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2003–2004 Academic Calendar

August 7–22  Fall Pre-Session (12 days)
August 14  Faculty Return
August 25  Fall (full term) Instruction Begins
September 1  Labor Day Holiday—College Closed
September 22  Deadline to Drop Without Record (FTSE)
October 31  Professional Development Day—NO CLASSES all sites—College Closed for general public business
November 11  Veteran’s Day Holiday—College Closed
November 21  Deadline for Student Initiated Withdrawal of full semester classes
Deadline for Withdrawal of Short Courses varies by course and will be indicated by faculty
November 27–28  Thanksgiving Holiday—College Closed
December 6  Last Day of Instruction
December 8–13  Final Examination Period
December 23–31  Winter Break—College Closed

SPRING 2004 • January 12, 2004–May 8, 2004
January 1, 2004  New Years Day Holiday—College Closed
January 6  Faculty Return
January 12  Instruction Begins
January 19  Martin Luther King Holiday—College Closed
February 16  President’s Day Holiday—College Closed
February 25  Deadline to Drop Without Record (FTSE)
March 15–21  Spring Break—All sites—No Classes
April 2  Professional Development Day—NO CLASSES all sites—College Closed for general public business
April 16  Deadline for Student Initiated Withdrawal of full semester classes
Deadline for Withdrawal of Short Courses varies by course and will be indicated by faculty
May 1  Last Day of Instruction
May 3–8  Final Examination Period
May 7  Commencement
May 10–28  May Mini-Session (15 days)
May 31  Memorial Day Holiday—College Closed

SUMMER 1: 2004 • June 1, 2004–July 2, 2004 (24 days)
June 1  Instruction Begins
June 7  Deadline to Drop Without Record (FTSE)
June 18  Deadline for Student Initiated Withdrawal
July 2  Last Day of Instruction

SUMMER 2: 2004 • July 6, 2004–August 4, 2004 (22 days)
July 5  July 4th Holiday (Observed)—College Closed
July 6  Instruction Begins
July 12  Deadline to Drop Without Record (FTSE)
July 21  Deadline for Student Initiated Withdrawal
August 4  Last Day of Instruction

SUMMER 1A: 2004 • June 1, 2004–August 4, 2004 (46 days)
June 1  Instruction Begins
June 24  Deadline to Drop Without Record (FTSE)
July 5  July 4th Holiday (Observed)—College Closed
July 21  Deadline for Student Initiated Withdrawal
August 4  Last Day of Instruction

Note: Detailed calendars including registration dates and information may be found in each semester Schedule of Classes.
The College reserves the right to make changes to the calendar without notice. Mid-semester exams are at the option of individual instructors.
District Governing Board

Carole Mandino  
Board Chair  
Flagstaff, Arizona  
District 2

Daniel Baertlein  
Board Secretary  
Williams, Arizona  
District 3

Val Gleave  
Page, Arizona  
District 5

Patrick Hurley  
Flagstaff, Arizona  
District 4

Nathaniel "Nat" White  
Flagstaff, Arizona  
District 1

State Board

Mike Clifton  
Coconino County Representative to  
the State Board of Directors for  
Community Colleges of Arizona
VISION

Coconino Community College strives to be Northern Arizona’s premier learner-centered community for pursuing your dreams of success.

MISSION

Coconino Community College provides personalized and accessible opportunities in higher education by offering transfer, career and technical programs, and community interest courses.

PURPOSES

Coconino Community College has identified the following purposes to achieve its mission:

General Education to provide learners with the foundation of a liberal education, including a core of learning opportunities in reading, writing, quantitative and critical thinking which form a solid foundation for lifelong learning and success in academic, career, and life goals.

Transfer Education to provide learners with the curriculum necessary to transfer to baccalaureate-granting institutions.

Occupational Education to provide learners with the skills and knowledge necessary to pursue occupational careers and/or life goals.

Continuing Education to provide learners and constituencies who are not directly served by the College’s arts and sciences and occupational and professional technologies divisions with learning opportunities.

Developmental Education to provide the curriculum necessary to prepare learners for college-level course work and the workplace.

Economic Development to respond quickly in the advancement of regional economic development goals through curriculum development and skills training. Technology Integration to provide state-of-the-art technological education and training opportunities for the student body and the community.

Student Services to facilitate access to the college and to support learners’ attainment of educational goals.

Cultural and Community Service to develop and provide activities and programs that celebrate and preserve cultural diversity and awareness, encourage volunteer service, support community awareness, protect public welfare, and support fine and performing arts.

CORE VALUES

We—the personnel and District Governing Board of Coconino Community College—are dedicated to providing quality educational opportunities to our community. In doing so, we commit to the following core values to guide our decisions and behaviors as we seek to meet the changing needs, aspirations, and goals of our community:

- **People**—We strive to accept the uniqueness of each individual and the contribution each person makes. We strive to create a caring, accepting, and productive environment for our students, employees, and community.

- **Learning and Growth**—We are dedicated to providing lifelong learning opportunities for our students, employees, and community to empower them to achieve their dreams. In this endeavor, we create learning opportunities that are accessible and relevant to our students and which place the learner first.

- **Quality**—We recognize the importance of continually improving our educational offerings and services and the need to hold our students and ourselves to high expectations and standards. We employ a dynamic, strategic planning process and constantly assess our activities to be responsive and accountable to our students, employees, and community.

- **Ethics**—We believe that to be effective we must demonstrate integrity. Therefore, we uphold the highest ethical standards in all of our activities resulting in a responsible and fair environment for our students, employees, and community and a responsive and open decision-making process.

- **Community**—We exist for our community; therefore, we must be responsive to its changing needs and its diversity. To do so, we strive to provide services that are timely, accessible, and affordable. We also pursue partnerships and collaborations throughout our community to be responsive to the needs of our diverse populations.

- **Respect**—We recognize that learning cannot occur without respect. We are committed to the acceptance of diverse cultures, differing ideas and beliefs, and the uniqueness of each individual since these are the foundations of respect.
Assessment at CCC

Coconino Community College is committed to providing teaching and learning excellence in all its endeavors through a comprehensive assessment program that includes:

Assessment of Student Learning
This form of assessment involves identifying how competently students have attained learning outcomes in both general education and the major. Each curricular area at the College has articulated the learning outcomes expected of students completing each degree or certificate and the level of student performance expected. Students participate through examinations, portfolios, performance assessments, surveys, and related activities. The emphasis in these areas is directly focused on what a student has learned as a result of their educational experience at CCC. Data collected is used to both document and improve student learning.

Assessment of Institutional Effectiveness
While assessment of student learning focuses directly on what students have learned, assessment of institutional effectiveness is concerned with all aspects of the College’s operation—student satisfaction with support services, employer opinions, community perceptions, employee satisfaction, facilities, safety, equipment, technology, and the financial condition of the College. All are considered important as they have a direct impact on student learning. Institutional effectiveness is measured through a variety of quality indicators established by the institution. Surveys of students, employers, alumni, and the community, along with focus groups, advisory boards, job placement information, and financial audits, are among the instruments used to gather relevant data. Information gathered enables the College to understand its effectiveness and improve its educational offerings and services.

Students and community members at large are asked to participate in this quality assurance program. In all instances assessment activities stem directly from the institution’s mission and purposes. Results are tied to the College’s strategic plan and used to improve student learning. Participation in these activities is appreciated and valued by members of the College community as CCC strives to achieve its vision of being “northern Arizona’s premier learner-centered community for achieving your dreams of success.”

Strategic Goals Development
2003–2006

• Creating a Learner-Centered College—to enhance and promote student success by developing and implementing a continuous quality improvement process which (a) demonstrates the extent to which the college will accomplish its mission/purposes through assessment of measurable outcomes; and (b) results in program and institutional improvement through the college’s planning processes.

• Expanding Learner Access—to develop and implement a sustainable and effective district-wide instructional delivery system (via technology, innovation, and creativity).

• Advancing Regional Economic Development—to collaborate with area businesses, K-12 schools, post-secondary institutions and government agencies in the development of a well-trained workforce.

• Managing Enrollment Strategically—to optimize district enrollment through responsive, timely, cost-effective, recruitment and retention strategies.

• Developing Exceptional Human Resources—to attract and retain exceptional employees and create a healthy and dynamic work environment.

• Strengthening Community Relations—to build and strengthen relationships with constituencies to make CCC a college of choice.

• Maximizing External Resources—to advance the image of the college so that the private and public sectors are eager to invest in CCC’s future.
Coconino Community College Foundation

Foundation Officers

Alice Ferris
President

Susan Casebeer
Past President

LaVelle McCoy
Vice President

Molly Munger
Secretary

Blake Rolley
Treasurer

The Coconino County Community College Foundation, Inc. was founded in 1993 under Arizona law as a non-profit corporation. It is fiscally and organizationally separate from the college with its own Board of Directors. Its purpose is to receive private gifts, bequests, and donations; to account for, manage, and help appreciate monies or property submitted to the Foundation; and to help the college with projects and opportunities which may not be funded by public funds.

Funds for the Foundation are distributed to benefit and advance Coconino Community College and for the encouragement and subsidization of the students and faculty of CCC.

The Foundation Board of Directors is composed of selected residents of Coconino County who represent positive leadership and community influence and have expressed an interest and desire to use their influence on behalf of the college through the Foundation. The Foundation is prepared to support programs and activities of the college which promote the objectives of the institution. Foundation activities and support include, but are not limited to, scholarships and financial aid for students, recognition of outstanding scholarship or leadership, recognition for cost savings suggestions, development of special facilities, awards for special achievement, management and investment of funds, support of the college library, procurement of special equipment, planning for special college activities and programs, and development of area-wide interest in support of the college.

Gifts to the Foundation may be made in several ways and may usually be arranged to simultaneously achieve maximum tax benefits for the donor and provide generous support for education.

Contributions may be made by gifts of cash, real or personal property, securities, provision of a will, gifts of insurance policies, or the establishment of trusts. Gifts may be awarded for specific purposes or given without restrictions.

The Coconino County Community College Foundation, Inc. supports quality education through excellence, achievement and commitment.
Support Services and College Compliances
College Publications

Academic terms and language can be confusing—and sometimes intimidating—to learners who have not previously attended a college or who are attending CCC for the first time. The following information is provided to help you understand some of the terms and tools used by CCC.

Three documents—the College Catalog, Class Schedule, and Student Handbook—are published annually by the College to provide students with information concerning academic programs and requirements, policies and procedures, class offerings, and support services. These tools are designed to assist you in planning your educational goals, understanding the conditions of your enrollment, and accessing student and educational services. To ensure access to information regarding CCC, each publication is available on the College’s Web Site. The documents are also available through the Office of Admissions and Records at each campus. While some of the information may appear repetitive, the publications provide different types of information and are intended to be used in combination.

The College Catalog provides a listing of all academic programs, degrees, certificates, and courses offered by CCC. Additionally, the catalog includes policies regarding admission and enrollment, academic procedures and standards, and outlines a student’s rights and responsibilities as a member of the learning community. The catalog also provides information on the College’s mission, purposes, and values, affiliations and accreditation status, and directories of staff, faculty, and support services. CCC is a multi-campus college district providing educational services in several locations and through distance learning opportunities. The catalog is intended to provide general information to all students attending CCC; specific information on each campus location is included in the student handbooks and class schedules.

The catalog is the document provided by the College to ensure the student understands the requirements that must be met to complete a program of study and a description of the courses included in the College’s curriculum. The catalog is published annually and outlines program requirements in effect the academic year a student enrolls.

CCC offers two-year, or "associate" degrees designed to meet a specific purpose such as preparing for an occupation or transferring to a four-year college.
Degrees are planned around specific areas of content and interest, referred to as a student's "major." The catalog provides a listing of the type of degree a student may pursue, as well as the specific course and other requirements the student must meet in order to complete a degree within a major field of interest. All degrees offered at CCC include courses that meet the "general education" requirements and the specific major requirements.

CCC also offers certificates that are designed to prepare students for entry into a specific field of work or to learn new skills related to an occupation. Certificates do not include general education requirements and may be completed within a semester and/or year of full-time attendance. The catalog provides a listing of the courses a student must complete to meet the requirements of the certificate.

The course descriptions provide general information on each course including a brief summary of the course content, any prerequisites (classes or conditions that must be met prior to enrollment in a course), the credit hours awarded for completion of the course, and the number of lecture and lab hours the class meets.

The catalog also includes policies and procedures and other disclosures to inform students of their rights and responsibilities, conditions of enrollment, and rules the College follows in regard to enrollment, records, and transactions such as payment and refunds.

The Class Schedule provides a listing of when classes are being offered in each location throughout the district and through distance learning opportunities each semester or session. The schedule is printed and posted on the College's website prior to the start of each semester or session. The class schedule also includes information concerning the academic calendar and dates or deadlines affecting student choices regarding enrollment, withdrawal, and refunds. More specific information regarding campus business hours and services such as advising, placement testing, and registration is listed for each campus or extension site location.

The Student Handbook is a publication designed to describe more specific information about support services and programs offered at each campus. The student handbook includes information regarding each support service provided at a campus, the staff member to contact for the service or program, and detailed information on the benefits and services provided. Additionally, the student handbook includes a more comprehensive list of academic terms and definitions. The policies and procedures outlining student rights and responsibilities are also included in the handbook to ensure students are informed of the rules and regulations affecting their enrollment and participation in the learning community.

Support Services

Advising
Academic advising is provided to assist you in identifying your educational goals and planning your program of study. Through a collaborative partnership, the advisor assists in clarifying your objectives and reasons for attending CCC, identifying the educational programs and/or services that best meet your needs, and outlining educational plans. Academic advisors also assist students in understanding the complex requirements that must be met to complete a degree, certificate, and conditions of transfer to a four-year college and university. The class schedule and student handbook provide more specific information concerning academic advising and hours of operation.

Learning Enhancement Services (LES)
Learning Enhancement Services is committed to creating optimum adult learning environments by providing one-on-one and group assistance to students, faculty, and staff. Our services are designed to assist you with your educational goals and create a partnership toward your success at CCC.

Learning Assistance
CCC has learning centers throughout the district and information online to help students improve their opportunities for educational success. At these centers and online, our goal is to foster student success attributes such as critical thinking, proactive planning and personal accountability for academic work, provide optimum learning environments, and offer learning assistance.

Rather than tutoring students in subject matter and emphasizing the mastery of facts and theory, learning assistance guides you in the learning process. The goal of learning assistance is to complement instruction presented in the classroom by helping you comprehend the concepts introduced to you by your instructor without presenting new ideas to master.

Learning assistance is available for math, sciences, writing, languages, communications, computer applications, and many more subjects. Check the learning center or site coordinator at your campus to find out what assistance is available.

CCC does not offer any federal loan programs (Federal Direct, Federal Perkins, Federal Stafford Loans, Parent PLUS).
Support Services and College Compliances

Student Computing Services
Our general-purpose computer labs allow students quick and easy access to the latest in software and technology. Lab users enjoy high-speed Internet access, secure network file storage, printing and image scanning services, and a wide variety of software applications at each of our locations.

Students use our labs to complete computer assignments, type papers, conduct online research, access CCC online courses and much more. If you are enrolled in a computer class, learning assistance is available for all software taught in CCC computer courses. General technology assistance is available for those that wish to enhance class presentations or projects using computer software. Our friendly and knowledgeable staff place an emphasis on building your learning skills via one-on-one personalized assistance. We make learning about computers less intimidating.

Student Computing Services encourages your interest in technology and will support you whether you are pursuing a technology degree, certificate, or just want to increase your computer proficiency. Consult your campus directory or ask your Student Affairs representative for computing services available on your campus.

Information Resources and Library Services (IRLS)
Information Resources and Library Services provide traditional library resources and services; online information resources; classroom reserve materials; library access for Coconino Community College students across the district and campus use loan of multimedia equipment. Our goal is to help students develop critical-thinking skills in identifying, locating, evaluating, and applying concepts through wise use of information. Librarians and instructional assistants support you in meeting your research needs. Our commitment is to offer CCC users access to resources in support of the curriculum. IRLS staff offers instruction on the research process; finding and evaluating information; and understanding library services through individual mentoring, online computerized workshops, and in-class instruction. Multimedia equipment is made available to students to aid in classroom projects and presentations. Please check with the Learning Enhancement Center at your campus to learn more about what Information Resources services are available for you.

Testing Services
CCC relies on placement and proficiency tests to place students in courses with prerequisites and for students wishing to find an optimal entry course. The College believes your academic success starts with careful placement in courses based on timely assessment of your current skill and knowledge levels. Check the current semester schedule of classes for testing services available at your campus.

CCC also offers proctoring services, select certification testing, and private testing for qualifying students needing accommodations. Check our website at http://www.coconino.edu/lec/testing for information.

Financial Aid and Scholarships
CCC offers a variety of financial aid and scholarships to full- and part-time students. Financial aid options include the Federal Pell Grant, Federal Supplemental Educational Opportunity Grant (FSEOG), Federal Work Study (FWS), and Leveraging Educational Assistance Partnership (LEAP). These are need-based programs and in order to receive funding financial need must be shown. CCC is approved to train students under government educational programs for veterans and eligible dependents of deceased or disabled veterans.

