo College, 1964; M.S., Jackson State University, 1971; Ed.D., University of Memphis, 1975

John Eddie Jones, Instructor, Graphic Arts Technology A.A., Shelby State Community College, 1980; B.P.S., University of Memphis, 1980; M.F.A., Memphis College of Art, 1991

Marguerite Jackson-Jones, Associate Professor, Developmental Studies, Writing B.S., Mississippi Valley State University, 1969; M.E., Mississippi State University, 1974; Ed.S., Arkansas State University, 1983

Nancy S. Jones, Associate Professor, Education B.S., University of Memphis, 1976; M.S., University of Memphis, 1978

Yvonne Jones, Associate Professor of English B.A., Spelman College, 1969; M.A., University of Oregon, 1974

K

Steven A. Katz, Professor, English/Music B.A., Tulane University 1972; M.A., University of North Carolina, Chapel Hill, 1973; Ed.D., University of Memphis, 1985

Patricia Keene, Associate Professor, Nursing A.D.N., University of Memphis, 1971; B.S.N., University of Tennessee, 1974; A.D.N., M.S.N., University of Tennessee at Memphis, 1975

G. Michael Kelly, Professor, Mathematics B.S., Lambuth College, 1974; J.D., Memphis State University School of Law, 1977; M.S., University of Memphis, 1980; Ed.D., University of Memphis, 1984

John W. Kendall, Chair, Mathematics, and Associate Professor, Mathematics B.S., Murray State University, 1967; M.S./Mathematics, University of Memphis, 1968; M.S./Statistics, University of Memphis, 1976

Joy Kinard, Associate Professor, Office Administration
A.A., Northeast Mississippi Community College, 1958; B.S., Mississippi State University, 1959; M.S., University of Memphis, 1985

L

Ross C. Land, Associate Professor, History
B.A., Arkansas Tech University, 1967; M.A., Arkansas State University, 1971

Elizabeth Lawrence, Instructor, Criminal Justice
B.S., University of Memphis, 1971; M.Ed., University of Memphis, 1972

Patricia H. Lechleiter, Associate Professor, Mathematics
B.S., Middle Tennessee State University, 1967; M.S., University of Memphis, 1979

Patricia A. Lechman, Associate Professor, Art
B.S., University of Georgia 1967; M.S., Indiana University, 1971; M.F.A., Michigan State University 1975

Lillie K. Lewis, Associate Professor, Accountancy
A.S., State Technical Institute at Memphis, 1973; B.B.A., Memphis State University, 1977; M.S., University of Arkansas, 1979

Lydia M. Linebarger, Instructor, Developmental Studies, Mathematics
A.A., Longview Community College, 1970; B.S., Southwest Missouri State College, 1972; M.A., University of Missouri, 1975

Linda Lipinski, Assistant Professor, English
B.A., University of Illinois/Urbana, 1966; M.A., University of Illinois/Urbana, 1969

Evelyn H. Little, Associate Professor, Speech and Theater
B.A., Lane College, 1970; M.A., University of Memphis, 1974

Bertha R. Looney, Associate Professor, English
B.A., University of Memphis, 1979; M.A., University of Memphis, 1986

M

Joan Mackechnie, Assistant Professor, Nursing
B.S.N., University of Virginia, 1969; M.S.N., Emory University, 1971

Clim Madlock Jr., Associate Professor, History
B.A., University of Memphis, 1970; M.A., University of Memphis, 1972; J.D., University of Memphis, 1983

Roma G. Magtoto, Associate Professor, Nursing
B.S.N., University of Tennessee, Nashville, 1979; M.S.N., University of Southern Mississippi, 1980

Gregory E. Maksi, Chair, Engineering Technologies, and Professor, Industrial Engineering Technology
B.S.M.E., Georgia Institute of Technology, 1961; M.S.I.M., Georgia Institute of Technology, 1964; Ph.D., University of Mississippi, 1983; Registered Professional Engineer

Penny S. Mays, Instructor, Radiologic Technology
Certificate Advanced Roentgen Ray Technique, University of Tennessee, Memphis, 1961

Loretta McBride, Associate Professor, English
B.A., University of Southern Mississippi, 1972; M.A., University of Memphis, 1986; M.A.T., University of Memphis, 1987

Lee McCaulla, Instructor, Graphics Arts
B.F.A., California Institute of the Arts, 1991

Beverly A. McClure, Associate Professor, English
B.S., Auburn University, 1966; M.A., University of Memphis, 1970; M.S., University of Memphis, 1987

Tamara McColgan, Assistant Professor, Mathematics
B.S., University of Mississippi, 1984; M.S., University of Mississippi, 1989; Ph.D., University of Mississippi, 1992

Clark E. McKinney, Instructor, Psychology
B.A., Ozark Bible College, 1959; M.A., Liberty University, 1988; Ph.D., Brighton University, 1993

Leslee McKnight, Instructor, EMT
A.A.S., Shelby State Community College, 1995

Nita McMillan, Associate Professor, Developmental Studies, Reading
B.S., Bethel College, 1970; M.Ed., University of Memphis, 1991

Ravidra Mehra, Instructor, Developmental Studies, Mathematics
B.C., University of Delphi, 1971; DIP, Indian Institute of Management, 1973

William E. Melton, Associate Professor, History
B.A., Mississippi College, 1951; M.A., University of Alabama, 1952; B.D., Union Seminary, Virginia, 1966

Virginia W. Melvin, Associate Professor, Office Administration
B.S., University of Memphis, 1971; M.S., University of Memphis, 1981; Certified Professional Secretary

Anne Mitchell-Hinton, Professor, Medical Laboratory Technology
B.A. Fisk University, 1960; Ed.D., Tennessee State University, 1989

Lynda R. Miller, Instructor, Biology
B.A., Southern Illinois University, 1989; M.S., University of Memphis, 1991

Jossie A. Moore, Professor, Developmental Studies, Reading
B.A., Lane College, 1971; M.E., University of Memphis, 1975; Ed.D., University of Memphis, 1986

Howard Douglas Morgan Jr., Professor, Accountancy
B.B.A., University of Memphis, 1975; J.D., University of Memphis, 1985; Certified Public Accountant, Tennessee; Licensed Attorney, Tennessee

J. Wayne Morris, Instructor, Information Technology
B.A., Memphis State University, 1979; A.A.S., State Technical Institute at Memphis, 1992

Louis Moses, Associate Professor, Biology
B.S., Alcorn State University, 1965; M.S., Howard University, 1973

Mark W. Moses, Assistant Professor, Developmental Studies, Mathematics
B.S., University of Alabama, 1993; M.A., University of Alabama, 1996

Debra S. Murphy, Associate Professor, Developmental Studies, Mathematics
B.S., University of Memphis, 1983; M.S., University of Memphis, 1984; M.S., University of Tennessee, 1993

Tami L. Murphy, Associate Professor, Developmental Studies, Mathematics
B.S.E.E., University of Memphis, 1983; M.S., University of Memphis, 1986; M.S., University of Tennessee, 1993

Sandra C. Murrell, Associate Professor, Mathematics
B.S., Central State University, 1969; M.S.T., University of Memphis, 1973

N

Jerry Newman, Instructor, Electronic Technology
A.S., State Technical Institute at Memphis, 1989; B.S., Southern Illinois University at Carbondale, 1996

William D. Newsom, Associate Professor, Accountancy
B.B.A., University of Memphis, 1967; M.B.A., University of Memphis, 1988; Certified Public Accountant, Tennessee

Harry B. Nichols, Associate Professor, Computer Engineering Technology
B.S., Memphis State University, 1967; M.S., Memphis State University, 1969; M.S., Memphis State University, 1977

J. Michael Northern, Associate Professor, Electrical Engineering Technology
B.S.E.E., University of Memphis, 1970; B.S., University of Memphis, 1979; M.S., University of Memphis, 1989; Registered Professional Engineer

Patricia N. Nozinich, Assistant Professor, Paralegal Studies
B.A., Memphis State University, 1978; J.D., University of Memphis Law School, 1983

O

Marion M. O Daniel, Associate Professor, Telecommunication Engineering Technology
A.E., State Technical Institute at Memphis, 1971; A.E., State Technical Institute at Memphis, 1973; B.S., University of Memphis, 1975; M.S., University of Memphis, 1979

Asmelash Ogbasion, Associate Professor, Accountancy
B.S., Jackson State University, 1974; M.B.A., Jackson State University, 1975

Vincent Ores, Associate Professor, Developmental Studies, Mathematics
A.E.T., State Technical Institute at Memphis, 1986; B.S.E.T., University of Memphis, 1988; M.S., University of Memphis, 1990

Danny R. Owen, Assistant Professor, Automotive Service Technology
A.A.S., Itawamba Community College, 1987; B.S., Mississippi State University, 1997; ASE Certified Master Automobile Technician; ASE Certified Automobile Advanced Level Engine Performance

Carla U. Owens, Assistant Professor, Graphic Arts Technology
B.S., University of Memphis, 1979; M.S., University of Memphis, 1997

P

Rhonda Pace, Instructor, Radiologic Technology
B.S., R.T., University of Memphis, 2000

Sheridan R. Park, Instructor, Office Administration
B.A., University of Evansville, 1971; M.S., Indiana University, 1976

Dolores Parker, Associate Professor, Nursing
B.S.N., University of Memphis, 1982; M.S.N., University of Tennessee, Memphis, 1986

Myrna T. Parker, Instructor, Information Technology
A.S., State Technical Institute at Memphis, 1975; B.P.S., University of Memphis, 1995

Linda D. Patterson, Associate Professor, English
B.S., University of Memphis, 1971; M.Ed., University of Memphis, 1978; M.A., University of Memphis, 1988

Wesley A. Payne, Interim Chair, Business Administration and Paralegal Studies
B.P.S., University of Memphis, 1990; M.B.A., Embry-Riddle Aeronautical University, 1992

Leslie Peebles, Instructor, Court Reporting
B.S.B., University of Mississippi, 1984; RPR; CCR

Charles Pender, Associate Professor, Music
B.A., Middle Tennessee State University, 1985; M.Ed., University of Memphis, 1987; D.M.A., American Conservatory of Music, 1997