CCC has various scholarships available every year. Applications are usually accepted from January 2 to mid-March for the following academic year.
Depending on the sponsor of the organization providing the scholarship, applications are reviewed based on need, academic achievement, and/or community involvement in various areas. Please contact Financial Aid and Veterans Services for more information and applications on financial aid, scholarships and veteran’s assistance.

CCC does not offer any federal loan programs (Federal Direct, Federal Perkins, Federal Stafford Loans, Parent PLUS).

**Community Service Program**
The Community Service Program has been developed to provide you and other community members the opportunity to become more aware of community service needs and share unique skills with the community while gaining experience to improve career options. The program is primarily a volunteer experience but there is some funding from the Title IV Federal Work Study Program if students qualify for federal assistance. This program is part of the Federal Work Study program administered by Financial Aid Services. Please contact Financial Aid Services for more information.

**Career Exploration and Educational Planning**
Many learners come to CCC wanting the benefits of additional education and training but are unsure of their interests, skills, and current career opportunities. The Career Exploration and Educational Planning program is designed to assist in clarifying goals and exploring possible programs of study. Through this support service, students have access to career and interest inventories, learn more about specific job opportunities, and plan an educational program that fits individual interests and goals. Services include career counseling, self-assessment exercises, and workshops on career and job opportunity topics.

**Internships**
CCC is committed to providing learning opportunities and leadership experience for interns when it is of mutual benefit to the College and the interns.
Interns must meet the minimum qualifications for a position. For more information contact the Human Resources Office.

**Educational Opportunity Center (EOC) at Northern Arizona University**
The Educational Opportunity Center provides information about colleges, universities, and vocational/technical schools in Arizona and other states in the U.S. Assistance with applying for admissions, financial aid, scholarship applications, and career exploration is available. The EOC Office is located at the CCC Fourth Street Campus.
Support Services and College Compliances

Coconino County Tech Prep
Connect to Your Future
If you can answer yes to any of these questions, you may ALREADY have a head start on college with Tech Prep credit:

- Are you a Tech Prep student?
- Did you graduate from a high school in Coconino County within the last two years?
- Have you completed a Tech Prep-articulated career and technical program* in high school?

*High School Tech Prep Programs include: Accounting, Drafting, Word Processing, Hospitality, Building Trades, Modern Office Systems, Child Care, Food Production, Nursing...and more.

If you have completed one of these programs in high school you may be eligible for college credit to be applied toward a degree or certificate program at CCC.

Before you sign up for a career and technical course at CCC, contact Student Support Services. You may not need to repeat what you have already learned in high school.

For more information go to the Tech Prep web page: www.coconino.edu/techprep.

Coconino Community College offers
Tech Prep Programs in:
- Accounting
- Building Trades

- Business
- Computer Information Systems
- Computer Networking
- Drafting/Computer-Aided Drafting
- Early Childhood Education
- Hospitality
- Office Information Systems
- Marketing
- Nursing/Allied Health
- Welding/Dual Enrollment

CCC currently works with the following high schools to provide the opportunity high school juniors and seniors to earn dual high school and college credit:

- Tuba City High School
- Page High School
- Williams High School
- Grand Canyon High School
- Greyhills Academy High School

Through dual enrollment, junior and senior high school students not only earn college and high school credit simultaneously, they also:

- Save money on college tuition
- Reduce college completion time, and
- Eliminate duplication of course work during their freshman year of college.
Upon satisfactory completion of these courses, students can use earned credits towards a degree at CCC or transfer the credits to other colleges and universities.

Passages Program
The Passages Program provides assistance for single parents, displaced homemakers, dislocated workers, and re-entry students. The program is designed to guide students through the process of beginning or returning to college and succeeding in a vocational program of study. Support services for eligible students may include:

- Financial assistance for tuition, childcare and transportation
- Academic advising
- Crisis intervention and referral to community resources
- Textbook loan

Disability Resources (DR)
CCC is committed to providing college-wide educational support and assistance for students with documented disabilities. Services are individually determined to provide you with the opportunity to fully participate within College-sponsored courses and/or activities. The Disability Resources department works closely with other College departments and community agencies to enhance and support your educational choices. All efforts will be made to promote independence and the highest extent of integration into our learning community.

If you have a documented disability and feel you require accommodations, please contact the Disability Resources office. Services include intake assistance, eligibility determination with appropriate documentation, faculty notification of accommodations, a variety of academic assistance, and continued services throughout your educational experience at CCC. Please be aware that you must contact the Disability Resources office each semester you request accommodations. This must occur at least eight weeks before classes start; not doing so may result in receiving delayed and/or limited services. Visit the Disability Resources website for more detailed information.

Reserve Officers Training Corps (ROTC)
Through an arrangement with Northern Arizona University (NAU), CCC students in Flagstaff can take freshmen and sophomore-year classes in ROTC. The goal of the ROTC classes is to provide a foundation of military knowledge and skills needed by junior officers in the military. These classes provide Army ROTC Basic Course credit to students who intend to enroll in, or continue their participation in Army ROTC classes at Northern Arizona University or other universities hosting Army ROTC programs. Students can register for these classes at CCC and take the courses at NAU. For further information, contact Air Force ROTC at (928) 523-2060 or CCC’s Student Support Services.

Bookstore
Purchase of textbooks and supplies are available at the main Flagstaff Campus Bookstore (on Lone Tree Rd.), which is currently operated by the Northern Arizona University Bookstore. Students attending courses outside of the two Flagstaff locations may acquire textbook services (including buy-back services) on-line or by telephone through ‘MBS Direct’. Additional information regarding bookstore hours, ordering information, and other services is included in the class schedule and student handbook.

Flagstaff Campus Bookstore: (928) 226-4360
MBS Direct: (800) 325-3252 voice, (800) 499-0143 fax
Web: http://direct.mbsbooks.com/cococc.htm
Student Activities and Campus Life
Student Activities and Campus Life provides learners with an opportunity to feel connected to CCC and participate in extra-curricular activities sponsored by campus clubs and organizations. Student Forums are scheduled monthly for discussion of relevant issues and student concerns. The program provides current information regarding campus events and activities, and ensures appropriate communication with students concerning all aspects of campus life.

Phi Theta Kappa
Phi Theta Kappa International Honor Society was founded for community colleges in 1918. Since that time it has become the largest and one of the most prestigious honor societies in higher education. The CCC Beta Gamma Chi chapter recognizes and encourages scholarship by providing the opportunity for the development of leadership and service, an intellectual climate for exchange of ideas and ideals, lively fellowship for scholars, and stimulation of interest in continuing academic excellence.

Distance Learning
CCC offers a variety of on-line courses; making your education more accessible and flexible. Courses are delivered to you via the Internet by the Extended Learning Department at CCC. The Extended Learning Department also provides other technologies such as Instructional Television courses to support learning at our remote sites. Success in distance courses depends on the development and nurturing of unique learning and motivational skills that we will help you attain, through services like our Writing Center Online. Please inquire about our distance learning offerings or visit the web site, http://www.coconino.edu/extended/ for more information.

Community Education Programs/Non-Credit Courses
Non-credit short-term courses and workshops are offered throughout the year. These courses are designed to meet the learning needs of a wide variety of students. For example, we offer computer courses in using word processing applications, spreadsheets, and databases. You are not required to meet the same criteria that are expected of the regular credit-bearing courses to enroll in these programs. Registration is a simplified process, and college credit is not available. Also, available are non-credit online courses. Each course runs for 6-weeks and consist of 12 lessons. Interactive quizzes, assignments, tutorials, and online discussion areas available via the World Wide Web supplement the lessons. For additional information about these programs call the Community Education Coordinator.

College Security
Coconino Community College is responsible for maintaining a professional and safe environment, conducive to educational pursuits throughout its district. In its commitment to the provision of a secure environment, procedures are established through review of the College Safety and Security Committee regarding
dissemination of accurate and timely information concerning individual safety and security in compliance with related federal and state regulations. Security on locations where CCC classes are held is generally available during regularly scheduled classes and lab hours. A Campus Security Report is also available from CCC and may be accessed at the college web site: http://www.coco.cc.az.us/stuinfo/securityrpt.

Students needing to file restraining orders and/or orders of protection should contact the Security Office at any of the campus locations. For further information on safety tips, emergencies, or reporting assistance, contact the Security Department.

**Student ID Cards**
Photo student ID cards are provided at the Lone Tree, Fourth Street, and Page/Lake Powell campuses during the first semester of attendance. The ID card is required to access campus services and as proof of identity in accessing educational records and other information. Students are issued a "system generated" identification number at the time of initial registration; social security numbers are NOT used by CCC for student identification purposes.

**Parking and Parking Permits**
Adequate parking and secure parking lots are established at all CCC campuses and locations. Parking permits are required at the Lone Tree and Fourth Street campuses. The permits regulate access to student parking at these locations only. Emergency phones are installed throughout the Lone Tree campus parking lot. Violations of parking and traffic regulations and procedures are subject to fines and disciplinary action.

**Lost and Found**
Campus Security is responsible for lost and found items at each campus location. Lost or stolen items may also be reported to Campus Security.

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**Small Business Development Center: SBDC**

Has this thought ever crossed your mind, "What a great idea for a new business! I wonder how to get started?" Or, maybe you already run your own business. "Seems like I’m doing OK but I wonder how I can be more profitable. How can I get more customers?"

If you are an entrepreneur or considering self-employment, these and similar questions can be answered by the staff of CCC’s Small Business Development Center. The SBDC is a partnership between CCC and the U.S. Small Business Administration (SBA). SBDCs were established by Congress in 1980 and are currently located in over 1400 community colleges and universities nationwide.

The CCC SBDC provides direct counseling, pertinent business management training and up-to-date information resources to the Coconino County business community. No-cost, confidential counseling services focus on a variety of business management issues including business planning, financial management and analysis, marketing strategies, international trade, and funding sources. Perhaps the best counseling service the SBDC offers is an objective third-party perspective to help clients identify and solve problems, as well as determine realistic priorities and goals.

In 2002 the SBDC provided professional guidance and advice to over 500 clients countywide. Business owners in the outlying communities are not required to travel to Flagstaff for assistance as SBDC staff visits Williams, Page, Sedona and Tusayan on a regular basis.
Support Services and College Compiances

In cooperation with the CCC Division of Occupational/Professional Education, the SBDC offers an array of business development courses and seminars. Participants are able to earn college credit for some of the courses.

Helping Coconino County Businesses Maximize their Success

Topics include:
- Minding Your Own Business (a business start-up workshop)
- QuickBooks in Your Business
- Understanding Financial Statements
- Customer Service
- Your Marketing Plan
- The Anatomy of a Business Plan

The SBDC maintains a comprehensive information resource library of publications, videotapes, audiotapes, CD-ROMs, and software. Most of the non-computer resources are reprinted (within copyright limitations) or loaned to clients at no cost. For clients who are exploring the business opportunities on the World Wide Web, the staff also provides "test drives" on the Information Superhighway.

The SBDC is located at the east end of CCC's Flagstaff campus. Feel free to stop by anytime or call (928) 526-7653 (Flagstaff and Williams) or (800) 350-7122 ext. 7653 (elsewhere in Coconino County).

Workforce Training Programs

The College provides customized courses and workshops devoted to meet the workforce development needs of individual firms or industry clusters. These courses are offered at the College or at the employers' place of business. Courses are delivered using traditional and computer-based instructional methods. CCC has provided on-site training for major employers in Coconino County including Nestle Purina Pet Products, W.L. Gore & Associates, Salt River Project/Navajo Generating Station, New England Business Service, and Navajo Army Depot. In addition, many other public and private sector firms enrolled their employees in specially-designed course offerings at CCC.
The computer-based courses use PLATO as the instructional medium. The PLATO Learning System is computer-managed instructional courseware that provides learners with knowledge that spans a wide range of subject areas. Each course is targeted to specific competencies and skill levels. Subjects and topics include many of the necessary basic skills: communications (reading, writing, and presentations); mathematics; science (biology, chemistry, and physics); and social and behavioral sciences (economics, geography, history, political science).

In addition, PLATO provides instruction in life skills (job and parenting skills), technical skills (blueprint reading, industrial electronics, hydraulic and pneumatic power fundamentals), and health, safety, and environmental training. Moreover, PLATO contains courses that are specifically designed to enhance workplace performance: quality fundamentals, writing in the workplace, and data management skills.

The College is also an authorized service center for ACT WorkKeys®. WorkKeys is a comprehensive assessment system that tests skills in problem solving, communication and teamwork. It also identifies the skill levels needed to do specific jobs. In many communities, WorkKeys has enhanced the retention and productivity of incumbent workers, and helped improve the entry-level skills of prospective workers. The PLATO courses are closely aligned with the WorkKeys competencies. This combination, along with other CCC programs and services, provides local employers and workers with effective, flexible and affordable solutions to their training needs.

For additional information about these workforce-training programs, call the Dean of Extended Learning at the Flagstaff Campus or the Administrative Center at

Americans with Disabilities Act (ADA)

Coconino Community College maintains programs, policies and procedures, which are required under the provisions of the Americans with Disabilities Act (ADA) which establishes a clear, comprehensive federal prohibition of discrimination against persons with disabilities. The College ensures compliance with applicable building standards for existing, new and remodeled owned structures, development of standards of compliance for non-owned structures, support for an ongoing process of reasonable accommodation to applicants, employees, students and the general public using or seeking to use College facilities and services. The College prohibits discrimination against a qualified individual with a disability in regard to admissions, registration, access to instruction, hiring, compensation, advancement, training, and other terms or conditions of employment and termination. The College provides reasonable accommodations to qualified applicants or employees with a disability unless it can show that the accommodation would impose an undue hardship on the College.

Carl Perkins Vocational Education Act

Coconino Community College receives grant funding under the federal Carl Perkins Vocational and Technical Education Act of 1998 to improve vocational education programs and to ensure the full participation of individuals who are members of special populations in vocational education programs. Special populations in the Act are defined as individuals with disabilities; economically disadvantaged individuals; individuals preparing for nontraditional training and employment for their gender; single parents; displaced homemakers; and individuals with other barriers to educational achievement, including limited English proficiency. CCC provides assistance to special populations in overcoming barriers that may result in decreased access and success in postsecondary education and does not discriminate against members of special populations.

Drug Free College

Coconino Community College is committed to the Drug Free Schools and Communities Act Amendments of 1989 specified by Public Law 101-226. This is demonstrated in the College Drug and Alcohol Free Workplace policy and procedures which ensure that employees and students comply with federal and state regulations regarding a drug and alcohol free workplace and educational environment.

The College regulations prohibit the manufacture, possession, distribution or use of alcohol or a controlled substance by students, employees and campus guests in the workplace and facilities owned or leased by the College.

Compliance with the policy is a condition of employment and continued active student status. Employees and students are required to report
violations to appropriate college authorities. The College will assist employees and students with appropriate referral and information concerning drug and alcohol education.

Holidays
Coconino Community College observes certain holidays and vacation periods, which are detailed in each semester’s class schedule. The College conducts classes at a variety of sites throughout Coconino County including local public school facilities. The College endeavors to follow the holiday schedule and vacation periods of the local school district to ensure access to facilities and reduce schedule conflicts for students. In general, no classes are taught on the following district-wide holidays: New Year’s Day, Martin Luther King Day, President’s Day, Memorial Day, Independence Day, Labor Day, Veteran’s Day, Thanksgiving (two days) and Christmas Day. Scheduled vacations may vary with site and local school calendars but generally includes a Winter Break beginning just prior to Christmas Day and a Spring Break in March or April.

Religious Holidays
Students shall have the right to observe major religious holidays without penalty or reprisal by any administrator, faculty member or employee of the College. The student will be required to make up any work missed. Absences for such holidays shall not count against the number of absences allowed by an instructor. At least one week prior to the holiday, students shall submit to their instructor(s) a written statement which contains the date of the holiday and the reason class attendance is not possible.

Sexual Harassment
Coconino Community College is committed to maintaining a work and educational environment free of discriminatory intimidation and sexual harassment. All persons associated with CCC including, but not limited to, the District Governing Board, the administration, faculty, staff, students, and members of the public will provide an environment free from sexual harassment and discrimination. Any person who engages in sexual harassment and/or discrimination against others on the basis of race, gender, religion, color, national origin, age, disability or Veteran status while acting as a member of the College community or while on college property will be in violation of college policy. Inquiries regarding the policy or the filing of a complaint should be directed to the Director for Human Resources.

Student Complaints
Complaints and grievance by students and other constituents are addressed through various college policies and procedures and administrative offices. The College is obligated by the North Central Accreditation Office to keep a record of formal complaints. Student grievance procedures are included in the Student Code of Conduct, available from the Vice President for Student Affairs or on the web at www.coconino.edu. The privacy of the parties involved is protected.
Support Services and College Compliances

Title                          Name              Telephone
College President              Dr. Thomas Jordan  928.226-4203
Vice President for             Dr. Kathleen Corak  928.226-4224
Academic Affairs               Vice President for   928.226-4209
   Administrative Support      Vice President for   928.226-4213
   Student Affairs             Director for         928.226-4204
   Human Resources             Julie Smee          

Assessment and Institutional Effectiveness
Coconino Community College is committed to its mission to promote student success through comprehensive learning opportunities. Assessment is the ongoing process of analyzing and evaluating CCC's functions and activities. Information gathered enables the College to understand its effectiveness and improve its educational offerings and services. Assessment and institutional effectiveness activities at CCC emphasize feedback on teaching and learning. The information is used to plan and improve instruction, support services, administrative functions, and cultural and community support.

Students and community members-at-large are asked to participate in assessment activities, which may include, but are not limited to, examination, performance assessments, surveys, focus groups, interviews, and follow-up studies. Participation in these activities is appreciated and valued by members of the College community.

Student Right-to-Know and Campus Security Act
Coconino Community College is in compliance with Public Law 101-542, the Student Right-to-Know and Campus Security Act (as amended by Public Law 102-26, the Higher Education Technical Amendments of 1991). Copies of the Student Right-to-Know document are available on the College's web site at www.coconino.edu.

The Crime Awareness and Campus Security Act of 1990 requires that colleges collect, prepare and publish information related to crime and campus security and distribute it to all current students and employees, and to any applicant for enrollment or employment, upon request. CCC's Annual Campus Security Report may be accessed at the following web site: http://www.coconino.edu/stuinfo/securityrpt.

Student Identification Number
Coconino Community College will provide all students with a system-generated identification number in the admissions process. The student must still provide their social security number for tax reporting and financial aid and will be used only for such purposes as allowed under the FERPA regulations.

Notification of Rights Under FERPA
The Family Educational Rights and Privacy Act (FERPA) affords students certain rights with respect to their education records. They are:

1. The right to inspect and review the student's education records within 45 days of the day the College receives a request for access. Students should submit to the Registrar, Dean, Division Chair, or other appropriate official, written requests that identify the record(s) they wish to inspect. The College official will make arrangements for access and notify the student of the time and place where the records may be inspected. If the records are not maintained by the College official to whom the request was submitted, that official shall advise the student of the correct official to whom the request should be addressed.

2. The right to request the amendment of the student's education records that the student believes is inaccurate or misleading.

Students may ask the College to amend a record that they believe is inaccurate or misleading. They should write the College official responsible for the record, clearly identify the part of the record they want changed, and specify why it is inaccurate or misleading. If the College decides not to amend the record as requested by the student, the College will notify the student of the decision and advise the student of his or her right to a hearing regarding the request for amendment. Additional information regarding the hearing procedures will be provided to the student when notified of the right of a hearing.

3. The right to consent to disclosures of personally identifiable information contained in the student's education records, except to the extent FERPA authorizes disclosure without consent.

One exception, which permits disclosure without consent, is disclosure to school officials with legitimate educational interests. A school official is a person employed by the College in an administrative, supervisory, academic or research, or support staff position (including law enforcement unit personnel and health staff); a person or company with whom the College has contracted (such as an attorney, auditor, or collection agent); a person serving on the District Governing Board; or a student serving on an official committee, such as a disciplinary or grievance committee, or assisting another school official in performing his or her tasks.
Support Services and College Compliances

A school official has a legitimate educational interest if the official needs to review an education record in order to fulfill his or her professional responsibility.

Upon request, the College discloses education records without consent to officials of another school, in which a student seeks or intends to enroll.

4. The right to file a complaint with the U.S. Department of Education concerning alleged failures by Coconino Community College to comply with the requirements of FERPA. The name and address of the Office that administers FERPA is:

Family Policy Compliance Office
U.S. Department of Education
400 Maryland Avenue, SW
Washington, D.C., 20202-4605

Directory Information
Coconino Community College designates the following items as Directory Information: student name, address, telephone number, date of birth, major field of study, participation in officially recognized activities, dates of attendance, degrees and awards received, most recent previous school attended, e-mail address, and photograph. The College may disclose any of those items without prior consent, unless notified in writing to the contrary prior to or by the first day of classes each semester.

Student Code of Conduct
Coconino Community College offers its students the opportunity to learn in an environment where individual rights are respected. As in any group situation, respect for individual rights is best achieved when each group member acts in ways that are reasonable and responsible. Conduct is expected to be consistent with the learning environment and is subject to standards set by the College. The Student Code of Conduct is designed for the promotion and protection of such an environment at the College and to balance the rights and needs of the individual with the responsibility of the individual to the College community.


Voter Registration
In compliance with the National Voter Registration Act (42 U.S.C. 1973gg-2(b)), mail in voter registration forms for Coconino County are available for all CCC students and the public. Voter registration forms are available at all CCC campuses. For more information contact the Coconino County recorder’s office at (928) 779-6585.

Periodically, the institution is required to submit student data in response to federal and state reporting mandates.
General Education
General Education Outcomes, Transfer Guidelines and Requirements

General Education Values Statement
The General Education curriculum provides the core of learning in all degree programs and demonstrates the commitment of Coconino Community College to student success. This core of learning includes skills in reading, writing, quantitative and critical thinking which provide a basis for university study or lifelong education. Specific courses emphasize the principles of mathematics, science, or technology. Others focus on greater awareness of self, society, and the history and culture of humankind. General Education presents skills and knowledge for students to succeed in academic, career, and life goals.

Note: The General Education Core Curriculum is not a degree.

Education for Life!
General Education Learning Outcomes
Coconino Community College offers General Education courses that provide students with the highest quality experience. To that end, we measure the effectiveness of our program using the following student learning outcomes as our guide. Students who complete our General Education program, whether as part of degree program or the AGEC, can expect to acquire or improve their skills in the following areas:

Communication Skills
Convey ideas using one or more methods of expression (written, oral, signed).
- Present ideas
- Participate in collaborative groups
- Construct arguments
- Demonstrate listening

Thinking Skills
- Learn methods of inquiry
- Improve quantitative and critical thinking
- Demonstrate use of scientific method
- Develop creative thinking skills
- Demonstrate knowledge of technological application

Diversity and Global Perspective
Understand and appreciate diverse cultures, values, beliefs, and historical perspectives.
- Recognize the diversity of humanity
- Identify the influence of culture and ethnicity
- Link cultural perspectives

Aesthetic Perspective
A better understanding, appreciation, and global application of the arts.
- Analyze and evaluate the arts
- Reflect on aesthetic experiences

Ethical and Civil Values
A better understanding of self and others to clarify individual and societal responsibilities, needs, and values.
- Identify and assess community needs
- Display integrity in one’s choices
- Understand social values
- Recognize the individual’s responsibility

Thinking about transferring?
Make your credits count!
What is AGEC?
- AGEC stands for Arizona General Education Curriculum. AGEC is the best way to make your credits count for most transfer degrees.
- The purpose of AGEC is to provide students attending any Arizona public community college with the opportunity to build a General Education curriculum that is transferable upon completion without a loss of credit to another Arizona public community college or university.
- AGEC is a statewide agreement between Arizona public community colleges, Northern Arizona University (NAU), Arizona State University (ASU), and the University of Arizona (U of A). Coconino Community College began implementing the AGEC starting spring of 1999.
- AGEC is a 35-credit block of lower division General Education curriculum that fulfills the lower-division General Education requirements at any Arizona public community college or university.

Why complete an AGEC?
1. When you complete an AGEC, all admission requirements are waived at all Arizona public universities. This means that you are unconditionally admitted to any Arizona public university of your choice after completing an AGEC.

2. AGEC satisfies ALL lower-division liberal studies requirements at all Arizona public universities.

3. For most majors, if you complete an AGEC and specific courses you need for transfer, you can enter any Arizona public university as a junior. Please see an advisor for more information.

4. Save money by completing your lower-division liberal studies requirements at CCC. On the average, Coconino Community College tuition rates are about one-third of the Arizona public universities’ tuition.
5. Classes are generally smaller than university freshman and sophomore liberal studies classes.

6. If you have some high school concurrent enrollment credits, and/or CLEP credits that satisfy our General Education requirements, these credits can be counted toward an AGEC and will transfer to all Arizona public universities.

1 Arizona residents need to have a minimum AGEC GPA of 2.0. Non-residents are required to have a minimum cumulative GPA of 2.5.
2 Depending on the major or department you plan to transfer to at the university, you might still need to meet departmental admission requirements.
3 You may or may not choose to complete a degree at Coconino Community College.

Why complete a CCC transfer degree?
All CCC transfer degrees result in an AGEC. Therefore, you get all the benefits of completing an AGEC and more.

• You may be able to transfer into the university as a junior. See an advisor for more information.
• You will have an associate degree, making you more competitive in the job market.

When might AGEC not be necessary?
Some university majors require you to take very specific courses from the beginning of your college education. See an advisor for these majors and to discuss your academic plan.

What happens if you don’t complete an AGEC?
• You will need to meet ALL standard university admission requirements.
• You will need to complete university liberal studies requirements which may or may not be the same as Coconino Community College’s General Education requirements.
• Your General Education courses will be evaluated one by one using the Course Equivalency Guide (CEG) instead of being transferred as a General Education block, satisfying ALL lower-division General Education requirements.

Tips for students planning to transfer
• See an advisor as soon as possible. The earlier you develop an educational plan with an advisor, the less of a chance you have of losing credits after transferring to an Arizona public university. Don’t wait until you almost graduate to see an advisor.
• Explore your career interest to help you decide on a major early.
• Don’t take any more than 64 transferable credit hours, because all Arizona public universities accept only a maximum of 64 transferable credit hours.

1 At CCC, you don’t need to switch catalogs to get the benefits of an AGEC.
2 This does not mean that they will accept ALL transferable courses. Please see an advisor to discuss which courses you should take to ensure that you are taking courses that will be counted toward the university graduation requirements.

Arizona General Education Curriculum-A:
AGEC-A

AGEC-A is a 35-credit lower-division General Education curriculum block that fulfills the lower-division General Education requirements of liberal arts majors (e.g., Anthropology, Social Science, Fine Arts, and Humanities).

General Education Requirements:
35 Credit Hours

Composition 6
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics 3-5
MAT 142 Applications of College Algebra (3) or higher

Arts/Humanities 6-9
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences 6-9
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences 8-10
Any two courses may be taken from the Physical/Biological Sciences category.

Options* 0-6
General Education Options may be selected from the above categories or from the Options category.

*0-6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.

Special Requirements
Each Special Requirement must be met within the General Education Requirements:
• Intensive Writing/Critical Inquiry
• Ethnic/Race/Gender Awareness
• Contemporary Global/International Awareness or Historical Awareness
Arizona General Education Curriculum-B: AGEC-B

AGEC-B is a 35-credit lower-division General Education curriculum block that fulfills the lower-division General Education requirements of business majors (e.g., Business Administration, Computer Information Systems).

Note: Associate in Business degree core courses may not be used to satisfy AGEC-B requirements.

General Education Requirements: 35 Credit Hours

Composition 6
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics 3–5
MAT 212 Business Calculus (3) or higher

Arts/Humanities 6–9
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences 6–9
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral category.

Physical/Biological Sciences 8–10
Any two courses may be taken from the Laboratory Sciences category.

Options* 0–6
General Education Options may be selected from the above categories or from the Options category.

*0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.

Special Requirements
Each Special Requirement must be met within the General Education Requirements:
• Intensive Writing/Critical Inquiry
• Ethnic/Race/Gender Awareness
• Contemporary Global/International Awareness or Historical Awareness

Arizona General Education Curriculum-S: AGEC-S

AGEC-S is a 35-credit lower-division General Education curriculum block that fulfills the lower-division General Education requirements of majors with more stringent mathematics and mathematics-based science requirements (e.g., Biology or Chemistry).

General Education Requirements: 35 Credit Hours

Composition 6
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics 5
MAT 220 Calculus & Analytic Geometry I (5)

Arts/Humanities 6–9
Courses from two or more disciplines must be selected from the approved general education courses in the Arts/Humanities category.

Social/Behavioral Sciences 6–9
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral category.

Physical/Biological Sciences 8–10
BIO 181 Unity of Life I: Life of the Cell (4) &
BIO 182 Unity of Life II: Multi-cellular Organisms (4)
or
CHM 151 General Chemistry I (5) &
CHM 152 General Chemistry II (5)
or
PHY 161 University Physics I (4) &
PHY 262 University Physics II (4)

Options* 0–6
General Education Options may be selected from the above categories or from the Options category.

*0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.

Special Requirements
Each Special Requirement must be met within the General Education Requirements:
• Intensive Writing/Critical Inquiry
• Ethnic/Race/Gender Awareness
• Contemporary Global/International Awareness or Historical Awareness
Decision Points for Transfer Students: Make Your Credits Count!

**ARE YOU TRANSFERRING TO NAU, ASU, OR U OF A?**

**NO**
- If you are planning to transfer to a university out of state or an Arizona university other than NAU, ASU, or U of A, see an advisor.

**MAYBE**
- Take courses which apply to both the AAS General Education core and the AGEC:
  - ENG 101, 102 – 6 credits
  - Arts/Humanities – 6 credits
  - Social Behavioral Science – 3 credits
- At 15 credits, you should decide whether or not you are planning to transfer to an Arizona public university

**YES, I'M TRANSFERRING to NAU, ASU, OR U OF A**
- Take courses that apply to all 3 AGECs (AGEC-A, AGEC-B, AGEC-S):
  - ENG 101, 102 – 6 credits
  - Arts/Humanities – 6 credits
  - Social Behavioral Science – 6 credits
  - Language, if needed – 6-6 credits
- All AGECs require math. Start your math now. Don’t procrastinate!
- At 24 credits, you should decide which AGEC or general area of interest (Arts, Science, or Business)
- See an advisor to discuss your academic plan

- If you don’t know what specific major you might want to study, complete:
  - An AGEC
  - Language (if needed)
  - Or
  - AGEC-A
  - AA in General Studies

- If you have an idea of which possible major areas you are interested in studying, complete:
  - The appropriate AGEC
  - Common Courses (see an advisor)
  - Language (if needed)
  - Transferable elective courses
  - AA in General Studies

- If you know which major, and possibly which university you want to transfer to, complete:
  - The appropriate AGEC
  - Common Courses
  - Language (if needed)
  - Or
  - The corresponding Coconino Community College degree

**TRANSFER to NAU, ASU, or U of A**

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*AGEC-A is a 35-credit block of lower division general education curriculum that fulfills lower division general education requirements of liberal arts majors (e.g. Anthropology, Social Science, Fine Arts, Humanities).*

*AGEC-B is a 35-credit block of lower division general education curriculum that fulfills lower division general education requirements of business majors (e.g. Business Administration, Computer Information Systems).*

*AGEC-S is a 35-credit block of lower division general education curriculum that fulfills lower division general education requirements of majors requiring more mathematics and mathematics-based science (e.g. Biology, Chemistry).*
General Education Core Curriculum: GECC

English Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Note: AAS and AGS Degrees may substitute ENG 135 and/or ENG 136. See specific degree program for requirement listing.

Mathematics (3–5)
MAT 142 Application of College Algebra (3)
MAT 151 College Algebra (4)
MAT 187 Precalculus (5)
MAT 212 Business Calculus (3)
MAT 220 Calculus & Analytic Geometry I (5)
MAT 230 Calculus & Analytic Geometry II (5)
MAT 241 Calculus & Analytic Geometry III (4)
MAT 262 Differential Equations (3)

Note: AAS and AGS Degrees may substitute MAT 121 or higher or BUS 100. See specific degree program for requirement listing.