Indiren Pillay, Associate Professor, Biology
B.S., Rhodes University, 1984; B.S.-Honors, Rhodes University, 1985; M.S., Alabama A & M University, 1987; Ph.D., University of Tennessee, Memphis, 1995

Cy M. Pipkin, Assistant Professor, Developmental Studies, Mathematics
B.S., Southwestern at Memphis, 1953; M.A., Vanderbilt University, 1954

Carl J. Plumlee, Professor, Mechanical Engineering Technology
B.S., University of Tennessee, 1960; M.S., University of Tennessee, 1970; Registered Professional Engineer

Linda L. Pope, Associate Professor, Clinical Nutrition, Dietetics and Food Service Administration
B.S., Lambuth College, 1972; M.S., University of Memphis, 1980

Phyllis Y. Porter, Assistant Professor, Developmental Studies, Reading
B.A., Hampton University, 1982; M.S., University of Memphis, 1990

Mary Pratt, Associate Professor, History
B.A., Christian Brothers University, 1975; M.A., University of Memphis, 1977

John H. Pritchard Jr., Instructor, Languages and Literature
B.A., University of Mississippi, 1960; M.A., University of Memphis, 1968

Robert Prytula, Instructor, Fire Science
B.S., Eastern Kentucky University, 1995

R

Michael E. Randle, Professor, Business Administration
B.B.A., Memphis State University, 1967; M.B.A., Memphis State University, 1969

Khalil Rassy, Associate Professor, Mathematics
B.B., Louisiana Tech, 1987; M.S., Louisiana Tech University, 1989

Holman W. Ray, Associate Professor of Emergency Medical Technology
B.S., Middle Tennessee State University, 1984; J.D., University of Memphis, 1989

Homer T. Ray, Chair, Industrial and Environmental Technologies, and Associate Professor, Industrial Maintenance Technology
A.A.S., State Technical Institute at Memphis, 1980; B.S., Memphis State University, 1984; M.S., Memphis State University, 1986

Jerry Redmond, Assistant Professor, Graphic Arts Technology
B.A., Mississippi Valley State University, 1993; B.S., Mississippi Valley State University, 1994; M.F.A., Memphis College of Art, 1996

Loretta A. Regan, Associate Professor, Nursing
B.S.N., St. Xavier College, 1967; M.S., DePaul University, 1979

Edward C. Reid, Professor, Psychology
B.A., Northern Michigan University, 1970; M.A., Southern Illinois University, 1974; Ph.D., Southern Illinois University, 1981

Vicki Robertson, Associate Professor, Office Administration
B.S., University of Memphis, 1975; M.S., University of Memphis, 1987

Ellis L. Robinson, Associate Professor, English
B.A., LeMoyne-Owen College, 1973; M.A., Northwestern University, 1974

Barbara A. Roseborough, Chair, Fine Arts, Languages, and Literature, and Associate Professor, English
B.A., LeMoyne-Owen College, 1975; M.A., Atlanta University, 1977

Betty A. Rosenblatt, Associate Professor, Biology
B.S., University of Memphis, 1970; M.S., University of Memphis, 1974

Lisa H. Rudolph, Associate Professor, Information Technology
A.S., State Technical Institute at Memphis, 1987; B.B.A., University of Memphis, 1994; M.S., University of Memphis, 1997

S

Amir Samardar, Professor, Mathematics
B.M.S., Military Academy of Iran, 1962; M.S., Tehran University, 1970; M.S., Florida State University, 1982; Ph.D., Florida State University, 1985

Jane Santi, Associate Professor, Information Technology
B.S., Lambuth College, 1970; M.S., University of Tennessee, 1971

Roger Schlichter, Instructor, Information Technology
B.S., Southern Illinois University, 1995; M.S., University of Arkansas, 2000; A+ Certified

Michael E. Scott, Associate Professor, Music
B.M.Ed., University of Memphis, 1975; M.A., Western Illinois University, 1976

Thurston D. Shrader, Associate Professor, Business
B.A., Vanderbilt University, 1981; M.B.A., Memphis State University, 1982

William C. Simon, Associate Professor, Civil/Construction Engineering Technology
B.S., Mississippi Valley State University, 1979; A.E.T., State Technical Institute at Memphis, 1984; M.S., University of Arkansas, 1987

Martha S. Simpson, Associate Professor, Nursing
B.S.N., University of Tennessee, 1962; M.S.Ed., University of Memphis, 1976; M.S.N., Texas Woman's University, 1985; P.N.P., University of Tennessee, 1995

Kathleen Singleton, Instructor, Information Technology
M.S. Christian Brothers University, 1989

Brenda A. B. Smith, Associate Professor, Business Administration
B.S., Christian Brothers College, 1975; M.S., University of Arkansas, 1986

Brenda L. Smith, Associate Professor, Office Administration
B.S., Mississippi University for Women, 1970; M.A.T., University of Memphis, 1977

Bridget Smith, Instructor, Developmental Studies, Mathematics
B.S., University of Alabama at Birmingham, 1986; M.S., University of Alabama at Birmingham, 2000

Douglas Smith, Associate Professor, Program Coordinator, Biology
B.A., University of Arkansas, 1965; Ed.D., University of Memphis, 1976; D.C., Parker College of Chiropractic, 1991

Leonard J. Smith, Associate Professor, Developmental Studies, Mathematics
A.E., State Technical Institute at Memphis, 1970; B.S.E.T., University of Memphis, 1975; M.S., University of Memphis, 1987

Lilliette J. Smith, Associate Professor, Psychology
B.S., Tennessee State University, 1974; M.S., University of Tennessee, Knoxville, 1976

Miki L. Smith, Instructor, Developmental Studies, Writing
B.A., Arkansas State University, 1995; M.A., Arkansas State University, 1996

Sharron S. Smith, Associate Professor, Developmental Studies, Writing
B.A., University of Memphis, 1970; M.Ed., University of Memphis, 1974

Ruth P. Sowell, Associate Professor, Developmental Studies, Reading
B.S., Olivet Nazarene University, 1969; M.Ed., University of Memphis, 1983

Garry P. Spencer, Associate Professor, Electrical Engineering Technology
B.S.E.E., Memphis State University, 1975; M.S.E.E., Memphis State University, 1977

Gary Mike Stephens, Associate Professor, Electronic Technology
A.S., State Technical Institute at Memphis, 1982; B.A., Western Illinois University, 1987

Jeffrey C. Stewart, Assistant Professor, Mechanical Engineering Technology
A.A.S., State Technical Institute, 1990; B.S.M.E., University of Memphis, 1993; M.S.M.E., University of Memphis, 1998

Robert Stewart, Instructor, Emergency Medical Technology
B.S., University of Memphis, 1989

William D. Summons, Associate Professor, Mathematics
A.S., N.W. Michigan College, 1973; B.S., Michigan State University, 1975; M.S., Michigan State University, 1977

Carl E. Swoboda, Instructor, Accounting
B.B.A., University of Memphis, 1972; M.S., University of Memphis, 1994; CPA

Dewey Sykes, Associate Professor, Computer Engineering Technology
B.S., University of Memphis, 1985; M.S.C.I.S., University of Phoenix, 1999

Robert L. Tate, Associate Professor, Physics
B.S., John Carroll University, 1960; M.S., Saint Louis University, 1965

Herbert L. Temple, Professor, Mathematics
B.S., Northwestern State College, 1958; M.S., Northwestern State College, 1960; Ed.D., Auburn University, 1976

Joseph W. Thweatt, Professor, Developmental Studies, Writing
B.A., Southern Methodist University, 1962; M.Ed., University of Memphis, 1971

Isom Tibbs, Instructor, Developmental Studies, Mathematics
B.S., Tennessee State University, 1992; M.S., Mathematics, Tennessee State University, 1994

Dieter H. Tillman, Associate Professor, Physics
B.S., Miami University, Ohio, 1982; M.S., Miami University, Ohio, 1984

Robert Tom, Assistant Professor, Architectural Engineering Technology
B.Arch., Tulane University, 1973; M.Arch., University of Pennsylvania, 1977; M.C.P., University of Pennsylvania, 1977; Licensed Architect

Pamela K. Trim, Associate Professor, Mathematics
B.S.E., University of Memphis, 1975; M.Ed., University of Memphis, 1979

Stennis B. Trueman Jr., Associate Professor, English
B.A., Stillman College, 1969; M.A., University of Illinois, 1973

Melvin Tuggle, Associate Professor, Philosophy
B.A., LeMoyné-Owen College, 1977; M.A., University of Memphis, 1988; Ph.D., Southern Illinois University, 1994

Susan S. Turner, Associate Professor, Developmental Studies, Reading
B.S., University of Memphis, 1971; M.Ed., University of Memphis, 1974

William G. Turner, Jr., Associate Professor, Mathematics
B.S., University of Memphis, 1976; M.S., University of Memphis, 1978

V

Janice Van Dyke, Professor, Developmental Studies, Mathematics
B.S., Concord College, 1969; B.S.E., Concord College, 1969; M.S., University of Tennessee, Knoxville, 1972; Ed.D., University of Memphis, 1989

Mary Vines, Associate Professor, Nursing
B.S.N., University of Tennessee, 1969; M.S.N., Mississippi University for Women, 1980; ANCC Certification, FNP, 1981

W

MaLinda F. Wade, Associate Professor, Political Science
B.A., Ball State University, 1977; M.P.A., Ball State University, 1978; M.A., Ball State University, 1980

Carl Wagner, Instructor, Electronic Technology
A.A., University of the State of New York, 1989; B.S., Southern Illinois University at Carbondale, 1989; M.B.A., University of Memphis, 1995

Patricia Ward, Instructor, English, Spanish
B.S., University of Memphis, 1970; M.A., University of Memphis, 1985

Sarah J. Warrington, Associate Professor, Biology
B.S., University of Memphis, 1962; M.S., University of Memphis, 1972; Ph.D., University of Memphis, 1983

Lois Washington, Associate Professor, Developmental Studies, Reading
B.S., LeMoyné-Owen College, 1975; M.Ed., Miami University, Ohio, 1979

Twyla J. Waters, Instructor, Paralegal Studies
B.A., Franklin College, 1987; J.D., Indiana University Law School, 1990; Licensed Attorney, Indiana, Mississippi, Tennessee

Karen R. Webb, Assistant Professor, Electronic Technology
A.A., Southern Baptist College, 1971; A.A.S., State Technical Institute at Memphis, 1985; B.S.E.T., Memphis State University, 1989; A+ Certified

John Webb, Instructor, Automotive Service Technology
ASE Certified Master Automobile Technician, A.A.S., State Technical Institute, 1998

William G. Weppner, Assistant Professor, Developmental Studies, Mathematics
B.S., University of Buffalo, 1959; M.E.E., University of Oklahoma, 1964

Clemetee Whaley, Associate Professor, Information Technology
A.S., State Technical Institute at Memphis, 1982; B.B.A., University of Memphis, 1988; M.S., University of Arkansas, 1991

Georgia A. Whaley, Associate Professor, Speech
B.A., University of Memphis, 1977; M.A., University of Memphis, 1979

Robert E. Whaley, Professor, Chemistry
B.S., University of Memphis, 1964; Ph.D., University of Memphis, 1975

Rodney E. Whitaker, Associate Professor, English
B.A., LeMoyné-Owen College, 1974; M.A., Memphis State University, 1992

Vita Wicks, Advisor, Developmental Studies
B.S., Howard University, 1979; M.S. Old Dominion University, 1981

George Williams, Professor, Engineering Technology
A.S., Northwest Mississippi Community College, 1961; B.S., Mississippi State University, 1964; M.S.E., University of Alabama, 1971; Registered Professional Engineer

Jimmy E. Williams, Associate Professor, Biology
B.A., University of Memphis, 1967; M.S., University of Memphis, 1970

Darius Y. Wilson, Allied Health Chair and Assistant Professor, Medical Laboratory Technology
B.S.M.T. University of Memphis, 1977; M.A.T., University of Memphis, 1994

Donna S. Wood, Professor, Developmental Studies, Reading
B.S., Fort Hays State University, 1951; M.Ed., University of Memphis, 1968, Ed.D., University of Memphis, 1975

Geoffrey Wood, Assistant Professor, Industrial Engineering Technology
A.A.S., State Technical Institute, 1993; A.A.S., State Technical Institute, 1993; B.S., University of Memphis, 1995; A.A.S State Technical Institute, 1997; M.A. University of Memphis, 1997; M.S., University of Memphis, 2001

Johnny W. Wortham, Professor, Computer Engineering Technology
B.S., University of Memphis, 1972; M.S., University of Memphis, 1973; M.S., University of Memphis, 1974

Gloria Worthy, Associate Professor, Accountancy
B.B.A., University of Memphis, 1973; M.Ed., University of Memphis, 1981

Dagny G. Wright, Assistant Professor, Information Technology
B.S., University of Alabama, 1973; A.A.S., State Technical Institute at Memphis, 1992; M.B.A., Christian Brothers University, 1998; CNA 5.1, Network, A+ Certified

Michael D. Wright, Associate Professor, Information Technology
B.B.A., University of Memphis, 1978; M.S., University of Memphis, 1980; Ph.D., Greenwich University, 1991

Faculty Emeritae/Emeriti

Clinton D. Amos, Professor Emeritus
M.Ed., Pennsylvania State University, 1974

Bondie Armstrong, Professor Emeritus
Ed.D., University of Memphis, 1982

John P. Bacon Jr., Professor Emeritus
M.S., University of Southern Mississippi, 1967

Charles H. Baker, Professor Emeritus
M.B.A., University of Memphis, 1967

Edwin J. Barnes, Professor Emeritus
B.B.A., University of Mississippi, 1955

Anxious E. Bryant, Professor Emeritus
M.S., University of Memphis, 1970

Gay G. Coe, Professor Emerita
M.A., University of Memphis, 1964

J. Paul Dudenhefer, Professor Emeritus
Ph.D., University of Mississippi, 1975

William T. Dugard, Professor Emeritus
M.S., University of Memphis, 1972

Charles O. Eddlemon, Professor Emeritus
M.S., University of Memphis, 1989

Louis French, Associate Professor Emeritus
M.S. Memphis State University, 1988

LaVerne T. Gurley, Professor Emerita
Ph.D., The Union for Experimenting Colleges and Universities, 1976

James D. Gilbert, Professor Emeritus
Ed.D., University of Mississippi, 1966

Marian E. Ham, Professor Emerita
B.A., University of Mississippi, 1977

Margie J. Hobbs, Professor Emerita
Ph.D., University of Mississippi, 1986

John W. Hurd, Associate Professor Emeritus
B.S., Memphis State University, 1956

Walker Hurd, Professor Emeritus
M.A., Memphis State University, 1969

Bette C. Latta, Professor Emerita
M.A., University of Memphis, 1965

F. Cleo Long, Professor Emerita
M.S., University of Iowa

George R. Mackie, Professor Emeritus
M.S., University of Memphis, 1974

Albert E. McBee, Professor Emeritus
A.E., State Technical Institute at Memphis, 1974

George L. Miller, Professor Emeritus
B.S.E.T., Memphis State University, 1987

Clyde Orem, Professor Emeritus
M.B.A., University of Memphis, 1967

Robert C. Osburn, Professor Emeritus
B.S., University of Memphis, 1954

Patricia S. Peebles, Professor Emerita
B.A., Texas Women's University, 1950

Richard W. Phillips, Professor Emeritus
A.S., State Technical Institute at Memphis, 1976

Ruby Jean Powell, Professor Emerita
M.A., University of Tennessee, 1955

Mary Pretti, Professor Emerita
M.B.A., University of Memphis, 1970

Maxine Reed, Professor Emerita
M.A., University of Memphis, 1967

F. Lamar Robertson, Professor Emeritus
B.B.A., University of Memphis, 1972

Charles G. Sneed, Associate Professor Emeritus
M.S., University of Memphis, 1989

Richard L. Spreitzer, Professor Emeritus
M.B.A., University of Memphis, 1974

Janet W. Stockett, Professor Emerita
B.S., University of Memphis, 1957

Mary Lee Strode, Professor Emerita
M.A., University of Memphis, 1966

Administrative Staff

A

Elaine F. Adams, Professor, Interim Director, Center of Emphasis
B.S., University of Memphis, 1969; M.S., University of Memphis, 1980; Ed.D., University of Memphis, 1991

Timothy B. Adams, Computer Operations Specialist, Graphics
B.A., Freed Hardeman University, 1999

LaTonya Alexander, Computer Programmer I, Information Systems
B.S., Austin Peay State University, 1977

Michelle Allen, Purchasing Agent
B.B.A., University of Memphis, 1995

Carmanche S. Amos, Employment Career Specialist, Workforce Development
B.S., University of Memphis, 1999

Shirley Andrews, Research Assistant II, Workforce Development
A.S., State Technical Institute at Memphis, 1990

Patsy Anderson, Director, Gill Center
B.S., Crichton College, 1998

Sherry Arnold, Training Specialist, CEED
M.S., University of Memphis, 1992

Robert Atkins, Employment Career Specialist, Workforce Development
B.S., Xavier University, 1962

B

Angela A. Banks, Coordinator, Job Placement
B.A., Western Illinois University, 1998

Tequilla A. Banks, Research Director, Workforce Development
M.S.S.W., University of Tennessee, 2001

Charlene R. Beach, Assistant Director, CEED
M.A., University of Alabama, 1982

Stephen Beeko, Librarian
Ed.D., Oklahoma State University, 1982

Cheryl A. Bingham, Director, Alumni Affairs and Scholarship Program
M.S., University of Memphis, 1993

Monte Blair, Associate Director, Planning
Ph.D., Duke University, 1966

Vernita Boone, Director, Southeast Center
B.A., Western Illinois University, 1988

Ella Bouie, Employment Career Specialist, Workforce Development
B.S., Mississippi State University, 1983

Carol Brown, Administrative Assistant to the President

Leo Brown, Sr., Director, Public Safety

Patricia Burnette, Assistant Director, CEED
B.A., Kentucky State University, 1989

Calvin Burns, Director, Advertising and Media Relations
B.S., University of Memphis, 1974

Terry Burns, Systems Analyst II, Information Systems
A.S., State Technical Institute at Memphis 1971

George W. Burton, Training Specialist
M.B.A., University of Memphis, 1991

C

Tony Calhoun, Financial Aid Counselor; Financial Aid
B.S., Lane College, 1999

William J. Cavanaugh, Director, Career Services
M.S., University of Memphis, 1983

William S. Chai, Systems Analyst I, Information Systems
M.S., University of Memphis, 1982

Patsy Christenberry, Director, Application Services
M.S., University of Memphis, 1996

Ralph B. Chumbley, Executive Director, Business and Education Collaboratives
Ph.D., Florida State University, 1976

John Churchill, Director, Computer and Technical Training, CEED
B.A., Western Illinois University, 1989

Willie D. Clark, Director, Upward Bound
B.A., University of Illinois, Chicago, 1990

Daphne Cole, Employment Specialist, Workforce Development
B.S., University of Tennessee at Martin, 1996

Sarah Cole, Employment Career Specialist, Workforce Development
B.S., Southern Illinois University at Carbondale, 1993

Lila R. Collins, Admissions Counselor/ Recruiter
B.S. University of Tennessee at Chattanooga, 1991

Taheera A. Copeland, Employment Career Specialist, Workforce Development
B.A., Lemoyn-Owen College, 2001

Charles Cossar, Bursar
M.B.A., University of Memphis, 1998

Miki Craft, Director, Professional Re-entry Education Program
B.P.S., University of Memphis, 1989

Verna S. Crockett, Counselor
Ed.S., University of Memphis, 1989

Dale C. Cummings, Director, Evening/ Weekend College
Ed.D., Utah State University, 1979

John C. Cummings, Director, Counseling Center
Ph.D., University of Mississippi 1991

D

Loretta Dale, Director, Training, Mid-South Quality Productivity Center
M.S.E., Arkansas State University, 1991