Arts and Humanities (6–9)
Courses from two or more disciplines must be selected to meet the requirement.
ART 100 Art Appreciation (3)
ART 103 Native American Art of the Southwest (3)
ART 201 Art History I (3)
ART 202 Art History II (3)
ART 220 Art of the United States (3)
ART 221 Art of the Southwest (3)
ENG 236 Introduction to the American Short Story (3)
ENG 237 Women in Literature (3)
ENG 238 Literature of the Southwest (3)
ENG 272* Creative Writing: Nonfiction (3)
HUM 235 American Arts & Ideas (3)
HUM 241 Humanities I (3)
HUM 242 Humanities II (3)
MUS 100 Music Appreciation (3)
MUS 145 Jazz History & Literature (3)
PHI 101 Introduction to Philosophy (3)
PHI 105 Introduction to Ethics (3)
REL 201 Comparative Religions (3)
THR 101 Introduction to Theatre (3)

Social and Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected to meet the requirement.
AJS 101 Introduction to Administration of Justice (3)
AJS 230 Deviant Behavior (3)
AJS 280 Criminology (3)
ANT 102 Introduction to Cultural Anthropology (3)
ANT 110 Exploring Archaeology (3)
ANT 210 Peoples of the World (3)
ANT 230 Peoples of the Southwest (3)

BUS 203 Business Law (3)
BUS 214 Legal, Ethical & Regulatory Issues in Business (3)
ECN 204 Macroeconomic Principles (3)
ECN 205 Microeconomic Principles (3)
GEO 135 World/Regional Geography (3)
HIS 131 United States History to 1877 (3)
HIS 132 United States History from 1877 (3)
HIS 136 Women in American History (3)
HIS 201 Western Civilization to 1660 (3)
HIS 202 Western Civilization from 1660 (3)
HIS 250 Asian Civilization through 1644 (3)
HIS 251 Asian Civilization from 1645 (3)
POS 101 Introduction to Politics (3)
POS 110 American National Government (3)
POS 120 Introduction to World Politics (3)
POS 220 Arizona & National Constitution (3)
POS 233 Global Environmental Politics (3)
PSY 101 Introduction to Psychology (3)
PSY 227 Personality Theory (3)
PSY 236 Psychology of Women (3)
PSY 240 Developmental Psychology (3)
PSY 250* Social Psychology (3)
SOC 101 Introduction to Sociology (3)
SOC 132 Social Problems (3)
SOC 142 Race & Ethnic Relations (3)
SOC 210 Sociology of Gender (3)

Physical and Biological Sciences (8–10)
ANT 101 Introduction to Physical Anthropology (4)
BIO 100 Biology Concepts (4)
BIO 105 Environmental Biology (4)
BIO 109 Natural History of the Southwest (4)
BIO 160 Introduction to Human Anatomy & Physiology (4)
BIO 181 Unity of Life I: Life of the Cell (4)
BIO 182 Unity of Life II: Multicellular Organisms (4)
BIO 201 Human Anatomy & Physiology I (4)
BIO 202 Human Anatomy & Physiology II (4)
BIO 205 Microbiology (4)
BIO 253 Biotechnology & Social Issues (4)
CHM 130 Fundamental Chemistry (4)
CHM 151 General Chemistry I (5)
CHM 152 General Chemistry II (5)
GEO 131 Introduction to Physical Geography (4)
GLG 101 Physical Geology (4)
GLG 102 Historical Geology (4)
PHY 111 College Physics I (4)
PHY 112 College Physics II (4)
PHY 161 University Physics I (4)
PHY 180 Introduction to Astronomy (4)
PHY 253 Archaeoastronomy (4)
PHY 262 University Physics II (4)

General Education Options may be selected from the above lists or from the following: (6–6)
ASL 101 American Sign Language I (4)
ASL 102 American Sign Language II (4)
ASL 201 American Sign Language III (4)
ASL 202  American Sign Language IV (4)
CIS 120  Introduction to Computer Information Systems (3)
FRE 101  Beginning French I (4)
FRE 102  Beginning French II (4)
FRE 201  Intermediate French I (4)
FRE 202  Intermediate French II (4)
GER 101  Beginning German I (4)
GER 102  Beginning German II (4)
MAT 160  Introduction to Statistics (3)
NAV 101  Beginning Navajo I (4)
NAV 102  Beginning Navajo II (4)
SPA 101  Beginning Spanish I (4)
SPA 102  Beginning Spanish II (4)
SPA 201  Intermediate Spanish I (4)
SPA 202  Intermediate Spanish II (4)
SPC 100  Fundamentals of Speech Communication (3)

Notes:
1. Check your chosen degree program for specific General Education requirements.
2. Letter designations attached to courses in the above list define courses with AGEC Special Requirements of: E - Ethnic, Race, Gender Awareness, W - Intensive Writing/Critical Inquiry, C - Contemporary Global/International Awareness or Historical Awareness.

The Arizona General Education Curriculum (AGEC) is a block of 35 semester credit hours of lower-division General Education course work. There are three forms of AGEC:

1. AGEC-A is a 35-credit lower-division General Education curriculum block that fulfills the lower-division General Education requirements of liberal arts majors (e.g. Fine Arts/Visual Arts, Psychology, Sociology).

2. AGEC-B is a 35-credit lower-division General Education curriculum block that fulfills the lower-division General Education requirements of business majors (e.g. Business Administration, Computer Information Systems).

3. AGEC-S is a 35-credit lower-division General Education curriculum block that fulfills the lower-division General Education requirements of majors with more stringent mathematics and mathematics-based science requirements (e.g. Biology, Chemistry).

AGEC-A, AGEC-B, and AGEC-S can be completed separately or as part of an associates degree at CCC and must include the Special Requirements listed below. The College certifies completion of the AGEC on the official transcript.

A completed AGEC will transfer as a block to meet the lower-division General Education requirements at any of the Arizona public universities or other Arizona community colleges. Transfer students who wish to earn the associate degree must then meet additional CCC degree requirements. To earn the bachelor's degree, students transferring the AGEC must still meet course prerequisites, major requirements, and upper-division requirements at their chosen university.

Special Requirements
Students planning to transfer a completed AGEC must meet the additional Special Requirements listed below. These requirements may be met within the 35 hours of General Education Core Curriculum by choosing one course from each of the following lists.

Note: A minimum of two courses must be taken to fulfill AGEC Special Requirements.

Intensive Writing/Critical Inquiry
This requirement must be completed at Coconino Community College.

- BIO 105  Environmental Biology (4)
- ECN 204  Macroeconomic Principles (3)
- ENG 272  Creative Writing: Nonfiction (3)
- HUM 241  Humanities I (3)
- HUM 242  Humanities II (3)
- POS 220  Arizona & National Constitution (3)
- PSY 250  Social Psychology (3)
- SOC 210  Sociology of Gender (3)

Note: ENG 102 is a pre- or co-requisite for these courses.

Ethnic/Race/Gender Awareness

- ANT 102  Introduction to Cultural Anthropology (3)
- ANT 210  Peoples of the World (3)
- ANT 230  Peoples of the Southwest (3)
- ART 103  Native American Art of the Southwest (3)
- ART 221  Art of the Southwest (3)
- ENG 236  Introduction to the American Short Story (3)
- ENG 237  Women in Literature (3)
- ENG 238  Literature of the Southwest (3)
- HIS 131  United States History to 1877 (3)
- HIS 132  United States History from 1877 (3)
- HIS 136  Women in American History (3)
- HIS 250  Asian Civilization to 1644 (3)
- HIS 251  Asian Civilization from 1645 (3)
- PHI 105  Introduction to Ethics (3)
- PHY 253  Archaeoastronomy (4)
- PSY 101  Introduction to Psychology (3)
- PSY 236  Psychology of Women (3)
- PSY 240  Developmental Psychology (3)
- PSY 250  Social Psychology (3)
- SOC 101  Introduction to Sociology (3)
- SOC 132  Social Problems (3)
- SOC 142  Race & Ethnic Relations (3)
- SOC 210  Sociology of Gender (3)

Contemporary Global/International Awareness or Historical Awareness

- ANT 102  Introduction to Cultural Anthropology (3)
- ANT 210  Peoples of the World (3)
- ANT 230  Peoples of the Southwest (3)
<table>
<thead>
<tr>
<th>General Education Core Curriculum</th>
<th>Associate of Arts</th>
<th>Associate of Business</th>
<th>Associate of Science</th>
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<td>English Composition</td>
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<td>Mathematics</td>
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<tr>
<td>Physical and Biological Sciences</td>
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<td>Total minimum credit hours</td>
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<td>19</td>
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</tbody>
</table>

0-6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.

* GECC categories with ranges allow for flexibility in AAS degree core requirement.

** For AAS degrees with articulated BAS transfer degrees the recommended GEN ED core may be greater than the minimum listed.
Degrees and Certificate Programs

Associate of Arts Degree (AA)
The Associate of Arts Degree is designed for students planning to transfer to a college or university and requires a minimum of 60 credit hours. All courses included in the degree must be completed with a grade of "C" or better. A minimum of 35 of these credit hours must be completed in the Arizona General Education Curriculum (AGEC-A, AGEC-B or AGEC-S). The remaining degree requirements are comprised of 25 credit hours or more in the student's elected program of study. Courses numbered 100 or above which transfer as equivalent, departmental elective credit (DEC) or general elective credit (E) will be counted toward this degree. Special Topics courses (298) will not be counted toward this degree.

Associate of Business Degree (ABus)
The Associate of Business is designed for students planning to transfer to a college or university and requires a minimum of 62 credit hours. All courses included in the degree must be completed with a grade of "C" or better. A minimum of 35 of these credit hours must be completed in the Arizona General Education Curriculum (AGEC-B). The remaining degree requirements are comprised of 25 credit hours or more in the student's elected program of study. Courses numbered 100 or above which transfer as equivalent, departmental elective credit (DEC) or general elective credit (E) will be counted toward this degree. Special Topics courses (298) will not be counted toward this degree.

Associate of Science Degree (AS)
The Associate of Science Degree is designed for students planning to transfer to a college or university and requires a minimum of 60 credit hours. All courses included in the degree must be completed with a grade of "C" or better. A minimum of 35 of these credit hours must be completed in the Arizona General Education Curriculum (AGEC-S). The remaining degree requirements are comprised of 25 credit hours or more in the student's elected program of study. Courses numbered 100 or above which transfer as equivalent, departmental elective credit (DEC) or general elective credit (E) will be counted toward this degree. Special Topics courses (298) will not be counted toward this degree.

Associate of Applied Science Degree (AAS)
The Associate of Applied Science Degree prepares students for entry-level employment or upgrades skills of students already employed. This degree requires a minimum of 60 credit hours with a cumulative CCC grade point average of 2.00 or higher. A minimum of 25 of these credit hours must be completed in the General Education Core Curriculum with a grade of "C" or better. Courses numbered below 100 and courses taken for S/U credit will not be counted toward this degree. With the exception of AAS to BAS degrees, these degrees are not intended for transfer to a university, although some courses may be accepted for transfer by universities.

Associate of General Studies Degree (AGS)
The Associate of General Studies Degree is designed for students who wish to broaden their knowledge, but have no university major or vocational goal in mind. This degree requires a minimum of 60 credit hours with a cumulative CCC grade point average of 2.00 or higher. Students must complete a minimum of 24 credit hours of General Education courses but are otherwise free to explore other areas of interest. A minimum of 12 credit hours may be completed in courses numbered below 100. This degree is not recommended for students planning to transfer to a university. The A.G.S. Degree is intended as an alternative degree that recognizes the mission of the community college that education is a lifelong process.

Certificate Programs
Certificate programs are designed to provide specific knowledge to improve existing skills or to prepare students for entry-level employment. Certificates are awarded after successful completion of a series of specific courses. Certificates require a cumulative CCC grade point average of 2.00 or higher. Some certificate programs and/or credit hours may be applied toward other certificates and/or an Associate of Applied Science degree.
Quick Reference to Degrees and Certificate Programs

The following table summarizes the minimum General Education Core Curriculum required for each type of degree offered at CCC. When considering which type of a program is best for you, please note that if you intend to transfer to a university to complete a bachelor's degree, the Associate of Arts, Associate of Business and Associate of Science are the CCC degrees designed for that purpose. The Associate of Applied Science and Associate of General Studies degrees will require additional General Education courses.

Are you planning to transfer to a university?
The Associate of Arts (AA), Associate of Business (ABus) and Associate of Science (AS) degrees are designed to make the transfer process as painless as possible. Be sure to check the particular degree requirements of the university you plan on attending; they may have special requirements. Your advisor will assist you in planning the best program for you. The following is a list of the AA, ABus and AS degrees currently offered at Coconino Community College:

Associate of Arts Degree (AA)
- Administration of Justice
- Construction Management
- Elementary Education
- Fine Arts/Visual Arts
- General Studies
- Hotel & Restaurant Management
- Pre-Social Work
- Psychology
- Sociology
- Vocational Technology Education

Associate of Business (ABus)
- Business Administration

Associate of Science Degree (AS)
- Environmental Science

Are you seeking to broaden your knowledge but have no university major or vocational goal in mind?
The Associate of General Studies (AGS) degree has been designed for you.

Are you interested in improving your skills but may not want to get a degree?
Many courses in certificate programs can be applied to degrees. See your advisor for further information.

The following is a list of Certificates available through CCC:

Certificate Programs
- Accounting Technician
- Alternative Energy Technician
- Assisted Living
- Carpentry Apprenticeship
- Computer Software Technology
- Construction Technology
- Drafting
  - Architectural CAD Technician
  - Computer-Aided Drafting
- Early Childhood Education
- Electrician Apprenticeship
- Electrical Construction Wiring Training
- Employment Success
- Fire Science
- Geographic Information Systems (GIS)
- Hospitality
- Legal Assistant
- Medical Insurance, Coding & Billing
- Medical Office Assistant
- Medical Transcription
- Network Engineering
- Nursing Assistant
- Office Support/Administrative Office Specialist
- Phlebotomy
- Pre-Professional Nursing
- Psychiatric Technician
- Sheet Metal Apprenticeship
Transfer Degrees

Degrees Not Intended for Transfer

Certificate Programs
Transfer Degrees

Associate of Arts: AA Degree

The Associate of Arts Degree is designed for students planning to transfer to a college or university and requires a minimum of 60 credit hours. All courses included in the degree must be completed with a grade of "C" or better. A minimum of 35 of these credit hours must be completed in the Arizona General Education Curriculum (AGEC-A, AGEC-B or AGEC-S). The remaining degree requirements are comprised of 25 credit hours or more in the student's elected program of study.

Courses numbered 100 or above which transfer as equivalent, departmental elective credit (DBC) or general elective credit (E) will be counted toward this degree. Special Topics courses (298) will not be counted toward this degree.

- Administration of Justice
- Construction Management
- Elementary Education
- Fine Arts/Visual Arts
- General Studies
- Hotel & Restaurant Management
- Pre-Social Work
- Psychology
- Sociology
- Vocational Technology Education
Administration of Justice: AA Degree

The Associate of Arts in Administration of Justice is designed for transfer to the Criminal Justice bachelor’s degree at Northern Arizona University (NAU) and Arizona State University (ASU). The program teaches students skills which can be used to enter a wide variety of law enforcement and corrections positions. Students completing this degree will transfer 60-64 credits to NAU or ASU. Students planning to transfer to a university other than NAU or ASU should see an advisor. This degree results in an AGEC-A, which is transferable to all Arizona public universities.

Minimum credit hours required: 60

AGEC-A Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3-5)
MAT 142 Applications of College Algebra (3) or higher

Arts/Humanities (6-9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6-9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8-10)
Any two courses may be taken from the Physical/Biological Sciences category.

General Education Options (0-6)
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements:
25-29 credit hours

Required: 15 credit hours
AJS 101 Introduction to Administration of Justice (3)
AJS 110 The Correction Function (3)
AJS 130 The Police Function (3)
AJS 260 Constitutional Law (3)
AJS 280 Criminology (3)

Electives: 10-14 credit hours
10-14 credits of transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog web site (www.coco.cc.az.us) for the CEG.

Recommended
One course at the 100 level or above in Spanish or Navajo (this course may be used to fulfill the AGEC Options requirement) (4)
SOC 142 Race & Ethnic Relations (3)
SOC 210 Sociology of Gender (3)

1 Placement test and/or prerequisite required.
2 0-6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Transfer Degrees

Construction Management: AA Degree

The Construction Management degree is designed for transfer to the Construction Management bachelor’s degree at Northern Arizona University. Students completing this degree will transfer 64 credits to NAU. This degree results in an AGEC-A, which is transferable to all Arizona public universities. This is a Tech Prep articulated program. For more information about Tech Prep, see page 141.

Minimum credit hours required: 65

AGEC-A Requirements: 37 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101  College Composition I (3)
ENG 102  College Composition II (3)

Mathematics (5)
MAT 187  Pre-Calculus (5)

Arts/Humanities (6)
Courses from two disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
ECN 204  Macroeconomics Principles (3)
BUS 214  Legal, Ethical & Regulatory Issues in Business (3)

Physical/Biological Sciences (8)
PHY 111  College Physics I (4)
PHY 112  College Physics II (4)

General Education Options (6)
SPC 100  Fundamentals of Speech Communication (3)
CIS 120  Introduction to Computer Information Systems (3)

Degree Core requirements:
28 credit hours

Required: 28 credit hours
ACC 101  Principles of Financial Accounting (3)
DFT 125  Architectural Drafting I (3)
DFT 150  Auto CAD 2D (3)
GLG 101  Physical Geology (4)
or
CHM 151  General Chemistry I (4)
ITC 120  Building the Human Environment (3)
ITC 170  Plane Surveying & Building Layout (3)
ITC 180  Building Construction Methods I (3)
ITC 185  Building Construction Methods II (3)
ITC 210  Structural Design & Building Materials (3)

1 Placement test and/or prerequisite required.
Elementary Education: AA Degree

The Associate of Arts in Elementary Education is designed for students planning to transfer to an Elementary Education bachelor's degree program at all Arizona public universities and requires a minimum of 60 credits. Students planning to transfer to a university other than an Arizona public university should see an advisor. This degree results in an AGEC-A, which is transferable to all Arizona public universities.

Requirements (Mathematics, Social/Behavioral Sciences, and Natural Language requirements) differ significantly among state universities. Students should see an advisor to plan their program of study to avoid transfer difficulties.

Minimum credit hours required: 60

AGEC-A Requirements: 35 Credit Hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

**Composition (6)**
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

**Mathematics (3–5)**
MAT 142 Applications of College Algebra (3)
or higher

**Arts/Humanities (6)**
Two courses in Art (ART), Music (MUS), or Theatre (THR) from the approved General Education courses in the Arts/Humanities category.

**Social/Behavioral Sciences (6)**
Two courses from the approved General Education courses in the Social/Behavioral Sciences category. Before selecting these courses see an advisor.