Debra T. Davis, Case Manager, Workforce Development
B.S., Lambuth University, 1980

Timothy Davis, Assistant Director, CEED
B.S., University of Memphis, 1979

Trammell J. Davis, Coordinator, Veterans Affairs
B.S. Tennessee State University 1992

Gloria Dixon, Computer Programmer/ Analyst, Information Systems
B.S., Alcorn State University, 1975

Michael Dote, Counselor, Veterans Affairs
B.S., University of New York, 1988

Vanessa R. Dowdy, Assistant Director, Recruiting
B.S., University of TN at Chattanooga, 1983

Shirley Dozier, Administrative Assistant to Vice Provost
B.S., Crichton College, 1996

Marilyn Duncan, Assistant Director, Public Relations
B.A., Lincoln University, 1968

E

Vincent L. Eason, Director, Budget and Financial Planning
B.S. Tennessee Technological University, 1984

Marilyn A. Everett, Director, Fiscal Operations
B.B.A., University of Memphis, 1967

F

Robert Fenner, Case Manager Specialist, Workforce Development
B.S., University of Tennessee at Chattanooga, 1975

Jacquelin Fields, Technician, Medical Laboratory Technology
A.A.S., Shelby State Community College, 1977

Donald C. Fisher, Executive Director, Mid-South Quality Productivity Center
Ph.D., University of Mississippi, 1986

Harry Flowers, Director, Infrastructure, Information Systems
B.S., Rhodes College, 1982

Maxine Ford, Assistant Director, Counseling Center
M.A., Eastern Michigan University, 1971

Robin Franklin, Research Assistant II, Workforce Development
A.S., State Technical Institute at Memphis, 1991

Dana French, Director, CISCO Regional Academy, CEED
M.Ed., University of Arkansas at Little Rock, 1996

G

Mosesella Garrett, Employment Career Specialist, Workforce Development
B.A., Lemoyne-Owen College, 1990

Annie Garvin, Director, Media Services
BBA, University of Memphis, 1995

Jeanetta Grandberry, Accountant III, Accounts
M.S., University of Arkansas, 1993

Peggy Griffith, Administrative Assistant
B.A. Harding University, 1961

Selena Y. Grimes, Director, Institutional Research
M.S. University of Memphis, 1995

Charlotte Grimm, Assistant Director, Financial Aid
M.S., University of Memphis, 1997

Jeanette P. Gunter, Executive Assistant to the Provost/Executive-Vice President
M.Ed., University of Memphis, 1974

Conrad Guthrie, Assistant Director, Physical Plant
BSEE, Penn State University, 1951, Registered Professional Electrical Engineer, State of Oklahoma, 1979

H

Michael Haire, Training Specialist, CEED
M. Div., Southwestern Seminary, 1984

Kimberly Hamilton, Coordinator, FCI Program, Workforce Development
B.A., University of Memphis, 1995

Clay Hancock, Manager of Systems and Networks, Information Systems
B.S.E.T. University of Memphis, 1999

Marcia R. Hancock, Assistant Director, Application Services
B.S.E.T. University of Memphis, 1989

Joy M. Hardy, Executive Director, Workforce Development,
B.A., Lemoyne-Owen College, 1969; M.S. Illinois Institute of Technology (Chicago), 1971;
Ph. D., University of Mississippi, 2000

William H. Haro, Case Manager Specialist, Workforce Development
B.S., Jackson State University, 1966

Charles Harper, Counselor/Advisor
M.S., Tennessee State University, 1974

Calvin L. Harris, Assistant Director, Testing Center
B.A., Western Illinois University, 1999

Lana Harris, Purchasing Agent
A. A., Shelby State Community College, 1993

John "Murray" Harris, Director, Physical Plant

Zachary T. Harris, Employment Career Specialist, Workforce Development,
B.S., Lemoyne-Owen College, 1998

Charles Henderson, Director, ACT Center
B.A., Tougaloo College, 1982

Lisa Henriksen, Academic Webmaster
A.A.S. State Technical Institute at Memphis, 1997

Robin Holliday, Financial Analyst II, Fiscal Operations
B.S. LeMoyne-Owen College, 1982

Anne Howard, Associate Librarian
M.L.S., Simmons College, 1975

Sherry L. Howard, Employment Career Specialist, Workforce Development
B.A., Lemoyne-Owen College, 2001

Albert V. Hudson, Counselor/Recruiter
M.S., Tennessee State University, 1973

Alpha "Christy" Hunsucker, AMATYC Accounting Director
B.S., Christian Brothers University, 1999

Dorothy Blue-Hurt, Coordinator, Learning Center at Union
A.S., Shelby State Community College, 1986

Deloris Isabel, Supervisor, Fiscal Operations
B.A., LeMoyne-Owen College, 1967

J

Dwelitte (Wanda) Jackson-McDoe, Accounting Clerk III, Workforce Development
A.A.S., State Technical Institute at Memphis, 1984

Ronald James, Computer Programmer/Analyst, Information Systems
B.B.A., University of Memphis, 1967

Harold Jeans, Assessment Counselor, Workforce Development
B.S., University of Arkansas at Pine Bluff, 1972

Marsha C. Jenkins, Counselor
M.A.T., University of Pittsburgh, 1974

Belinda Johnson-Martre, Counselor/Advisor
M.S., Alcorn University, 1989

Anniebell Johnson, Manager, Workforce Development

Teresa A. Jones, Associate Director, Admissions and Records
M.P.A., Grambling State University, 1993

K

Barbara Kernan, Assistant Director, Southeast Center
B.A. Arkansas Tech University, 1971

Betty Kimbrough, Counselor/Advisor
B.A., LeMoyne-Owen College, 1975

Deborah King, Computer Programmer/Analyst, Information Systems
B.B.A., University of Memphis, 2000

L

Raymond R. Lagesse, Director, Academic Support
Ph.D., Saint Louis University, 1989

Felicia D. Lee, Director, Tech Prep
M.A.T., University of Tennessee at Knoxville, 1993

Ruth Lemon, Accountant III, Fiscal Operations
A.A.S., State Technical Institute at Memphis, 1999

Sheila Lott, Research Assistant, Workforce Development
A.A.S., State Technical Institute at Memphis, 2000

M

Alvin B. Makowsky, Programmer/Analyst
B.S., University of Memphis, 1969

Rosalynne O. Martin, Admissions Counselor/Recruiter
B.S., University of Memphis, 1999

Scott Martin, System Analyst I, Computer Information Systems
B.B.A., University of Memphis, 1989

Andrea Martre, Counselor/Coach
A.A.S., Shelby State Community College, 1993

Elisa C. Marus, Interim Executive Director, Community Relations and Marketing
M.S., University of Tennessee, 1982

Regina Massey-Hicks, Librarian
M.S., Atlanta University, 1991

Amelia Mattix, Accountant III, Fiscal Operations
B.B.A., University of Memphis, 1980

Marlon McBride, Employment Center Specialist, Workforce Development
B.S., Tougaloo College, 2001

Shirley W. McCool, Senior Counselor, Academic Advising Center
M.S., University of Memphis, 1991

Charles McFall, Systems Analyst, Workforce Development
B.S., Arkansas State University, 1979

John H. C. McCormick, Interim Executive Director, CEED
B.A., Seton Hall University, 1960

James K. McCune, Assistant Director, Human Resources
B.B.A., University of Memphis, 1984

Bernard McGhee, Director, Restricted Fund Accounting
M.S., University of Arkansas, 1996

Pat Meeks, Executive Director, Grants
M.A., Indiana University, 1969

Cindy Meziere, Assistant Director, Admissions & Records
B.S., Embry-Riddle University, 1997

Dan Miller, Director, Financial Aid
M. Ed., Middle Tennessee State University
1983

Jarchella Y. Miller, Employment Career Specialist, Workforce Development
B.S., University of Memphis, 1995

Glenda F. Mitchell, Manager, Workforce Development
M.A., University of Memphis, 1966

Cheryl Morales, Employment Career Specialist, Workforce Development
B.B.A., Memphis State University, 1992

Debra D. Morgan, Employment Career Specialist, Workforce Development
B.S., Lemoyne-Owen College, 1983

Don Myers, Interim Coordinator, Learning Center, Macon
A.S., State Technical Institute at Memphis,
1998

Wilma Myers, Director, CEED
M.A., Pepperdine University, 1977

N

Freda Neely, Coordinator, Child Care Resources

Dawn Newberry, Assistant Director, Graphics
B.P.S., University of Memphis, 1994

Cynthia Newman, Training Specialist, CEED
B.S., University of Memphis, 1973

O

Pat O'Brien, Coordinator, Advertising and Media Relations
B.S., University of Memphis, 1957

Michael Old, Executive Director, Information Systems
M.S., University of Memphis, 1995

P

John R. Palmer, Client Services Manager, Information Systems
M.S. University of Memphis, 1975

Linda Palmer, Assistant Director, CEED
M.A., University of Phoenix, 1998

Mary Palmer, Director, Campus Kids Corner
M.S., Nova-Southwestern University, 1991

Nathaniel Parker, Executive Director, Business
B.A., University of Memphis, 1988

David Penna, Director, Program Planning, CEED
M.B.A., University of Memphis, 1995

Kim Perry-Rittman, Counselor/Advisor
B.S., Bethune-Cookman College, 1989

Carolyn A. Phillips, Employment Career Specialist, Workforce Development
B.A., Lemoyne-Owen College, 1983

Ruth Prince, Employment Career Specialist, Workforce Development
M.A., Sangamon State University, 1994

R

Susan Rains, Executive Director, Finance
B.F.A., Memphis Academy of Art, 1972

Amber Renfro, Case Manager Specialist II, Workforce Development
B.A., University of Memphis, 1998

Vickie S. Reyes, Manager, Workforce Development
M.S., University of Memphis, 2000

Benjamin Rhodes, Advisor, Counseling and Advising
B.S., Athens State College, 1987

D. Diane Richardson, Director, Human Resources
B.S., Union University, 1988

Canty Robbins, Director, Purchasing and Auxiliary Services
M.S., University of Arkansas, 1993

Nevin Robbins, Director, Planning and Research
Ph.D., Florida State University, 1977

Jacqueline Robinson, Research Assistant, Workforce Development
A.A.S., State Technical Institute at Memphis,
1999

Sherman Robinson, Employment Career Specialist, Workforce Development
B.B.A., Jackson State University, 1996

Stanley Robinson, Assistant Director, Fiscal Operations
B.S., Rust College, 1976

Lori Ross, Employment Career Specialist, Workforce Development
B.B.A., University of Memphis, 1991

William T. Ross, Accountant I
M.Ed., University of Memphis, 1973

Jacquelyn Rudd, Supervisor, Bursar's Office
B.S., Texas College, 1971

S

Verties Sails, Athletic Director
M.Ed., University of Memphis, 1968

Beverly Sakyi, Counselor/Advisor
M.S., University of Memphis, 1978

Kariem-Abdul Salaam, Families First Director, Workforce Development
B.S., A & M University, 1971

Rose Sanders, Case Manager Specialist, Workforce Development
B.P.S., Memphis State University, 1982

Lillian D. Shannon, Assessment, Workforce Development
M.Ed., University of Memphis, 1974

Amy D. Shead, Manager, Technical Support
B.A., University of Memphis, 1994

Christine Shott, AMATYC Publications Director
B.B.A., Texas Tech University, 1985

Yolanda Smith, Director, Payroll
A.A.S., State Technical Institute at Memphis,
1984

Vivian W. Stewart, Associate Director, Library Services
M.L.S., Atlanta University, 1984

Brian Stuckey, Employment Career Specialist, Workforce Development
B.S., Middle Tennessee State University, 2001

Tina Studaway, Associate Director, Financial Aid
B.B.A., University of Memphis, 1996

Deborah Sturdivant, Training Manager, Workforce Development
B.S., Lane College, 1987

Rita Sweeney, Case Manager Specialist
B.A., University of Memphis, 1995

T

Al E. Taylor, Employment Career Specialist, Workforce Development
B.S., Austin-Peay State University, 1999

Harry Taylor, Director, Whitehaven Center
B.A., Lemoyne-Owen College, 1974

Tamika White Taylor, Employment Career Specialist, Workforce Development
B.B.A., Lemoyne-Owen College, 1999

Melissa Terry, Computer Programmer Analyst
B.S., Middle Tennessee State University, 1994

Gail A. Thomas, Director, Testing Center
M.S., University of Memphis, 1989

Dwight C. Thomas, Employment Career
Specialist, Workforce Development
B.S., Alcorn State University, 1977

Fred Thompson, Workkeys Manager,
Workforce Development
B.S., Indiana University, 1979

Pat Thompson, Administrative Assistant to
Provost/Executive Vice-President

Melody Thornton, Assessment Counselor,
Workforce Development
B.A., University of Memphis, 2000

Steve Turri, Media Technician
A.A.S., State Technical Institute at Memphis,
1980

V

Beverly S. Vance, Office Director, AMATYC
B.S., Jacksonville State University, 1979

Jean Atkeison Vernon, Executive Director,
Institutional Development
M.S., University of Memphis, 1991

W

Sheree B. Ware, Administrative Secretary to
the Presidebnt

Claude Woody Wall, Network Manager
A.A.S., State Technical Institute at Memphis
1992

Ray Ward, Director, Millington Center
M.S., University of Arkansas, 1988

James Warwick, Specialist
B.S., University of Memphis, 1997

Randy Wasson, Director, Director,
AmeriCorps

Rebecca Wasson, Director, Grants Manage-
ment
Ed.D., University of Memphis, 1996

Forrestine Weed, Industry-Specific Coordina-
tor, Workforce Development
B.S., Lemoyne-Owen College, 1966

Barbara Wells, Associate Director, Admis-
sions and Records
B.S., Embry-Riddle University, 1998

Ron Wells, Associate Director, CEED
B.S., Southern Illinois University, 1997

Vita Wicks, Advisor, Developmental Studies
M.S.Ed., Old Dominion University, 1981

Jimmy Wiley, Associate Director, Advising,
Counseling and Articulation
Ed.D., University of Mississippi, 1983

Brenda J. Williams, Associate Director, Career
Services
M.S. University of Memphis, 2000

Dierdri Williams, Technical Training
Specialist
B.S., Memphis State University, 1988

Sharlene Williams, Associate Director, CEED
M.S., University of Memphis, 1982

Adriann W. Wilson, Manager, Workforce
Development
M.Ed., University of Memphis, 1992

Samella Wilson, Accountant I, Fiscal
Operations
M.B.A., Delata State University, 1999

Thalia Wilson, Counselor/Recruiter
B.S., Tennessee State University, 1992

Erin Wilkinson, Computer Operations
Specialist, Graphics
.B.F.A., Arkansas State University, 1999

Patricia C. Womble, Training Specialist,
Medical Transcription
B.S., University of North Carolina

James Woods, Client Services Manager,
Information Systems
A.S., State Technical Institute at Memphis,
1985

Y

Kenny Yarbrough, Career Counselor,
Whitehaven Center
B.S., University of Tennessee at Martin, 1998

Josef A. Young, Senior Counselor, Counseling
Center
Ph.D., Southern Illinois University, 1981

LaDonna Young, Director, Gearup (MAPS)
B.A., Christian Brothers University, 1995

Administrators Emeriti

M. Douglas Call, President Emeritus
Ed.D., West Virginia University, 1973

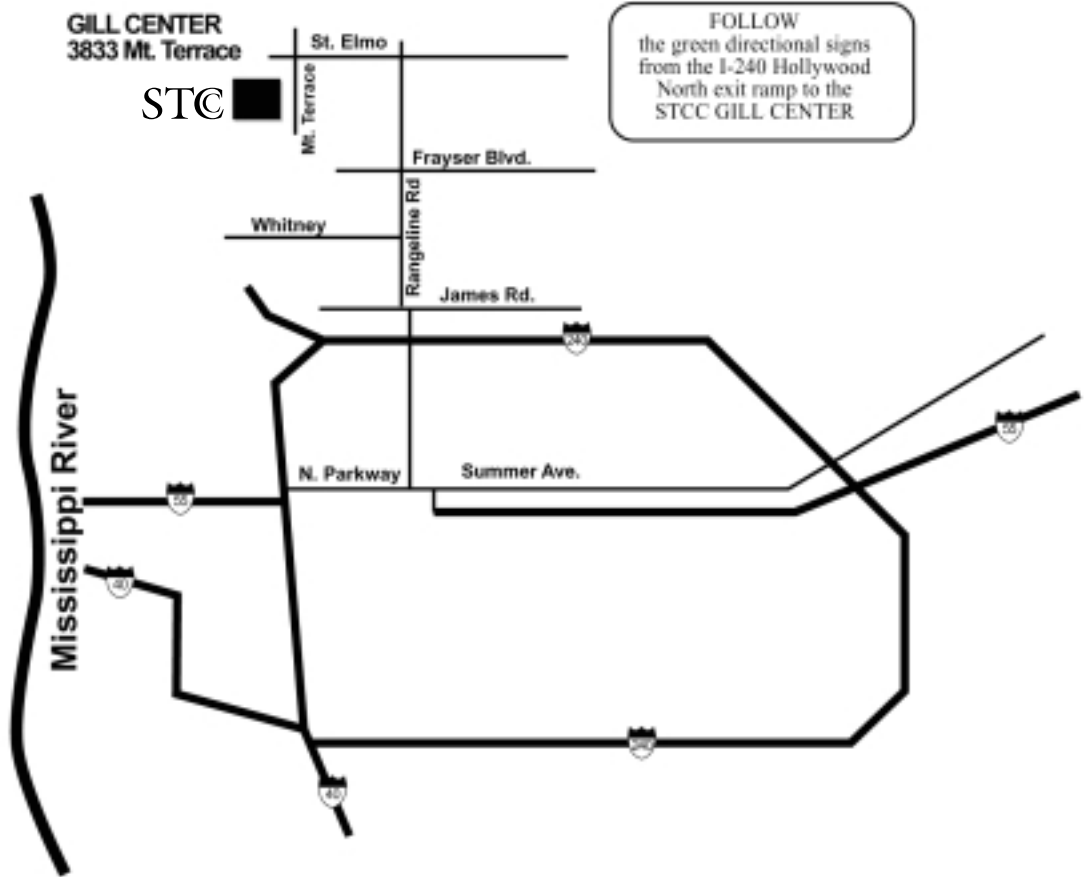
Thurman H. Jackson, Dean Emeritus
M.S., University of Memphis, 1966