**Highly recommended: (two of the following)**
GEO 133 World/Regional Geography (3)
HIS 131 U.S. History to 1877 (3)
POS 220 Arizona & National Constitution (3)
PSY 101 Introduction to Psychology (3)
SOC 101 Introduction to Sociology (3)

**Physical/Biological Sciences (8–10)**
Any two courses may be taken from the Physical/Biological Sciences category.

**Recommended:**
BIO 105 Environmental Biology (4)

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General Education Options (6)
Two courses from the approved General Education courses in the General Education Options category. A first year of foreign language (101 and 102) is highly recommended.

Degree Core Requirements: 25–30 credit hours

**Required: 25 credit hours**
CIS 102 Computer Literacy (2)
or
CIS 120 Introduction to Computer Information Systems (3)
EDU 200 Introduction to Education (3)
EDU 222 Introduction to Special Education (3)
EDU 230 Cultural Diversity in Education (3)
MAT 130 Math for Elementary Education Teachers I (3)
(MBefore enrolling in MAT 130 see an advisor.)
MAT 131 Math for Elementary Education Teachers II (3)
(MBefore enrolling in MAT 131 see an advisor.)
Two semesters of any second year (201–202) natural human language other than English, including American Sign Language (8).
(MBefore enrolling in a natural human language course see an advisor.)

**Electives: 0–4 credit hours**
0–4 credits of transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog website (www.coco.cc.az.us) for the current CEG.

1 Placement test and/or prerequisite required.
Transfer Degrees

Fine Arts/Visual Arts: AA Degree

The Associate of Arts degree in Fine Arts/Visual Arts is designed for transfer to the Fine Arts bachelor’s degree at all Arizona public universities. The program gives students a strong foundation in visual composition and art history and prepares them to continue their fine arts education in drawing, painting, photography, ceramics, or sculpture. Students completing this degree will transfer 60–64 credits to all Arizona public universities.

Requirements differ significantly among state universities. Students should see an advisor to plan their program of study to avoid transfer difficulties.

Minimum credit hours required: 60

AGEC-A Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 142 Applications of College Algebra (3) or higher

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–10)
Any two courses may be taken from the approved General Education courses in the Physical/Biological Sciences category.

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements: 25 credit hours

Required: 18 credit hours
ART 110 Drawing I (3)
ART 160 Two-Dimensional Design (3)
ART 165 Three-Dimensional Design (3)
ART 201 Art History I (3)
ART 202 Art History II (3)
ART 290 Visual Arts Practicum (3)

Degree Electives: 7 credit hours
Select three hours from electives suggested below or other art courses.

ART 111 Drawing II (3)
ART 120 Ceramics I (3)
ART 150 Photography I (3)
ART 180 Sculpture I (3)
ART 190 Painting I (3)
ART 191 Painting II (3)
ART 210 Life Drawing (3)

Electives: 4 credit hours
Four credits of transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog website (www.coco.cc.az.us) for the CEG.

1 Placement test and/or prerequisite required.
2 0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
General Studies:
AA Degree

The General Studies degree is designed for students who either have undeclared majors or who are developing a general or liberal studies emphasis. Students completing this degree will transfer 60–64 credits to all Arizona public universities. Students planning to transfer to a university other than an Arizona public university should see an advisor.

Minimum credit hours required: 60

There are three pathways in the General Studies degree:

1. General Requirements Pathway
   This pathway requires AGEC-A and fourth semester natural human language proficiency, other than English, including American Sign Language.

2. Special Requirements Pathway
   This pathway requires students to take AGEC-A and some Common Courses. Common Courses are courses that are accepted as a part of the major at all Arizona public universities. The list of Common Courses is determined statewide. See an advisor or check the college catalog web site (www.coco.cc.az.us) for these Common Courses.

3. Science Pathway
   This pathway is designed for students planning to transfer to an Arizona public university with a major requiring rigorous mathematics or mathematics-based science. Students are required to take AGEC-S and courses that will apply toward the major at the university after transfer. Students considering this pathway should meet with an advisor as early as possible.

Depending on the area of interest, one pathway may be more suitable for a student’s educational plan than the other. Students changing pathways may accumulate more credits than necessary for graduation from a university. See an advisor for more information.

1. General Requirements and
2. Special Requirements Pathways

AGEC-A Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 142 Applications of College Algebra (3)
or higher

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–10)
Any two courses may be taken from the Physical/Biological Sciences category.

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

1 Placement test and/or prerequisite required.
2 0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Transfer Degrees

Degree Core Requirements: 25 credit hours

1. General Requirements Pathway

Required: up to 16 credit hours
Fourth semester proficiency in any natural human language, other than English, including American Sign Language.

Electives: 9 or more
Nine credits of transferable courses as stated in the Course Equivalency Guide. These courses must transfer to all Arizona public universities. See an advisor or check the college catalog web site (www.coco.cc.az.us) for the Course Equivalency Guide.

2. Special Requirements Pathway

Depending on your area(s) of interest and/or the university you intend to transfer to, you may need to decide on your transfer plan as early as possible. Please see an advisor to determine your educational plan.

Required
Common Courses in the area(s) of interest/emphasis. See an advisor or check the college catalog web site (www.coco.cc.az.us) for these Common Courses.

Electives
Transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog web site (www.coco.cc.az.us) for the current CEG.

Some university degrees may require 4th semester language proficiency in addition to the Common Courses. See an advisor for more information.

3. Science Pathway

AGEC-S Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101° College Composition I (3)
ENG 102° College Composition II (3)

Mathematics (5)
MAT 220° Calculus & Analytical Geometry I (5)

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–10)
BIO 181° Unity of Life I: Life of the Cell (4) &
BIO 182° Unity of Life II: Multicellular Organisms (4) or
CHM 151° General Chemistry I (5) &
CHM 152° General Chemistry II (5) or
PHY 161° University Physics I (4) &
PHY 262° University Physics II (4)

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

Degree core requirements for the Science Pathway: 25 credit hours

Students in the Science Pathway need to complete CCC courses that will apply toward the requirements of the intended university major. Please see an advisor to design an educational plan.

° Placement test and/or prerequisite required.
° 0-6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
° Students who can complete the 4th semester language proficiency in less than 16 credit hours may choose more elective transferable credits.
Hotel & Restaurant Management: AA Degree

The Associate of Arts in Hotel Restaurant Management is designed for transfer to the Hospitality bachelor’s degree at Northern Arizona University (NAU). This program trains graduates for management careers in one of the fastest growing industries in the United States, the hospitality industry. Students completing this degree will transfer 63–64 credits to NAU. Students planning to transfer to a university other than NAU should see an advisor. This degree results in an AGEC-A, which is transferable to all Arizona public universities. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 63

AGEC-A Requirements: 36 credit hours

See page 21 for courses that will satisfy the General Education requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 142 Applications of College Algebra (3)
or higher

Arts/Humanities (6)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
ECN 204 Macroeconomic Principles (3)
One more course not in Economics from the approved General Education courses in the Social/Behavioral sciences category.

Physical/Biological Sciences (8–10)
Any two courses may be taken from the approved General Education courses in the Physical/Biological Sciences category.

General Education Options (7)
ECN 205 Microeconomic Principles (3)
Second semester proficiency (102 level) in any natural human language, other than English, including American Sign Language. (4)

Degree Core Requirements:
27 credit hours

Required: 27 credit hours
ACC 101 Principles of Financial Accounting (3)
HRM 100 Introduction to Hospitality (3)
HRM 140 Food Production Concepts (3)
HRM 170 Hospitality Information Technology (3)
HRM 210 Guest Service Management (3)
HRM 220 Property Management (3)
HRM 225 Hospitality Accounting (3)
HRM 235 Hospitality Law (3)
HRM 240 Commercial Food Production (3)

1 Placement test and/or prerequisite required.
Pre-Social Work: AA Degree

The Associate of Arts degree in Pre-Social Work is a Transfer Partnership Degree with Northern Arizona University. The Pre-Social Work degree is designed to allow students to satisfy the admission requirements for the Bachelor’s of Social Work (BSW) degree at Northern Arizona University. Completion of the degree does not guarantee admission to the program. Students planning to gain admission to the BSW degree should contact the Department of Sociology and Social Work at Northern Arizona University for specific admission requirements. Please see an advisor for more information regarding this degree.

Minimum credit hours required: 62

AGEC-A Requirements: 35 credit hours

*Composition (6)*
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

*Mathematics (3–5)*
MAT 142 Applications of College Algebra or higher (3–5)

*Arts/Humanities (6–9)*
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

*Social/Behavioral (6–9)*
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

*Physical/Biological Sciences (8–10)*
Any two courses may be taken from the General Education courses in the Physical/Biological Sciences category.

*General Education Options (3–6)*
Courses may be selected from the above categories or from the Options category.

**Required:**
CIS 120 Introduction to Computer Information Systems (3)

Degree Core Requirements: 27–29 credit hours

ECN 204 Macroeconomic Principles (3)
PHI 105 Introduction to Ethics (3)
POS 110 American National Government (3)
PSY 101 Introduction to Psychology (3)
PSY 230 Introduction to Statistics (3)
PSY 240 Developmental Psychology (3)
SOC 142 Race & Ethnic Relations (3)
SOC 210 Sociology of Gender (3)
SOC 220 Introduction to Social Work (3)

*Electives: 0–2 credit hours*
0–2 hours of transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog Web site (www.coco.cc.az.us) for current CEG.

1 Placement test and/or prerequisite required.
2 0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Psychology: AA Degree

The Associate of Arts degree in Psychology is designed for transfer. This degree has two pathways:

1. The Arts Pathway
The Psychology Language Pathway is designed for transfer to the Psychology bachelor of arts (BA) degrees at all Arizona public universities. Students completing this degree will transfer 60–64 credits to all Arizona public universities. Students planning to transfer to a university other than Arizona public universities should see an advisor.

Requirements differ significantly among state universities. Students should see an advisor to plan their program of study to avoid transfer difficulties.

2. The Science Pathway
The Psychology Science Pathway is designed for transfer to the Psychology bachelor of science (BS) degrees at all Arizona public universities. Students completing this degree will transfer 60–64 credits to all Arizona public universities.

Requirements differ significantly among state universities. Students should see an advisor to plan their program of study to avoid transfer difficulties.

Please see an advisor for more information regarding these two pathways.

Minimum credit hours required: 60

AGEC-A Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101\(^1\) College Composition I (3)
ENG 102\(^2\) College Composition II (3)

Mathematics (3–5)
MAT 142\(^1\) Applications of College Algebra (3)
or higher

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–10)
Any two courses may be taken from the General Education courses in the Physical/Biological Sciences category.

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements:
25–29 credit hours

Degree Core Courses:
15–18 credit hours

Required courses:
PSY 101 Introduction to Psychology (3)
PSY 230\(^1\) Introduction to Statistics (3)

Select 9–12 credit hours from the following:
PSY 205 Introduction to Abnormal Psychology (3)
PSY 234 Child Development (3)
PSY 236 Psychology of Women (3)
PSY 280 Health Psychology (3)
PSY 227 Personality Development (3)
PSY 240 Developmental Psychology (3)
PSY 250 Social Psychology (3)
PSY 290 Research Methods (4)

\(^1\) Placement test and/or prerequisite required.
\(^2\) 6-6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Transfer Degrees

Arts Pathway: 8–13 credit hours

a. Natural Human Language 8 credit hours
At least two semesters of any natural human language, other than English, including American Sign Language. Students should note that fourth semester proficiency of any natural human language is required to graduate with a bachelor of arts degree. It is recommended that the requirement be completed at CCC.

Before enrolling in a natural human language course see an advisor.

b. Electives 0–6 credit hours
0-6 credits of transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog web site (www.coco.cc.az.us) for the current CEG.

If you are considering a bachelor of science degree at one of the Arizona universities, it is important that you meet with an advisor as early as possible.

Science Pathway: 11–13 credit hours

Depending on the university you are planning to transfer to, please select one of the following:

a. NAU
MAT 1721 or higher 3–5 credit hours

Any two courses meeting the physical and biological sciences requirements

BIO 2011 and BIO 2021
Recommended 8 credit hours

Before enrolling in the above courses see an advisor.

b. ASU Main and ASU West
Please see an advisor for specific course requirements

MAT 2121 or higher 3–5 credit hours

Any natural human language, other than English, including American Sign Language 8 credit hours.

c. U of A
Please see an advisor for specific course requirements.

MAT 1721 or higher 3–5 credit hours

Any natural human language, other than English, including American Sign Language.

Select a combination of 8 credits from the following:

Language 0–8 credit hours
Lab Science 0–8 credit hours

If you are considering a bachelor of science degree at one of the Arizona universities, it is important that you meet with an advisor as early as possible.

1 Placement test and/or prerequisite required.
Sociology: AA Degree

The Associate of Arts degree in Sociology is designed for transfer to the Sociology bachelor’s degree at all Arizona public universities. Students completing this degree will transfer 61–64 credits to all Arizona public universities.

Requirements differ significantly among state universities. Students should see an advisor to plan their program of study to avoid transfer difficulties.

Minimum credit hours required: 61

AGEC-A Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 142 Applications of College Algebra (3) or higher

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–10)
Any two courses may be taken from the General Education courses in the Physical/Biological Sciences category.

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements: 26–29

Required: 18 credit hours
SOC 101 Introduction to Sociology (3)
SOC 140 Marriage & the Family (3)
SOC 142 Race & Ethnic Relations (3)
SOC 210 Sociology of Gender (3)
PSY 230 Introduction to Statistics (3)

Select one course from the following:
SOC 125 Domestic Violence (3)
SOC 130 Human Sexuality (3)
SOC 132 Social Problems (3)
SOC 200 Women & Health (3)

Language: 8 credit hours
Two semesters of any natural human language other than English, including American Sign Language.

Electives: 0–3 credit hours
0–3 credits of transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog web site (www.coco.cc.az.us) for the current CEG.

1 Placement test and/or prerequisite required.
2 0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
3 If the student has satisfied the language requirement through an approved proficiency exam, she can select up to 9 additional credit hours in psychology, political science, administration of justice, or education.
Vocational Technology Education: AA Degree

The Vocational Technology Education program is designed for transfer to the Vocational Technology Education bachelor's degree at Northern Arizona University (NAU). Students completing this degree will transfer 60–64 credits to NAU. Students planning to transfer to a university other than NAU should see an advisor. This degree results in an AGEC-A, which is transferable to all Arizona public universities. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 60

AGEC-A Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101 College Composition I (3)
ENG102 College Composition II (3)

Mathematics (5)
MAT 187 Pre-Calculus (5)

Arts/Humanities (6)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
POS 220 Arizona & National Constitution (3)
One more course not in Political Science from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–9)
Select one chemistry and one physics course from the following:
CHM 130 Fundamental Chemistry (4)
CHM 151 General Chemistry I (5)
PHY 111 College Physics I (4)

or

Complete 8 credits of physics below:
PHY 111 College Physics I (4)
PHY 112 College Physics II (4)

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements:
25–27 credit hours

Required: 3 credit hours
EDU 200 Introduction to Education (3)

Electives: 22–24 credit hours
Choose any 22–24 elective credit hours of transferable courses as stated in the Course Equivalency Guide (available from an advisor or on the web at www.coco.cc.az.us) that transfer to NAU as DEC(VTE) or equivalent from any of the following areas:
AUT Automotive
DFT Drafting
ELT Electronics
ITC Industrial Technology Construction
MIT Manufacturing & Industrial Technology

Placement test and/or prerequisite required.
4-6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Associate of Business: ABus Degree

The Associate of Business Degree is designed for students planning to transfer to a college or university and requires a minimum of 62 credit hours. All courses included in the degree must be completed with a grade of "C" or better. A minimum of 35 of these credit hours must be completed in the Arizona General Education Curriculum (AGEC-B). The remaining degree requirements are comprised of 25 credit hours or more in the student's elected program of study. Courses numbered 100 or above which transfer as equivalent, departmental elective credit (DEC) or general elective credit (E) will be counted toward this degree. Special Topics courses (298) will not be counted toward this degree. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 62

AGEC-B Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Note: Associate of Business degree core courses may not be used to satisfy AGEC-B requirements.

Composition (6)
ENG 101\(^1\) College Composition I (3)
ENG 102\(^2\) College Composition II (3)

Mathematics (3–5)
MAT 212\(^1\) Business Calculus (3)
or higher

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (8–10)
Any two courses may be taken from the General Education courses in the Physical/Biological Sciences category.

General Education Options (0–6)
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements: 27–28 credit hours

Required: 24 credit hours
ACC 101\(^1\) Principles of Financial Accounting (3)
ACC 102\(^1\) Principles of Managerial Accounting (3)
BUS 214\(^2\) Legal, Ethical & Regulatory Issues in Business (3)
BUS 232\(^2\) Business Statistics & Analysis (3)
CIS 120 Introduction to Computer Information Systems (3)
ECN 204\(^1\) Macroeconomic Principles (3)
ECN 205 Microeconomic Principles (3)
MAT 172\(^2\) Finite Mathematics (3)

Business Electives: 3–4 credit hours
BUS 204\(^1\) Business Communications (3)
or
CIS 220\(^1\) Applications Programming I (4)

\(^1\) Placement test and/or prerequisite required.
\(^2\) 0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Transfer Degrees

Associate of Science: AS Degree

The Associate of Science Degree is designed for students planning to transfer to a college or university and requires a minimum of 60 credit hours. All courses included in the degree must be completed with a grade of "C" or better. A minimum of 35 of these credit hours must be completed in the Arizona General Education Curriculum (AGEC-S). The remaining degree requirements are comprised of 25 credit hours or more in the student's elected program of study. Courses numbered 100 or above which transfer as equivalent, departmental elective credit (DEC) or general elective credit (E) will be counted toward this degree. Special Topics courses (298) will not be counted toward this degree.