Charles M. Temple, President Emeritus
Ed.D., University of Tennessee, 1970

SOUTHWEST

TENNESSEE COMMUNITY COLLEGE

Elbert T. Gill Center
3833 Mountain Terrace □
Memphis, TN □
(901) 333-5970



Gill Center Map

SOUTHWEST

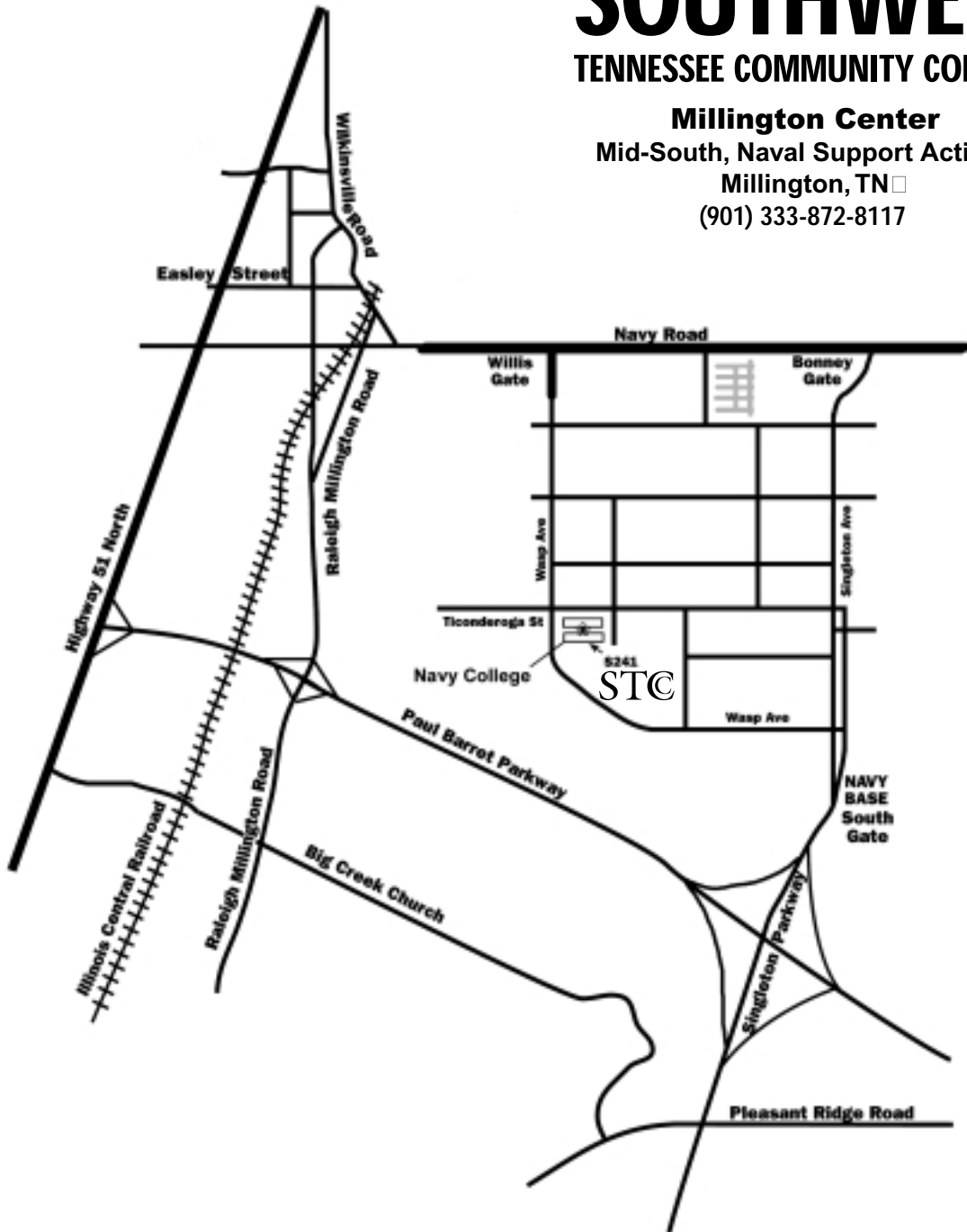
TENNESSEE COMMUNITY COLLEGE

Millington Center

Mid-South, Naval Support Activity □

Millington, TN □

(901) 333-872-8117



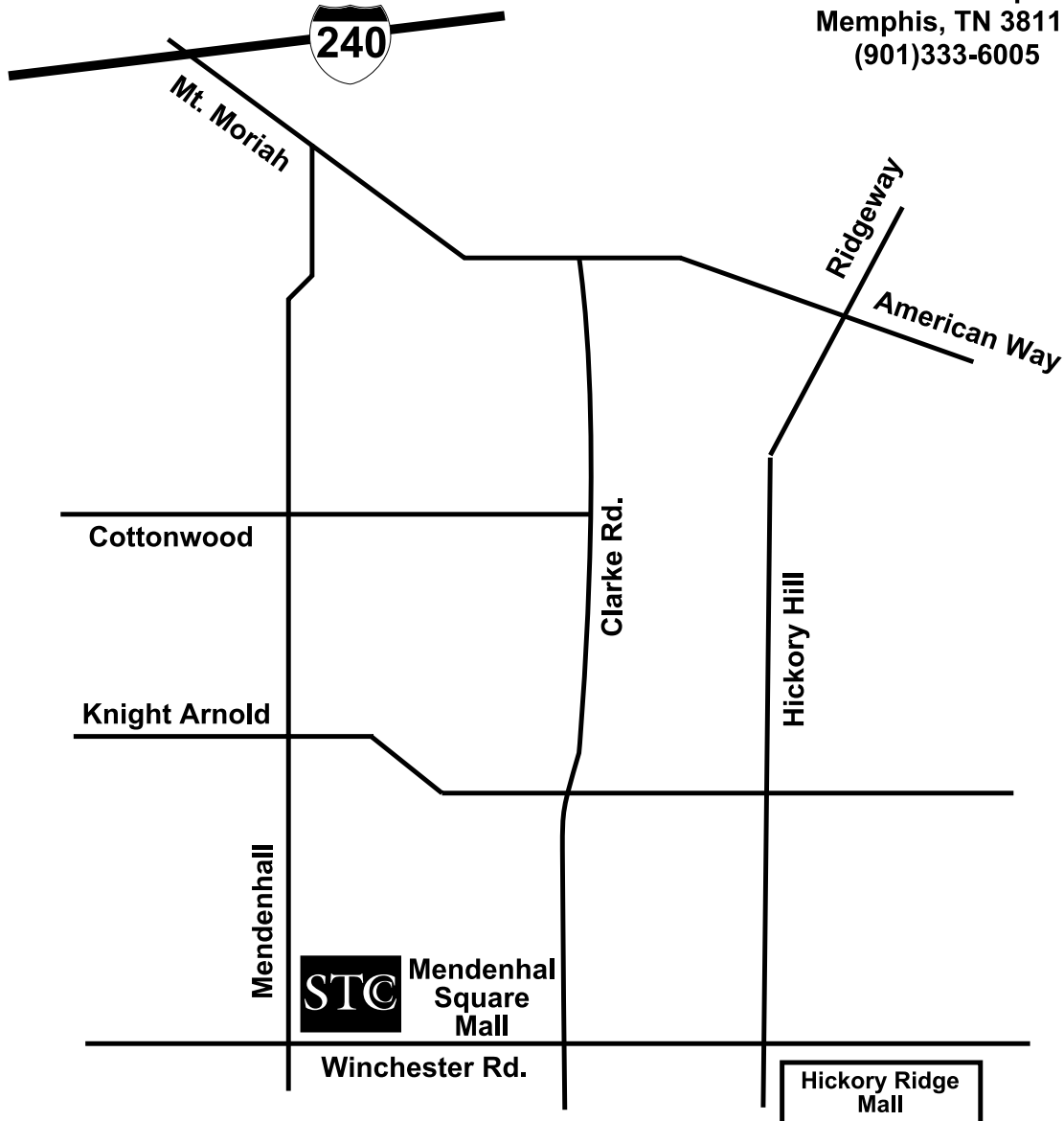
Millington Center Map



SOUTHWEST

TENNESSEE COMMUNITY COLLEGE

Southeast Center
5396 Mendenhall Square Mall
Memphis, TN 38115
(901)333-6005



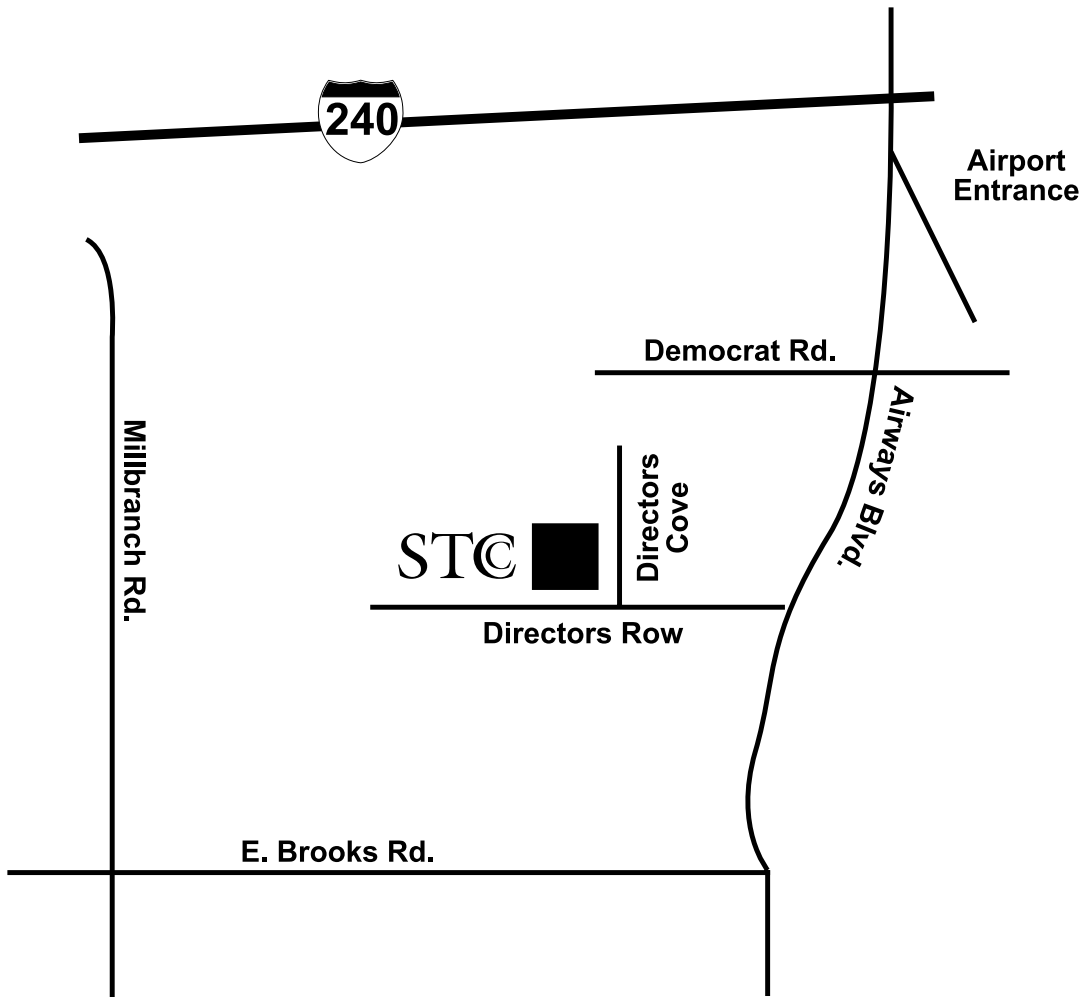
Southeast Center



SOUTHWEST

TENNESSEE COMMUNITY COLLEGE

Whitehaven Center
3035 Directors Row
Memphis, TN 38131-0420
(901)398-0901



Whitehaven Center

DIRECTORY OF PROGRAMS

Associate of Applied Science Degree

| | |
|--|---------|
| Accountancy | 63 |
| Accountancy–Computer Concentration | 64 |
| Accountancy–Taxation Concentration | 63 |
| Architectural Engineering Technology | 65 |
| Automotive Service Technology | 65 |
| Automotive Service Technology, Ford | 66 |
| Automotive Service Technology, General Motors | 66 |
| Business and Commerce–Banking and Finance | 67 |
| Business and Commerce–Electronic Business Management | 67 |
| Business and Commerce–Human Resource Management | 68 |
| Business and Commerce–Logistics/Transportation Mngmnt | 68 |
| Business and Commerce–Management Concentration | 69 |
| Business and Commerce–Quality and Productivity | 70 |
| Chemical Engineering Technology | 73 |
| Civil/Construction Engineering Technology | 73 |
| Computer Engineering Technology | 74 |
| Court Reporting | 74 |
| Criminal Justice Studies–Corrections Concentration | 112 |
| Criminal Justice Studies–Police Concentration | 113 |
| Dietetic Technician | 126 |
| Early Childhood Education | 115 |
| Electrical Engineering Technology | 75 |
| Electronic Technology | 75 |
| Fire Science | 76 |
| General Technology, Emphasis in Business | 70 |
| General Technology, Emphasis in Technology | 71 |
| Geographic Information Systems–Business Concentration | 76 |
| Geographic Information Systems–Engineering Support | 77 |
| Graphic Arts Technology, Graphic Arts Production | 77 |
| Graphic Arts Technology, Interactive Media Production | 78 |
| Hospitality Management–Culinary Arts Concentration | 78 |
| Hospitality Management–Food and Beverage Management | 79 |
| Hospitality Management–Hotel/Motel Management | 79 |
| Hospitality Management–Travel and Tourism | 80 |
| Industrial Engineering Technology | 80 |
| Industrial Maintenance Technology | 81 |
| Industrial Maintenance Technology–Electromechanical | 81 |
| Information Technology–Emerging Technologies | 85 |
| Information Technology–Non-Programming Communication | 85 |
| Information Technology–Non-Programming IT Generalist | 86 |
| Information Technology, Procedural | |
| Programming – AS400 Specialty | 82 |
| Information Technology, Procedural | |
| Programming – COBOL/CICS Specialty | 82 |
| Information Technology–Programming | |
| Concentration Component Programming Concentration | 83 |
| Information Technology–Programming Concentration | |
| UNIX Concentration | 84 |
| Information Technology–Programming Concentration | |
| Visual Desktop Application–Development Concentration | 84 |
| Information Technology, Web Applications | |
| Development/Programming Concentration | 83 |
| Landscape and Turfgrass Management–Landscape | |
| Management Concentration | 86 |
| Landscape and Turfgrass Management–Turfgrass | |
| Management Concentration | 87 |
| Mechanical Engineering Technology | 87 |
| Medical Laboratory Technician | 134 |
| Mid-Management | 69 |
| Nursing | 128-130 |
| Office Administration–Financial Administrative Assistant | 88 |
| Office Administration–General Administrative Assistant | 88 |
| Office Administration–Insurance Administrative Assistant | 89 |
| Office Administration–Legal Administrative Assistant | 89 |
| Office Administration–Medical Administrative Assistant | 89 |
| Paralegal Studies, Concentrations: Real Estate, Corporate and | |
| Banking, Litigation, General Practice | 91 |
| Physical Therapist Assistant I | 31 |
| Radiologic Technology | 132 |
| Telecommunications Engineering Technology | 92 |

Associate of Arts Degree

| | |
|----------------------------------|-----|
| Art | 98 |
| Black Studies | 101 |
| Education | 114 |
| English and Literature | 100 |
| French or Spanish | 100 |
| History | 101 |
| Liberal or General Studies | 102 |
| Music | 99 |
| Philosophy | 103 |
| Political Science | 104 |
| Pre-Law | 105 |
| Psychology | 110 |
| Public Administration | 106 |
| Public Affairs | 107 |
| Social Work | 108 |
| Sociology | 109 |
| Speech and Theater | 99 |

Associate of Science Degree

| | |
|-------------------------------------|-----|
| Allied Health Science | 125 |
| Business Administration | 72 |
| Criminal Justice | 111 |
| Early Childhood Education | 115 |
| Education | 114 |
| Engineering | 124 |
| Health and Physical Education | 116 |
| History | 102 |
| Human Services116 | |
| Liberal or General Studies | 103 |
| Mathematics | 124 |
| Natural Sciences | 125 |
| Philosophy | 104 |
| Political Science | 105 |
| Pre-Law | 106 |
| Psychology | 111 |
| Public Administration | 107 |
| Public Affairs | 108 |
| Social Work | 109 |
| Sociology | 110 |

Technical Certificate of Credit

| | |
|---|--------|
| Accounting | 64 |
| Caregiver Administration | 117 |
| Computer Software Specialist | 90 |
| Early Childhood Teaching | 118 |
| Emergency Medical Technician, Basic | 136 |
| Food Preparation and Safety | 127 |
| Laboratory Phlebotomy Technician | 135 |
| Landscape Management | 92 |
| Manufacturing Fundamentals | 93 |
| Manufacturing Graphics | 94 |
| Paramedic | 136 |
| Pharmacy Technician | 137 |
| Quality and Productivity (Advanced) | 39, 71 |
| Quality and Productivity (Basic) | 39, 71 |
| Quality Assurance | 94 |
| Retailing and Merchandising | 72 |
| Substance Abuse Counseling | 118 |
| Turfgrass Management | 93 |

Academic Certificate of Credit

| | |
|-------------------------|-----|
| Arts and Sciences | 117 |
| Police Science | 117 |

INDEX

| | | | |
|--|-------|--|---------|
| A.A. and A.S. General Education Core Courses | 55 | Charges and Fees | 24 |
| A.A.S. General Education Core Courses | 54 | Child Care Fee, Campus | 25 |
| Academic Advising | 30 | Cisco Networking Academy Program | 44 |
| Academic Calendar (Defined) | 19 | CIW – Certified Internet Webmaster | 38 |
| Academic Calendar | 6 | Class Changes – Computer Resource Center | 44 |
| Academic Fresh Start | 13 | Class Overloads, Approval for | 21 |
| Academic Honors | 18 | Classroom Behavior | 21 |
| Academic Honors, Commencement | 19 | CLEP – Level Examination Program | 20 |
| Academic Load | 19 | Closed Classes, Approval to Enroll in | 21 |
| Academic Misconduct | 19 | Clubs and Organizations | 35 |
| Academic Policies and Procedures | 19 | College Calendar | 6 |
| Academic Probation | 18 | College Level Examination Program (CLEP) | 20 |
| Academic Resource Center | 33 | Commencement Academic Honors | 19 |
| Academic Service Scholarships | 28 | Community Programs | 43 |
| Academic Standards for Allied Health Sciences and Nursing | 18 | Community Service/Lifestyle Programs | 43 |
| Academic Standing and Retention | 18 | Computer Competency Requirements for Graduation | 23 |
| Academic Suspension | 18 | Computer Labs – Computer Resource Center | 44 |
| Academic Suspension, Appeal of | 18 | Computer Resource Center | 43-44 |
| Accountancy Studies | 61 | Computer/Information Technology and Graphic Arts Technology ... | 61 |
| Accreditation | 4 | Conferences/Workshops/Seminars/Public Forums | 43 |
| Achieve Global (formerly Zenger-Miller) | 40 | Confidentiality of Student Records | 16 |
| Administration Directory | 196 | Continuing Education and Economic Development (CEED) | 13 |
| Administrators Emeriti | 207 | Continuing Education and Economic Development (CEED) | 37 |
| Admission and Retention Procedures, Health Sciences | 123 | Continuing Education and Economic Development Center Policies . | 42 |
| Admission of Non-degree Students to Admission Status | 12 | Cooperative Education | 30 |
| Admission of Transfer Students | 11 | Core Courses, A.A. and A.S. General Education | 55 |
| Admission to Nursing Programs | 12 | Core Courses, A.A.S., General Education | 54 |
| Admissions | 9 | Core Performance Standards for Admission and Progression | 12 |
| Advanced Placement (AP) Examination | 19 | Corporate Training | 37 |
| Alternative Credit | 19-21 | Counseling for Students with Disabilities | 31 |
| Alternative Standards for Degree Admission | 12 | Counseling, Advising and Articulation Centers | 31 |
| Alumni Association | 35 | Course Descriptions Introduction | 138 |
| AmeriCorps | 45 | Course Descriptions | 139-195 |
| AP (Advanced Placement) Exam | 19 | Course Prerequisites and Co-Requisites | 21 |
| Appeal of Academic Suspension | 18 | Courses Available Online | 36 |
| Application Data, Verification | 27 | CPS – Certified Professional Secretary Program | 38 |
| Application Dates, Financial Aid | 27 | Credit, CEU and Non-Credit Opportunities (Basic Skills Training).. | 42 |
| Application Deadlines and Admission Dates, Health Sciences | 122 | Credits, Transfer | 17 |
| Application Fee | 25 | DACUM | 48 |
| Application for Financial Aid | 27 | Dean’s List | 19 |
| Approval for Class Overloads | 21 | Deferred Payment, Tuition and Maintenance Fees | 24 |
| Approval to Enroll in Closed Classes | 21 | Degree Admission, Alternative Standards for | 12 |
| Armed Services (Alternative Credit) | 19 | Degree Admission, Undergraduate | 10 |
| Associated Builders and Contractors, CEED Partnership | 39 | Degree and Certificate Admission Requirements | 9 |
| Audit and No-Credit Admission | 12 | Degree and Certificate Programs Directory | 214 |
| Baccalaureate Degree, Preparing for | 97 | Degree Requirements for Graduation | 23 |
| Basic Skills Training | 42 | Degrees, Certificates, Diploma 9 (Graduation) | 22 |
| Business Administration Studies | 61 | Developmental Studies | 99 |
| Business and Industry, Services for | 48 | Directory of Degree and Certificate Programs | 214 |
| BUSINESS, CAREER STUDIES AND | | Directory to Course Descriptions | 138 |
| TECHNOLOGIES DIVISION | 59 | Directory, Business, Career Studies and Technologies | 60 |
| Business-Education Collaboratives | 45 | Directory, Liberal Studies and Education | 96 |
| Calendar | 6 | Directory, Mathematics, Natural Sciences and Health Sciences | 120 |
| Campus Access Fee | 25 | Disabilities, Counseling for Students with | 31 |
| Campus Child Care Fee | 25 | Distance Learning | 35 |
| Career Assessment, Workforce Development Center | 46 | DUCKS Student Tutors, Financial Aid | 28 |
| Career Development | 3 | Early Admission of First-Time Freshmen | 11 |
| Career Services | 30 | Economic Development | 38 |
| Career Studies | 61 | Eligibility to Participate in Graduation | 22 |
| Catalog Limitations (for Graduation) | 22 | Employment and Career Services, Workforce Development Center . | 47 |
| CEED Partnerships | 39 | Engineering Technologies | 62 |
| Certificate and Degree Admission Requirements | 9 | Evening and Weekend College | 37 |
| Certificate and Degree Programs Directory | 214 | Examination and Testing Fees | 24-25 |
| Certificate of Credit Requirements for Graduation | 24 | Experiential Learning (Alternative Credit) | 20 |
| Certifications – Computer Resource Center | 44 | Faculty Directory | 197 |
| Certifications | 38 | Faculty Emeritae/Emeriti | 203 |
| Certified Internet Webmaster (CIW) | 38 | Families First | 46 |
| Certified Professional Secretary (CPS) Program | 38 | Fees and Charges | 24 |
| CEUs – Continuing Education Units | 43 | Financial Aid Refund and Repayment Policy | 29 |
| Challenge Exam – Procedures | 20 | Financial Aid | 27-29 |
| Challenge Examination (Alternative Credit) | 20 | First-Time Freshmen, Early Admission of | 11 |
| Change of Major | 21 | Foundation Scholarships | 28 |
| Change of Registration | 14 | GED – General Education Development Preparation | 42 |
| | | GED Preparatory Student | 13 |
| | | General Admissions | 9 |