- Environmental Science
Environmental Science: AS Degree

The Associate of Science in Environmental Science is designed for transfer to the Environmental Sciences bachelor's degree at Northern Arizona University (NAU). Students completing this degree will transfer 60-64 credits. This degree includes an AGEC-S which is transferable to all Arizona Public Universities.

Requirements differ significantly among state universities. Students should see an advisor to plan their program of study to avoid transfer difficulties.

Minimum credit hours required: 60

AGEC-S Requirements: 35 credit hours

See page 21 for General Education Courses that can be used to satisfy AGEC requirements.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (5)
MAT 220 College Calculus & Analytical Geometry I (5)

Arts/Humanities (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral (6–9)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral category.

Laboratory Sciences (10)
CHM 151 General Chemistry I (5)
CHM 152 General Chemistry II (5)

General Education Options (0–6)*
Courses may be selected from the above categories or from the Options category.

Degree Core Requirements: 25–27

Degree Emphasis Area for Biology: 19 credit hours
BIO 181 Unity of Life I: Life of the Cell (4)
BIO 182 Unity of Life II: Multicellular Organisms (4)
CIS 120 Introduction to Computer Information Systems (3)
MAT 160 Introduction to Statistics (3)
MAT 187 Pre-Calculus (5)

Degree Emphasis Area for Chemistry: 21 credit hours
MAT 160 Introduction to Statistics (3)
MAT 187 Pre-Calculus (5)
MAT 230 Calculus & Analytic Geometry II (5)
PHY 161 University Physics I (4)
PHY 262 University Physics II (4)

Degree Emphasis Area for Environmental Management: 20 credit hours
BIO 181 Unity of Life I: Life of the Cell (4)
BIO 182 Unity of Life II: Multicellular Organisms (4)
CIS 120 Introduction to Computer Information Systems (3)
MAT 160 Introduction to Statistics (3)
PHI 105 Introduction to Ethics (3)
POS 140 Introduction to Public Administration (3)

Degree Emphasis Area for Applied Geology: 20 credit hours
GLG 101 Physical Geology (4)
GLG 102 Historical Geology (4)
MAT 160 Introduction to Statistics (3)
MAT 187 Pre-Calculus (5)
PHY 111 College Physics I (4)
or
PHY 161 University Physics I (4)

Degree Emphasis Area for Microbiology: 20 credit hours
BIO 181 Unity of Life I: Life of the Cell (4)
BIO 182 Unity of Life II: Multicellular Organisms (4)
GLG 101 Physical Geology (4)
MAT 160 Introduction to Statistics (3)
MAT 187 Pre-Calculus (5)

* Placement test and/or prerequisite required.
* 0–6 hours may be taken in the Options category as needed to complete the minimum 35 hours required for the AGEC.
Transfer Degrees

Elective credits: 4–6 credits
4–6 credits of advisor-approved transferable courses as stated in the Course Equivalency Guide (CEG). These courses must transfer to all Arizona public universities. See an advisor or check the college catalog website (www.coco.cc.az.us) for the CEG.

While the below courses are suggested, the student may take any course, which fulfills the requirements. Courses suggested for each emphasis area:

**Biology**
- BIO 105: Environmental Biology
- BIO 109: Natural History of the Southwest
- ENV 150: Introduction to Environmental Engineering

**Chemistry**
- CHM 190: Environmental Chemistry (3)
- ENV 150: Introduction to Environmental Engineering

**Environmental Management**
- BIO 105: Environmental Biology
- BIO 109: Natural History of the Southwest
- ENV 150: Introduction to Environmental Engineering
- POS 233: Global Environmental Politics

**Applied Geology**
- BIO 109: Natural History of the Southwest
- ENV 150: Introduction to Environmental Engineering

**Microbiology**
- BIO 109: Natural History of the Southwest
- ENV 150: Introduction to Environmental Engineering
- BIO 205: Microbiology

Note: BIO 2051 Microbiology at CCC does not substitute for BIO 220 at NAU.

1 Placement test and/or prerequisite required.
Associate of Applied Science: AAS Degree

The Associate of Applied Science Degree prepares students for entry-level employment or upgrades skills of students already employed. This degree requires a minimum of 60 credit hours with a cumulative CCC grade point average of 2.00 or higher. A minimum of 25 of these credit hours must be completed in the General Education Core Curriculum with a grade of "C" or better. Courses numbered below 100 and courses taken for S/U credit will not be counted toward this degree. This degree is not intended for transfer to a university, although many courses may be accepted for transfer by universities.

- Administration of Justice
- Alternative Energy Technology
- Architectural Design Technology
- Business Technologies
- Carpentry Apprenticeship
- Computer Software Technology
- Construction Technology
- Early Childhood Education
- Fire Science
- Hospitality Management
- Medical Office Assistant
- Network Engineering
- Nursing
- Office Information Systems
- Paralegal Studies
- Sheet Metal Apprenticeship
Administration of Justice: AAS Degree

The Administration of Justice AAS program is designed to prepare students to enter the workforce in the criminal justice arena. This program teaches students specific knowledge and skills, which will assist in securing employment in a wide variety of law enforcement and corrections/juvenile detention positions.

Minimum credit hours required: 62

General Education Requirements: 29 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 142 Applications of College Algebra (3)
or higher

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
Any approved General Education courses in the Social/Behavioral Sciences category.
Recommended
SOC 142 Race & Ethnic Relations (3)
or
SOC 210 Sociology of Gender (3)

Physical/Biological Sciences (8–10)
Any approved General Education courses in the Physical/Biological Sciences category.

Degree Core Requirements: 33 credit hours

Required: 33 credit hours
AJS 101 Introduction to Administration of Justice (3)
AJS 105 Juvenile Detention Studies (3)
AJS 110 The Correction Function (3)
AJS 120 Substantive Criminal Law (3)
AJS 150 Rules of Criminal Procedure (3)
AJS 160 Police Administration (3)
AJS 200 Community Relations (3)
AJS 220 Rules of Evidence (3)
AJS 230 Crime & Deviant Behavior (3)
AJS 240 Juvenile Justice Procedure (3)
AJS 280 Criminology (3)

1 Placement test and/or prerequisite required.
Alternative Energy Technology: AAS Degree

The Associate of Applied Science in Alternative Energy Technology will provide students with the skills to pursue a career in the Alternative Energy field. The student will be instructed through mastery learning components and field study workshops arranged with local contractors. Students may apply credit hours earned in the Construction Technology Certificate toward completion of the AAS degree. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum hours required: 61

General Education Requirements: 25–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 121 Intermediate Algebra with Review (4) or higher

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
Any approved General Education courses in the Social/Behavioral Sciences category.

Required:
ECN 205 Microeconomics Principles (3)

Physical/Biological Sciences (4–5)
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements:
36 credit hours

CIS 120 Introduction to Computer Information Systems (3)
DFT 125 Architectural Drafting I (3)
ITC 101 Construction Safety (3)
ITC 111 Uniform Building Code (3)
ITC 120 Building the Human Environment (3)
ITC 135 Solar Home Design (3)
ITC 136 Photovoltaics & Wind Power (3)
ITC 140 Blueprint Reading (3)
ITC 150 Electrical Wiring I (3)
ITC 180 Building Construction Methods I (3)
ITC 185 Construction Methods II (3)
MAT 124 Technical Problem Solving (3)

1 Placement test and/or prerequisite required.
2 May substitute ITC 298 with consent of Division Chair.
3 May substitute MAT 187.
Architectural Design Technology: AAS Degree

The Architectural Design Technology program trains students for architectural drafting careers in one of the fastest growing technologies in the United States. As an architectural design technician, the draftsperson will interpret engineering data, develop sketches, designs, and working drawings for construction. Many technicians are valuable members of architectural/engineering teams in industry. Using the technology of Computer Aided Drafting, students will develop drafting skills in both 2D and 3D. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 64

General Education Requirements: 25–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
- ENG 101 College Composition I (3)
- ENG 102 College Composition II (3)

Mathematics (3–5)
- MAT 124 Technical Problem Solving (3)
- MAT 187 Pre-calculus (5)

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
Any approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (4–5)
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements:
39 credit hours

Required: 33 credit hours
- DPT 110 Technical Drafting & CAD Fundamentals (3)
- DPT 125* Architectural Drafting I (3)
- DPT 150* AutoCAD 2D (3)
- DPT 200* AutoCAD 3D (3)
- DPT 225* Architectural Drafting I – CAD (3)
- DPT 260* Architectural Drafting II – CAD (3)
- ITC 111 Uniform Building Code (3)
- ITC 120 Building the Human Environment (3)
- ITC 140 Blueprint Reading & Estimating (3)
- ITC 180 Building Construction Methods I (3)
- ITC 210 Structural Design & Building Materials (3)

Electives: 6 credit hours
Select 6 credit hours from the following courses:
- ITC 170 Plane Surveying & Building Layout (3)
- ITC 171 Electrical Construction Wiring (3)
- ITC 175 Mechanical Systems (3)
- ITC 185 Building Construction Methods II (3)

* Placement test and/or prerequisite required.
Business Technologies:
AAS Degree

The Business Technologies program is designed to prepare students to enter the business profession at an entry-level position with options in General Business Management, Small Business Management, and Accounting Specialist by providing them with general knowledge and skills specializing in an area of interest. The program allows students the option of selecting support courses to strengthen their overall education and courses in their area of special interest or job opportunity. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 60

General Education Requirements: 25-28 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

**Composition (6)**
- ENG 101 College Composition I (3)
- ENG 102 College Composition II (3)

**Mathematics (3-5)**
- BUS 100 Mathematics of Business (3)
- MAT 121 Intermediate Algebra with Review (4) or higher

**Arts/Humanities (6)**
- Any approved General Education courses in the Arts/Humanities category.

**Social/Behavioral Sciences (6)**
- ECN 204 Macroeconomic Principles (3)
- ECN 205 Microeconomic Principles (3)

**Physical/Biological Sciences (4-5)**
- Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements: 41 credit hours

**Required: 29 credit hours**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACC 101</td>
<td>Principles of Financial Accounting (3)</td>
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<tr>
<td>ACC 102</td>
<td>Principles of Managerial Accounting (3)</td>
</tr>
<tr>
<td>ACC 110</td>
<td>Payroll Accounting (3)</td>
</tr>
<tr>
<td>BUS 203</td>
<td>Business Law (3)</td>
</tr>
<tr>
<td>BUS 214</td>
<td>Legal, Ethical, &amp; Regulatory Issues in Business (3)</td>
</tr>
<tr>
<td>BUS 204</td>
<td>Business Communications (3)</td>
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<tr>
<td>BUS 206</td>
<td>Principles of Management (3)</td>
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<tr>
<td>BUS 207</td>
<td>Principles of Marketing (3)</td>
</tr>
<tr>
<td>CIS 120</td>
<td>Introduction to Computer Information Systems (3)</td>
</tr>
<tr>
<td>CIS 122</td>
<td>Introduction to MS Word (2)</td>
</tr>
<tr>
<td>CIS 123</td>
<td>Introduction to Excel Spreadsheets (2)</td>
</tr>
</tbody>
</table>

**Specialization Options: 12 credit hours**

**General Business Management**
- ACC 109 Budget & Forecasting (3)
- BUS 216 Principles of Business Finance (3)

Six credit hours selected from ACC, BUS, LDR courses in consultation with a business advisor (6)

**Small Business Management**
- BUS 211 Human Resources/Personnel Management (3)
- BUS 213 Small Business Management (3)
- BUS 216 Principles of Business Finance (3)

Three credit hours selected from ACC, BUS, or LDR courses in consultation with a business advisor (3)

**Accounting Specialist**
- Nine credit hours selected from ACC courses in consultation with a business advisor (9)

Three credit hours selected from BUS, ACC, or LDR courses in consultation with a business advisor (3)

1 Placement test and/or prerequisite required.
Carpentry Apprenticeship: AAS Degree

The Associate of Applied Science in Carpentry Apprenticeship will prepare students with the trade skills related to a career in carpentry. Completion of this degree involves completion of all carpenter union-related qualification requirements of "step" trade-work experience as well as all union-related classroom training required to achieve "journeyman" status.

Minimum hours required: 65

General Education Requirements: 25 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

**Composition (6)**
- ENG 101 College Composition I (3)
- ENG 102 College Composition II (3)
  or
- ENG 135 Career Communication (3)
- ENG 136 Career Writing (3)

**Mathematics (3–5)**
- MAT 124 Technical Problem Solving (3)
  or higher

**Arts/Humanities (6)**
Any approved General Education courses in the Arts/Humanities category.

**Social/Behavioral Sciences (6)**
Any approved General Education courses in the Social/Behavioral Sciences category.

**Physical/Biological Sciences (4–5)**
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements: 40 credit hours

- ITC 130 Introduction to the Carpentry Industry (5)
- ITC 131 Carpentry Math Applications & Metrics (5)
- ITC 132 Print Reading & Advanced Blueprints (5)
- ITC 133 Concrete Formwork (5)
- ITC 220 Framing Walls, Roofs & Decks (5)
- ITC 221 Carpentry Industry Technology (5)
- ITC 222 Interior Systems (5)
- ITC 223 Interior Finish (5)

1 Placement test and/or prerequisite required.
Computer Software Technology: AAS Degree

The Associate of Applied Science Degree in Computer Software Technology is designed to prepare students for entry-level positions requiring computer software application skills and/or the ability to support end-users. The program offers emphases in PC Technician, Graphic and Web Design and Application Software Specialist. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 61

General Education Requirements: 26–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101¹ College Composition I (3)
ENG 102¹ College Composition II (3)

Mathematics (4)
MAT 151¹ College Algebra (4)

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
BUS 214¹ Legal, Ethical, & Regulatory Issues in Business (3)

Any approved General Education course in the Social/Behavioral Sciences category.

Physical/Biological Sciences (4–5)
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements: 35 credit hours

Required: 35 credit hours
BUS 204¹ Business Communications (3)
CIS 110 Windows, the Internet and Online learning (3)
CIS 111 Principles of Programming (2)
CIS 120 Introduction to Computer Information Systems (3)
CIS 122 Introduction to MS Word (2)
CIS 123 Introduction to Excel Spreadsheets (2)
CIS 125 Introduction to Databases (3)
CIS 220¹ Computer Programming I (4)
CIS 222¹ Advanced MS Word (2)

Degree Elective Tracks: 11 credit hours

Select at least 11 credit hours from one of the following tracks:

PC Technician Track (11):
CIS 130 Microcomputer Repair With A+ (3)
CIS 135 Microcomputer Repair A+ OS (3)
CIS 230 Implementing and Supporting Windows (4)
CIS 161 UNIX/Linux (4)
INT 210 Internship (1-6)
CIS 298 Special Topics (1-6)

Graphics and Web Design Track (11):
ART 130 Computer Graphics (3)
CIS 117 Introduction to Web Page Design (2)
CIS 217 Web Publishing I (3)
CIS 127 Introduction to Desktop Publishing (3)
ART 135 Photoshop (2)
ART 136 Digital Photography (2)
INT 210 Internship (1-6)
CIS 298 Special Topics (1-6)

Application Software Specialist Track (11):
CIS 113 Introduction to PowerPoint (1)
CIS 117 Introduction to Web Page Design (2)
CIS 127 Introduction to Desktop Publishing (3)
CIS 217 Web Publishing I (3)
CIS 223 Advanced Excel Spreadsheets (2)
INT 210 Internship (1-6)
CIS 298 Special Topics (1-6)

General Technology Track (11):
ART 130 Computer Graphics (3)
CIS 130 Basic Microcomputer Repair (2)
CIS 113 Introduction to PowerPoint (1)
CIS 117 Introduction to Web Page Design (2)
CIS 223 Advanced Excel Spreadsheets (2)
CIS 230 Implementing and Supporting Windows (4)
INT 210 Internship (1-6)
CIS 298 Special Topics (1-6)

¹ Placement test and/or prerequisite required.
Construction Technology: AAS Degree

The Associate of Applied Science degree in Construction Technology provides students with the skills to pursue a career in the construction trades or in construction management. Students will be instructed through mastery learning components and field study workshops arranged with local contractors. Students may apply credit hours earned in the Construction Technology Certificate toward completion of the AAS degree. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 64

General Education Requirements: 25–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 124 Technical Problem Solving (3) or
MAT 187 Pre-calculus (5)

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
Any approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (4)
Any approved General Education courses in the Physical/Biological Sciences category.

Degree Core Requirements: 39 credit hours

Required: 30 credit hours
DFT 125* Architectural Drafting I (3)
DFT 150* AutoCAD 2D (3)
ITC 111 Uniform Building Code (3)
ITC 120 Building the Human Environment (3)
ITC 140 Blueprint Reading & Estimating (3)
ITC 171 Electrical Construction Wiring (3)
ITC 175 Mechanical Systems (3)
ITC 180 Building Construction Methods I (3)
ITC 185 Building Construction Methods II (3)
ITC 230 Construction Supervision, Scheduling & Project Management (3)

Degree Electives: 9 credit hours
DFT 200* AutoCAD 3D (3)
DFT 225* Architectural Drafting I − CAD (3)
ITC 210* Structural Design & Building Materials (3) or
Any nine credits from Accounting or Business in consultation with an advisor.
A business ethics course is recommended.

* Placement test and/or prerequisite required.
Early Childhood Education: AAS Degree

The Associate of Applied Science degree in Early Childhood Education is designed to prepare students for positions within the field of Early Childhood Education. Students may apply credit hours earned in the Certificate in Early Childhood Education toward this degree. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 62

General Education Core Requirements: 26 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (4)
MAT 121 Intermediate Algebra with Review (4)

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category

Social/Behavioral Sciences (6)
Required:
PSY 101 Introduction to Psychology (3)
Any approved General Education course in the Social/Behavioral Science category (3)

Physical/Biological Sciences (4–5)
Any approved General Education course in the Physical/Laboratory Science category (4)

Degree Core Requirements: 36 credit hours

Required: 30 credit hours
ECE 100 Introductions to Early Childhood Education (3)
ECE 110 Early Childhood Curriculum (3)
ECE 120 Health, Safety, & Nutrition for the Young Child (3)
ECE 200 Child Guidance (3)
ECE 210 Creative Arts for the Young Child (3)
ECE 220 Language Arts for the Young Child (3)
ECE 230 Exploration & Discovery for the Young Child (3)
ECE 240 School, Family, & Community Relations (3)
ECE 250 Children with Special Needs (3)
PSY 234 Child Development (3)

Degree electives: 6 credit hours:
Select six credit hours from the following courses:
MAT 130 Math for Elementary School Teachers I (3)
MAT 131 Math for Elementary School Teachers II (3)
EDU 200 Introduction to Education (3)
SPC 100 Fundamentals of Speech Communication (3)
POS 220 Arizona & National Constitution (3)

1 Placement test and/or prerequisite required.
Fire Science: AAS Degree

The Fire Science program is designed to prepare students to enter the Fire Science profession by providing them with knowledge and skills which can be used to enter a wide variety of positions. The program allows students the option of selecting courses emphasizing emergency medical, fire suppression, or fire prevention.

Minimum credit hours required: 69

General Education Requirements: 26–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

**Composition (6)**
- ENG 101\(^1\) College Composition I (3)
- ENG 102\(^2\) College Composition II (3)

**Mathematics (4)**
- MAT 151\(^1\) College Algebra (4)

**Arts/Humanities (6)**
Any approved General Education courses in the Arts/Humanities category.

**Social/Behavioral Sciences (6)**
Any approved General Education courses in the Social/Behavioral Sciences category.

**Physical/Biological Sciences (4–5)**
Choose one of the following:
- BIO 100\(^1\) Biology Concepts (4)
- BIO 105\(^2\) Environmental Biology (4)
- BIO 181\(^1\) Unity of Life: Life of the Cell (4)
- CHM 130\(^1\) Fundamental Chemistry (4)
- CHM 151\(^1\) General Chemistry I (5)
- PHY 111\(^1\) College Physics I (4)

Degree Core Requirements: 43 credit hours

**Required: 34 credit hours**
- EMS 131 Emergency Medical Technician (7)
- FSC 105 Fire Fighter I & II (8)
- FSC 135 Fundamentals of Fire Prevention (3)
- FSC 136 Fire Apparatus & Hydraulics (4)
- FSC 138 Hazardous Materials/First Responder (3)
- FSC 236 Firefighter Occupational Safety (3)
- FSC 238\(^1\) Emergency Scene Management (3)
- FSC 239\(^1\) Fire Department Company Officer (3)

**Degree Electives: 9 credit hours**
Select nine credit hours from the following:
- BUS 209 Principles of Supervision (3)
- BUS 211 Human Resources/Personnel Management (3)
- EMS 211\(^1\) Emergency Medical Technician Refresher (2)
- EMS 252 Intermediate Emergency Medical Technician I (13)
- FSC 101 Fire Service Orientation & Indoctrination (2)
- FSC 137 Hazardous Materials/First Responder Awareness (0.5)
- FSC 233 Wildland Fire Suppression (3)
- FSC 234 Fire Investigation (3)
- FSC 235\(^1\) Fire Protection Systems (3)
- FSC 241 Firefighter Safety & Building Construction (3)

\(^1\) Placement test and/or prerequisite required.
Hospitality Management:
AAS Degree

The Hospitality Management program prepares students for entry-level management careers in the hospitality industry. Students completing this degree will develop knowledge and skills necessary to compete in one of Arizona's fastest growing businesses. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 61

General Education Requirements: 25–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

**Composition (6)**
- ENG 101\(^1\) College Composition I (3)
- ENG 102\(^1\) College Composition II (3)
- or
- ENG 135 Career Communications (3)
- ENG 136\(^1\) Career Writing (3)

**Mathematics (3–5)**
- BUS 100\(^1\) Mathematics of Business (3)
- or
- MAT 121\(^1\) Intermediate Algebra with Review (4)
or higher

**Arts/Humanities (6)**
- Any approved General Education courses in the Arts/Humanities category.

**Social/Behavioral Sciences (6)**
- Any approved General Education courses in the Social/Behavioral Sciences category.

**Physical/Biological Sciences (4–5)**
- Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements:
36 credit hours

*Required: 27 credit hours*
- BUS 206 Principles of Management (3)
- BUS 209 Principles of Supervision (3)
- BUS 218 Customer Service (3)
- CIS 120 Introduction to Computer Information Systems (3)
- HRM 100 Introduction to Hospitality (3)
- HRM 235 Hospitality Law (3)
- SPC 100 Fundamentals of Speech Communication (3)

**School Emphasis:**
- HRM 210 Guest Service Management (3)
- HRM 220 Property Management (3)

**Restaurant Emphasis:**
- HRM 140 Food Production Concepts (3)
- HRM 240 Commercial Food Production (3)

**Specialization Options: 9 credit hours**
Select nine credit hours from the following:
- ACC 101\(^1\) Principles of Financial Accounting (3)
- BUS 204 Business Communications (3)
- BUS 211 Human Resources/Personnel Management (3)
- BUS 214 Legal, Ethical & Regulatory Issues in Business (3)
- ECN 204\(^1\) Macroeconomic Principles (3)
- ECN 205 Microeconomic Principles (3)
- HRM 170 Hospitality Information Technology (3)
- HRM 225 Hospitality Accounting (3)

\(^1\) Placement test and/or prerequisite required.
Medical Office Assistant: AAS Degree

The Medical Office Assistant degree program prepares students for the varied and expanded responsibilities involved in working within medical offices today. Students will receive training in numerous areas, which will give them a complete understanding of the intricate workings within today's medical businesses. Graduates will have the skills necessary to obtain a position as a medical office assistant that will be able to perform numerous duties in the front office. Additionally, graduates from the degree program will have training in writing, mathematics and additional subject areas.

Minimum credit hours required: 61

General Education Core Requirements: 25–28 credit hours

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
MAT 142 or higher (3–5)

Arts/Humanities (6)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category

Social/Behavioral (6)
Any approved General Education courses in the Social and Behavioral Sciences category.

Lab Science (4–5)
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements: 36–37 credit hours

Required: 30 credit hours
AHS 100 Introduction to Health Services (3)
AHS 105 Communication & Behavior in the Health Care Setting (3)
AHS 110 Health Care Ethics & Law (3)
AHS 131 Medical Terminology (3)
AHS 135 Medical Coding, Insurance, & Billing (3)
AHS 137 Back Office Procedures (3)
OIS 130 Machine Transcription (3)
CIS 120 Introduction to Computer Information Systems (3)
BUS 204 Business Communications (3)
INT 210 Internship (3)

Degree Electives: 6 credit hours
Select a minimum of six credit hours from the following courses:

AHS 160 Phlebotomy Procedures (3)
AHS 160 Phlebotomy Practicum (4)
CIS 117 Introduction to Web Pages (2)
CIS 123 Introduction to Spreadsheets (2)
CIS 125 Introduction to Database (3)
OIS 110 Keyboarding Review & Speed (3)
OIS 200 Professional Office Skills (3)

Note: AHS 161 must be taken in conjunction with AHS 160.

1 Placement test and/or prerequisite required.
Network Engineering:
AAS Degree

The Associate of Applied Science Degree in Network Engineering is designed to prepare students for positions requiring technical networking skills and the ability to support businesses. The program provides students with knowledge and skills appropriate for networking occupations and the opportunity to select courses to strengthen their overall education.

Minimum credit hours required: 62

General Education Requirements: 26–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (4)
MAT 151 College Algebra

Arts/Humanities (6)
Courses from two or more disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
Courses from two or more disciplines must be selected from the approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (4–5)
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements:
36 credit hours

Required: 36 credit hours

CIS 140 Cisco Networking Academy Semester 1 (4)
CIS 150 Cisco Networking Academy Semester 2 (4)
CIS 160 Cisco Networking Academy Semester 3 (4)
CIS 170 Cisco Networking Academy Semester 4 (4)
CIS 230 Implement & Supporting Windows (4)
CIS 120 Introduction to Computer Information Systems (3)
CIS 161 Unix Semester 1 (4)
CIS 130 Microcomputer Repair with A+ (3)
CIS 135 Microcomputer Repair A+ OS (3)
BUS 214 Legal, Ethical, & Regulatory Issues in Business (3)

Electives: 0–6 credit hours

CIS 112 Introduction to Windows (2)
CIS 171 Unix Semester 2 (4)
INT 210 Internship (1-6)
CIS 298 Special Topics

1 Placement test and/or prerequisite required.
Nursing: AAS Degree

The Associate of Applied Science degree in Nursing prepares the student for licensure as a Registered Nurse (RN). This program is designed to prepare graduates for entry level nursing positions in a variety of health care settings. The AAS degree in Nursing provides the graduate with an educational foundation for articulation into a university setting. This program has additional and specific admission requirements. Please contact the college Director of Nursing for further information.

Minimum credit hours required: 72

General Education Core Requirements: 34 credit hours

**Composition (6)**
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

**Mathematics (4)**
MAT 151 College Algebra (4)

**Arts/Humanities (6)**
Any approved general education courses in the Arts/Humanities Category.

Recommend courses in two different prefixes

**Social/Behavioral (6)**
PSY 10 Intro to Psychology (3)
PSY 240 Developmental Psychology (3)

**Lab Science (12)**
BIO 201 Anatomy & Physiology I (4)
BIO 202 Anatomy & Physiology II (4)
BIO 205 Microbiology (4)

Degree Core Requirements: 38 credit hours

**Required: 38 credit hours**
NUR 114 Nursing Pharmacology (1)
NUR 116 Foundations of Nursing (8)
NUR 122 Adult Nursing (9)
NUR 210 Mental Health Nursing (3)
NUR 212 Nursing the Childbearing Family (3)
NUR 214 Nursing of Children (3)
NUR 220 Advanced Nursing (7)
NUR 224 Nursing Management (4)

**Program Pre-requisites: 8-17 credit hours**
MAT 151 College Algebra (4)
BIO 181 Unity of Life I: Life of a Cell (4)
CHM 130 Fundamentals of Chemistry (4)
or
1 year high school chemistry within the past 5 years, CNA Certificate, may include
NUR 110 (4) and
NURI 111 (1)

1 Placement and/or prerequisite required.
Office Information Systems: AAS Degree

The Office Information Systems program is designed to prepare students to enter a professional office at an entry-level position. The program provides students with an understanding of technology and basic workplace skills that can be applied to a wide variety of office positions. The program allows students the option of selecting support courses to strengthen their overall education and courses in their area of special interest or job opportunity. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 67

General Education Requirements: 25–28 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)

Mathematics (3–5)
BUS 100 Mathematics of Business (3)
or
MAT 121 Intermediate Algebra with Review (4) or higher

Arts/Humanities (6)
Any approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
Any approved General Education courses in the Social/Behavioral Sciences category.

Physical/Biological Sciences (4–5)
Any approved General Education course in the Physical/Biological Sciences category.

Degree Core Requirements: 42–43 credit hours

Required: 35 credit hours

ACC 100 Practical Accounting Procedures (5)
OIS 200 Professional Office Skills (3)
BUS 111 Business English (3)
CIS 112 Introduction to Windows (2)
CIS 113 Introduction to PowerPoint (1)
CIS 120 Introduction to Computer Information Systems (3)
CIS 115 Introduction to Internet (1)
CIS 123 Introduction to Excel Spreadsheets (2)
CIS 122 Introduction to MS Word (2)
CIS 125 Introduction to Databases (3)
OIS 110 Keyboarding Review & Speed (3)
OIS 130 Machine Transcription (3)
OIS 210 Keyboarding with Applications (3)
LDR 115 Workplace Ethics (1)

Specialization Options: 7–8 credit hours

General Office Information
Seven-eight credit hours of any advisor-approved courses consistent with degree goals/focus.

Legal
OIS 240 Legal Transcription (3)
AJS 101 Introduction to Administration of Justice (3)
Two credit hours of any advisor-approved courses consistent with degree goals/focus

Medical
AHS 131 Medical Terminology I (3)
OIS 230 Medical Transcription I (3)
Two credit hours of any advisor-approved courses consistent with degree goals/focus

Optional: 1–6 credit hours

INT 210 Internship I (1–6)

¹ Placement test and/or prerequisite required.
² It is strongly recommended that students enroll in this optional course in addition to the required credit hours for completion of the AAS degree in Office Information Systems. Please see catalog for course description.
Paralegal Studies: AAS Degree

The Paralegal Program is designed to prepare students to enter the workforce in an advanced capacity to assist in a legal environment. It will provide the student with the knowledge and skills to obtain employment in the fast-paced legal field of today. Students should be prepared for a rigorous course of study, which will demand intense oral, written and listening communication and research skills. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 70

General Education Requirements: 26–27 credit hours

See page 21 for courses that will satisfy General Education Requirements below.

Composition (6)
ENG 1011 College Composition I (3)
ENG 1021 College Composition II (3)

Mathematics (4)
MAT 1511 College Algebra (4)

Arts/Humanities (6)
Courses from two disciplines must be selected from the approved General Education courses in the Arts/Humanities category.

Social/Behavioral Sciences (6)
BUS 203 Business Law (3) & One course from the approved General Education courses in the Social and Behavioral Sciences category.

Physical/Biological Sciences (4–5)
Any approved General Education courses in the Physical/Biological Sciences category.

Degree Core requirements: 44–45 credit hours

Required: 44–45 credit hours
PAR 100 Introduction to Paralegal Studies (3)
PAR 1041 Will, Trusts & Probate (3)
PAR 1051 Legal Computer Applications (2)
PAR 2031 Family Law (3)
PAR 2091 Administrative Law (2)
or
AJS 209 Jurisdictional Issues on Federal & Indian Land (3)
PAR 2101 Bankruptcy Procedures (2)
PAR 2151 Legal Research & Writing 1 (3)
PAR 2161 Legal Research & Writing 2 (3)
PAR 2201 Civil Tort Litigation I (3)
PAR 2211 Civil Tort Litigation II (3)
RES 105 Real Estate Law (3)
CIS 122 Introduction to MS Word (2)
AJS 1501 Rules of Criminal Procedure (3)
ACC 1011 Principles of Accounting (3)
BUS 2041 Business Communications (3)
INT 2101 Internship (3)

* Placement test and/or prerequisite required.
Sheet Metal
Apprenticeship:
AAS Degree

The Associate of Applied Science in Sheet Metal
Apprenticeship will prepare students with the trade
skills related to a career in sheet metal. Completion of
this degree involves completion of all sheet metal
union-related qualification requirements of "step" tradework experience as well as all union-related classroom
training required to achieve "journeyman" status

Minimum hours required: 75

General Education Requirements:
25 credit hours

See page 21 for courses that will satisfy General
Education Requirements below.

Composition (6)
ENG 101 College Composition I (3)
ENG 102 College Composition II (3)
or
ENG 135 Career Communication (3)
ENG 136 Career Writing (3)

Mathematics (3-5)
MAT 124 Technical Problem Solving (3)
or higher

Arts/Humanities (6)
Any approved General Education courses in the
Arts/Humanities category.

Social/Behavioral Sciences (6)
Any approved General Education courses in the
Social/Behavioral Sciences category.

Physical/Biological Sciences (4-5)
Any approved General Education course in the
Physical/Biological Sciences category.

Degree Core Requirements: 50 credit hours

ITC 145 Sheet Metal I (5)
ITC 146 Sheet Metal II (5)
ITC 147 Sheet Metal III (5)
ITC 148 Sheet Metal IV (5)
ITC 149 Sheet Metal V (5)
ITC 245 Sheet Metal VI (5)
ITC 246 Sheet Metal VII (5)
ITC 247 Sheet Metal VIII (5)
ITC 248 Sheet Metal IX (5)
ITC 249 Sheet Metal X (5)

1 Placement test and/or prerequisite required.
Associate of General Studies: AGS Degree

The Associate of General Studies Degree is designed for students who wish to broaden their knowledge, but have no university major or vocational goal in mind. This degree requires a minimum of 60 credit hours with a cumulative CCC grade point average of 2.00 or higher. Students must complete a minimum of 25 credit hours of General Education courses but are otherwise free to explore new areas of interest. A maximum of 12 credit hours may be completed in courses numbered below 100. This degree is not recommended for students planning to transfer to a university. The Associate of General Studies Degree is intended as an alternative degree which recognizes the mission of the community college that education is a lifelong process.