| | | | |
|--|-----------------|---|--------|
| General Education A.A. and A.S. Core | 55 | Personal Information (Name, Address, Telephone Number Changes) | 21 |
| General Education A.A.S. Core | 54 | Planning for Transfer | 97 |
| General Education Development (GED) Preparation | 42 | PREP – Professional Re-entry Education Program | 47 |
| General Education Outcomes | 52 | Preparing for Baccalaureate Degree | 97 |
| General Education Program | 53 | Prerequisites and Co-Requisites | 21 |
| General Education | 52 | Prison Education Program (PEP) | 47 |
| Grade Appeals | 18 | Probation, Academic | 18 |
| Grading System | 17 | Professional Non-credit Continuing Education Units (CEUs) | |
| Graduate and Professional Degree Admission | 12 | Professional Re-entry Education Program (PREP) | 47 |
| Graduation Ceremony | 22 | Professional/Technical Licensing | 40 |
| Graduation Fee | 25 | Programs, Directory to | 138 |
| Graduation Procedures | 22 | Provisions for All TBR Institutions | 9 |
| Graduation | 22 | Provisions for Southwest Tennessee Community College | 9 |
| Graduation, Computer Competency Requirements for | 23 | Public Forums/Conferences/Workshops/Seminars | 43 |
| Health Sciences Admission and Retention Procedures | 123 | Quality and Productivity Certificate Programs | 39 |
| Health Sciences Application Deadlines and Admission Dates | 123 | Quality and Productivity Technical Certificate (Advanced) | 39, 71 |
| Help Line – Computer Resource Center | 43 | Quality and Productivity Technical Certificate (Basic) | 39, 71 |
| High School Deficiencies, Removing for A.A. and A.S. Degrees | 23 | Quality and Productivity Training, other | 39 |
| History | 3 | Quality Assurance Certificate | 38 |
| Honors Academy | 18 | Real Estate | 40 |
| How to Register | 14 | Refund and Repayment Policy, Financial Aid | 29 |
| ID Replacement Fee | 25 | Refund Policy – CEED Center | 43 |
| Independent Electrical Contractors, CEED Partnership | 39 | Refund Policy – Computer Resource Center | 44 |
| Independent Study (Alternative Credit) | 21 | Refunds | 26 |
| Industrial and Environmental Technologies | 62 | Regents Online Degree Program | 36 |
| Institutional Notice | 5 | Regional Alliance for Workforce Development | 46 |
| Interactive Classroom | 37 | Registering to Audit a Course | 14 |
| Interactive Videoconferencing | 48 | Registration Information – CEED Center Policies | 42 |
| Job Placement Services | 30 | Registration Information – Computer Resource Center | 44 |
| Landscape Management Certificate | 41, 92 | Registration Periods | 14 |
| Landscaping and Horticulture | 41,86-87, 92-93 | Registration | 14 |
| Late Registration Fee | 25 | Registration, Change of | 14 |
| Learning Assistance Center | 32 | Registration, How to | 14 |
| Learning Center, The | 32 | Removing High School Deficiencies for A.A. and A.S. Degrees | 23 |
| LIBERAL STUDIES AND EDUCATION DIVISION | 95 | Requesting a Transcript | 15 |
| Library Fines | 25 | Residency | 13 |
| Library Services | 33 | Retention and Career Advancement Services, | 47 |
| Location – Computer Resource Center | 44 | Satisfactory Academic Progress, Financial Aid | 28 |
| Maintenance and Tuition Fees | 24 | Scholarships | 28 |
| Major, Change of | 21 | Seminars/Public Forums/Conferences/Workshops | 43 |
| MAMP | 48 | Service Members Opportunity College (SOC) | |
| Management/Leadership Training | 40 | (Alternative Credit) | 21 |
| Manufacturing Certificates Program | 38 | Service Scholarships, Financial Aid | 28 |
| Manufacturing Fundamentals Certificate | 38 | Services for Business and Industry | 48 |
| Manufacturing Graphics Certificate | 38 | SOC – Service Members Opportunity College | |
| Maps | 208 | (Alternative Credit) | 21 |
| MAPS/GEAR-UP Programs | 49 | Sources of Financial Assistance | 27 |
| MATHEMATICS, NATURAL SCIENCES AND | | Southwest Advantages | 4 |
| HEALTH SCIENCES DIVISION | 119 | Southwest History | 3 |
| Medical Transcription Program | 41 | Southwest Tennessee Community College, Provisions for | 9 |
| Memphis Light, Gas & Water Division, CEED Partnership | 39 | Special Programs | 35-37 |
| Memphis/Shelby County/State License Preparation | 40 | Student Academic Success Seminar | 19 |
| Mid-South Quality and Productivity Center | 37 | Student Activities | 34-35 |
| Misconduct, Academic | 19 | Student Activity Fee | 26 |
| Mission Statement | 3 | Student Affairs | 30-35 |
| Mission, Mathematics, Natural Sciences and Health Sciences | 121 | Student Ambassador Scholarships | 28 |
| Music Fees | 26 | Student Classifications | 21 |
| Name, Address, Telephone Number Changes | 21 | Student Clubs and Organizations | 35 |
| Non-degree Admission Requirements | 9 | Student Identification Number | 13 |
| Non-degree Admission | 12 | Student Records | 15 |
| Non-degree Students, Admission of to Degree Status | 12 | Student Records, Confidentiality of | 16 |
| Nursing Program Fees | 26 | Supervisory Institute | 40 |
| Nursing Programs, Admission to | 12 | Suspension, Academic | 18 |
| Occupational Safety and Environmental Health Training | 41 | Targeted Programs | 48 |
| Office Administration Studies | 61 | TBR Institutions, Provisions for | 9 |
| Online Courses | 35 | Tech Prep | 45 |
| Options I and I-A, Cooperative Education | 31 | Technical Skills Training | 40 |
| Options II, Technical Scholarship, Cooperative Education | 31 | Technology Access Fee | 26 |
| Orientation | 21 | Telecourses | 36 |
| Outcomes, General Education | 52 | Tennessee Board of Regents | 196 |
| Paralegal Studies | 61 | Testing and Examination Fees | 24-25 |
| Parking Information – Computer Resource Center | 44 | Testing Centers | 33-34 |
| Partnership Preparing for a Regional Workforce | 45 | Training, Workforce Development Center | 46 |
| PEP – Prison Education Program | 47 | Transcript, Requesting | 15 |
| Permanent Student Records | 15 | | |

| | |
|---|--------------|
| Transfer Credits | 17 |
| Transfer Students, Admission of | 11 |
| Tuition and Maintenance Fees | 24 |
| Tuition and Maintenance Fees, Deferred Payment | 24 |
| Turfgrass Management Certificate, | 41, 93 |
| Types of Co-op Schedules, Cooperative Education | 31 |
| Undergraduate Degree Admission | 10 |
| University Parallel Degree Program | 97 |
| Upward Bound | 48 |
| Values | 3 |
| Verification of Application Data, Financial Aid | 27 |
| Veterans Affairs | 30 |
| Web Address | 5 |
| Weekend and Evening College | 37 |
| Withdrawal Policy – CEED Center | 43 |
| Withholding Degree or Certificate (Graduation) | 22 |
| WORKFORCE DEVELOPMENT AND | |
| CONTINUING EDUCATION | 37-49 |
| Workforce Development Center | 46 |
| Workforce Investment Area #13 Youth Council | 45 |
| Workforce Investment Network | 47 |
| WorkKeys Service Center | 48 |
| Workshops/Seminars/Public Forums/ Conferences | 43 |
| Zenger-Miller (now Achieve Global) | 40 |

Notes

Notes