Minimum credit hours required: 60

General Education Requirements:
25–27 Credit Hours

See page 21 for courses that will satisfy General Education Requirements below.

**Composition (6)**
ENG 101 College Composition I (3) &
ENG 102 College Composition II (3)
or
ENG 135 Career Communications (3) &
ENG 136 Career Writing (3)

**Mathematics (3–5)**
MAT 121 Intermediate Algebra with Review (4)
or higher

**Arts/Humanities (6)**
Any approved General Education courses in the Arts/Humanities category.

**Social/Behavioral Sciences (6)**
Any approved General Education courses in the Social/Behavioral Sciences category.

**Physical/Biological Sciences (4–5)**
Any approved General Education course from the Physical/Biological Sciences category.

**Electives: 33–36 Credit Hours**
Select 33–36 credit hours either in a variety of disciplines or in an area of concentration.

1 Placement test and/or prerequisite required.
Certificate Programs

Certificate Programs are designed to provide specific knowledge to improve existing skills or to prepare students for entry-level employment. Certificates are awarded after successful completion of a series of specific courses. Certificates require a cumulative CCC grade point average of 2.00 or higher. Some certificate programs and/or credit hours may be applied toward other certificates and/or an Associate of Applied Science Degree. Please check with your advisor for complete information.

- Accounting Technician
- Alternative Energy Technician
- Assisted Living
- Carpentry Apprenticeship
- Computer Software Technology
- Construction Technology
- Drafting
  - Architectural CAD Technician
  - Computer Aided Drafting
- Early Childhood Education
- Electrical Construction Wiring Training
- Electrician Apprenticeship: Independent Electrical Contractors Association (IECA)
- Employment Success
- Fire Science
- Geographic Information Systems (GIS)
- Hospitality
- Legal Assistant
- Medical Insurance, Coding & Billing
- Medical Office Assistant
- Medical Transcription
- Office Support/Administrative Office Specialist
- Network Engineering
- Nursing Assistant
- Phlebotomy
- Pre-Professional Nursing
- Psychiatric Technician
- Sheet Metal Apprenticeship
Certificate Programs

Accounting Technician Certificate

The Accounting Technician Certificate program is designed to prepare students for employment as full-charge bookkeepers and accounting technicians. Included in the curricula are practical applications and computer knowledge. Students may apply earned accounting credit hours of this program toward the Associate of Applied Science degree in Business Technologies with an Accounting Specialization. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 33

Certificate Requirements:
33–35 credit hours

ACC 100  Practical Accounting Procedures (5)
ACC 101  Principles of Accounting I (3)
ACC 206  Computerized Accounting (3)
ACC 110  Payroll Accounting (3)
BUS 100  Mathematics of Business (3)
BUS 204  Business Communications (3)
CIS 122  Introduction to MS Word (2)
CIS 123  Introduction to Excel Spreadsheets (2)
CIS 223  Advanced Excel Spreadsheets (2)
ENG 101  College Composition I (3)

Nine credit hours selected from ACC courses in consultation with a business advisor (9)

1 Placement test and/or prerequisite required
Alternative Energy Technician Certificate

Intermediate Certificate
The Intermediate Certificate in Alternative Energy is designed to introduce the student to the construction and electrical industries and, provide the foundations for hazard recognition and safety. Students are introduced to design issues associated with home construction, community development and passive solar design. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 22

Certificate Requirements:
22 credit hours

BUS 111 Business English (3)
ITC 100 Construction Safety (3)
ITC 120 Building the Human Environment (3)
ITC 135 Solar Home Design (3)
ITC 150a Residential Wiring (3)
ITC 180 Construction Methods I (3)
MAT 121a Intermediate Algebra with Review (4)

Advanced Certificate
The Advanced Certificate in Alternative Energy improves the student’s expertise and knowledge in construction from an economic perspective. This certificate advances electrical skills with particular applications in photovoltaic and windpower electrical generation.

Minimum credit hours required: 47

Certificate Requirements:
47 credit hours

Completion of the Intermediate Certificate (22)

CIS 120 Introduction to Computer Information Systems (3)
DFT 110 Technical Drafting & CAD Fundamentals (3)
ECN 205 Micro Economics Principles (3)
ITC 136 Photovoltaics & Wind Power (3)
ITC 140 Blueprint Reading (3)
ITC 185a Construction Methods II (3)
MAT 124 Technical Problem Solving (3)
ITC 235 Innovative & Alternative Building Techniques

1 Placement test and/or prerequisite required.
2 May substitute ITC 298 with consent of division chair.
Assisted Living Certificate

This certificate is designed for individuals seeking an introduction to the role of the caregiver in the assisted living environment. This includes the basic skills outlined by the Arizona State Department of Health Services. Skills include resident advocacy, nutrition and personal care, assisting the resident with self-medication, documentation, team collaboration, communication, promotion of socialization and recreation, rehabilitation, environmental safety, planning services, business practices and personnel management, and the policies, procedures, laws and regulation governing assisted living. Prepares the student for entry-level employment in the growing assisted living industry.

Minimum credit hours required: 27

Certificate Requirements:
27–28 credit hours

AHS 100  Introduction to Health Services (3)
AHS 105  Communication & Behavior in the Health Care Setting (3)
AHS 110  Health Care Ethics & Law (3)
AHS 131  Medical Terminology (3)
AHS 140  Care-Giving In Assisted Living (3)
MAT 057  Math for Allied Health Occupations (3)
BIO 160  Introduction to Human Physiology & Anatomy (4)
ENG 100  Fundamentals of Composition (3)
ENG 101  English Composition I (3)
CIS 102  Computer Literacy (2)
CIS 120  Introduction to Computer Information Systems (3)

Placement test and/or prerequisite required.
Carpentry Apprenticeship Certificate

Intermediate Certificate
The Intermediate Certificate in Carpentry is designed to introduce the student to the carpentry industry. It provides the foundational classes in the carpentry and construction trades as well as introduces field techniques and applications in a progressively complicated sequence.

Certificate Requirements:
20 credit hours

ITC 130  Introduction to the Carpentry Industry (5)
ITC 131  Carpentry Math Applications & Metrics (5)
ITC 132  Print Reading & Advanced Blueprints (5)
ITC 133  Concrete Formwork (5)

Advanced Certificate
The Advanced Certificate in Carpentry is designed to continue to improve the student's expertise in the construction industry. It provides more advanced classes in the carpentry and construction trades as well as field techniques and applications in a progressively complicated sequence.

Certificate Requirements:
40 credit hours

Completion of the Intermediate Certificate (20)
ITC 220  Framing Walls, Roofs & Decks (5)
ITC 221  Carpentry Industry Technology (5)
ITC 222  Interior Systems (5)
ITC 223  Interior Finish (5)
Computer Software Technology Certificate

Basic Certificate
The Computer Software Basic Certificate is designed to develop entry-level skills related to computer application software packages and to enhance communication skills and professional readiness. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Computer Software Technology. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 15

Certificate Requirements:
15–16 Credit Hours

- BUS 100<sup>1</sup> Mathematics of Business (3)
- BUS 111 Business English (3)
- CIS 102 Computer Literacy (2)
- or
- CIS 120 Introduction to Computer Information Systems (3)
- CIS 112 Introduction to Windows (2)
- CIS 115 Introduction to the Internet (1)
- CIS 122 Introduction to MS Word (2)
- CIS 123 Introduction to Excel Spreadsheets (2)

Note: Keyboarding skills may enhance success.

Advanced Certificate
The Computer Software Advanced Certificate program is designed for those students who have completed the basic certificate and desire to further enhance their computer, communication, and professional-readiness skills. Students may apply some of the credit hours earned in this program toward the Associate of Applied Science degree in Computer Software Technology.

Minimum credit hours required: 33

Certificate Requirements:
26–27 credit hours

Completion of the Basic Computer Software Technology Certificate (15–16)
- CIS 125 Introduction to Databases (3)
- CIS 222<sup>1</sup> Advanced MS Word (2)
- CIS 223<sup>1</sup> Advanced Excel Spreadsheets (2)
- ENG 100<sup>1</sup> Fundamentals of Composition (3)
- or
- ENG 101<sup>1</sup> College Composition I (3)
- LDR 115 Workplace Ethics (1)

Electives: 7 credit hours
Select a minimum of seven credit hours from the following courses:
- ART 130 Computer Graphics (3)
- BUS 204<sup>1</sup> Business Communications (3)
- CIS 113 Introduction to PowerPoint (1)
- CIS 117 Introduction to Web Page Design (2)
- CIS 127<sup>1</sup> Introduction to Desktop Publishing (3)
- CIS 217<sup>1</sup> Web Publishing I (3)
- CIS 220<sup>1</sup> Computer Programming I (4)
- CIS 230<sup>1</sup> Implementing & Supporting Windows (4)
- CIS 298 Special Topics (1–6)
- ELT 150 Basic Microcomputer Repair (2)
- ELT 151<sup>1</sup> Computer Hardware Networking (2)
- INT 210<sup>1</sup> Internship I (1–6)

<sup>1</sup> Placement test and/or prerequisite required.
<sup>2</sup> It is strongly recommended that students enroll in this elective course in addition to the required credit hours for completion of the Clerical Certificate. Please see catalog for course description.
Construction Technology Certificate

The Construction Technology Certificate provides students with a technical foundation required to compete in today’s construction field. Students will be instructed through mastery learning components and field study workshops arranged with local contractors. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Construction Technology. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 21

Certificate Requirements:
21–23 credit hours

DFT 125 Architectural Drafting I (3)
ENG 100 Fundamentals of Composition (3)
ITC 120 Building the Human Environment (3)
ITC 140 Blueprint Reading & Estimating (3)
ITC 180 Building Construction Methods I (3)
ITC 185 Building Construction Methods II (3)
MAT 124 Technical Problem Solving (3)
or
MAT 187 Pre-calculus (5)

Placement test and/or prerequisite required.
Drafting: Architectural CAD Technician Certificate

The Architectural CAD Technician Certificate will provide students with a solid foundation in the field of architectural construction drafting. This certificate can lead to an AAS degree in Architectural Design Technology. The fundamentals of drafting are performed through mastery learning and hands-on application. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 24

Certificate Requirements:
24 credit hours

DFT 110  Technical Drafting & CAD Fundamentals (3)
DFT 125\(^{*}\)  Architectural Drafting I (3)
DFT 150\(^{*}\)  AutoCAD 2D (3)
DFT 200\(^{*}\)  AutoCAD 3D (3)
DFT 225\(^{*}\)  Architectural Drafting II: CAD (3)
DFT 260\(^{*}\)  Architectural Drafting II: CAD (3)
ITC 120  Building the Human Environment (3)
ITC 140  Blueprint Reading & Estimating (3)

\(^{*}\) Placement test and/or prerequisite required.

Drafting: Computer Aided Drafting Certificate

The Computer Aided Drafting Certificate will provide students with a solid foundation in the field of CAD as a tool for various drafting technologies. Those students who are exploring the field of Computer Aided Drafting or are in need of developing computerized skills will find this certificate challenging and beneficial for future applications. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 9

Certificate Requirements:
9 credit hours

CIS 120  Introduction to Computer Information Systems (3)
DFT 150\(^{*}\)  AutoCAD 2D (3)
DFT 200\(^{*}\)  AutoCAD 3D (3)
Early Childhood Education Certificate

The Certificate in Early Childhood Education is designed to prepare students for positions within the field of early childhood education. Students may apply credit hours earned in the certificate toward the Associate of Applied Science degree in Early Childhood Education. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 33

Certificate Requirements:
33 credit hours

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>ECE 100</td>
<td>Introductions to Early Childhood Education (3)</td>
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<tr>
<td>ECE 110</td>
<td>Early Childhood Curriculum (3)</td>
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<tr>
<td>ECE 120</td>
<td>Health, Safety &amp; Nutrition for the Young Child (3)</td>
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<tr>
<td>ECE 200*</td>
<td>Child Guidance (3)</td>
<td></td>
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<tr>
<td>ECE 210</td>
<td>Creative Arts for the Young Child (3)</td>
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<tr>
<td>ECE 220</td>
<td>Language Arts for the Young Child (3)</td>
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<tr>
<td>ECE 230</td>
<td>Exploration &amp; Discovery for the Young Child (3)</td>
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<tr>
<td>ECE 240*</td>
<td>School, Family &amp; Community Relations (3)</td>
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<tr>
<td>ECE 250*</td>
<td>Children with Special Needs (3)</td>
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<tr>
<td>PSY 101</td>
<td>Introduction to Psychology (3)</td>
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</tr>
<tr>
<td>PSY 234*</td>
<td>Child Growth &amp; Development (3)</td>
<td></td>
</tr>
</tbody>
</table>

* Prerequisite of PSY 101. Placement test and/or prerequisite required.
Electrician Apprenticeship
Certificate: Independent
Electrical Contractors
Association (IECA)

Intermediate Certificate
This certificate program is a sequence of Electrical Trade training classes to prepare an apprentice electrician with classroom training in addition to full time documented trade experience in the electrical field. Completion of the intermediate certificate fulfills the initial training as an IECA Electrical Apprentice on topics related to basic electricity, AC and DC theory, residential wiring techniques, motors and transformers in a manner that complements concurrent job experience.

Certificate Requirements:
32 credit hours

IEC 101  Basic Electricity (5)
IEC 1021  Electrical Residential (5)
IEC 1031  Electrical A/C & D/C (5)
IEC 1041  Wiring Motors & Transformers (5)
INT 2101  Internship (12)

Advanced Certificate
This certificate program is a sequence of electrical trade training classes to prepare an apprentice electrician with classroom training in addition to full time documented trade experience in the electrical field. The advanced certificate provides additional necessary training as an IECA electrical apprentice in topics related to electric blue print reading, electric motor controls, electronics and controls, and alarm systems and codes in a manner that complements concurrent job experience.

Certificate Requirements:
Requirements: 64 credit hours

Completion of intermediate certificate (32)
IEC 1051  Electric Blue Print Reading (5)
IEC 1061  Electric Motor Controls (5)
IEC 1071  Electronics & Controls (5)
IEC 1081  Alarm Systems & Codes (5)
INT 2101  Internship (12)

1 Placement test and/or prerequisite required.
Electrical Construction
Wiring Training Certificate

First Year Certificate
This certificate is designed for students seeking progressive training in electrical wiring in both residential and commercial construction. This program teaches the skills and knowledge of the first year introductory level.

Minimum credit hours required: 13

Certificate Requirements:
13 credit hours

ITC 150  Electrical Wiring I (3)
ITC 151  Electrical Wiring II (4)
INT 210  Internship I (1–6)

Second Year Certificate
This certificate is designed to continue the training in electrical construction wiring. This program continues from the first year with skills and knowledge necessary in a second year job-training program.

Minimum credit hours required: 26

Certificate Requirements:
26 credit hours

Completion of First Year Electrical Certificate or equivalent (13)
ITC 160  Electrical Wiring III (3)
ITC 161  Electrical Wiring IV (4)
INT 210  Internship I (1–6)

Third Year Certificate
This certificate is designed to continue the training in electrical construction wiring. This program continues from the second year with skills and knowledge necessary in a third year job training program.

Minimum credit hours required: 40

Certificate Requirements:
40 credit hours

Completion of Second Year Electrical Certificate or equivalent (26)
ITC 250  Electrical Wiring V (4)
ITC 251  Electrical Wiring VI (4)
INT 210  Internship I (1–6)

Fourth Year Certificate
This certificate is designed to continue the training in electrical construction wiring. This final year completes the training in the skills and knowledge necessary to compete in the electrical construction wiring profession.

Minimum credit hours required: 55

Certificate Requirements:
55 credit hours

Completion of Third Year Electrical Certificate or equivalent (40)
ITC 260  Electrical Wiring VII (4)
ITC 261  Electrical Wiring VIII (5)
INT 210  Internship I (1–6)

Placement test and/or prerequisite required.
Employment Success Certificate

The Employment Success Certificate is designed to provide students with a basic foundation in essential skills for the workplace. Students may apply the skills gained from this program to other certificates or degrees. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 16

Certificate Requirements:
16 credit hours

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>BUS 111</td>
<td>Business English</td>
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<tr>
<td>CIS 102</td>
<td>Computer Literacy</td>
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<tr>
<td>LDR 115</td>
<td>Workplace Ethics</td>
<td>1</td>
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<tr>
<td>HDE 102</td>
<td>College Study Skills</td>
<td>3</td>
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<tr>
<td>HDE 104</td>
<td>Employment Success Strategies</td>
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<tr>
<td>MAT 055</td>
<td>Arithmetic Review</td>
<td>3</td>
</tr>
<tr>
<td>OIS 100</td>
<td>Keyboarding</td>
<td>1</td>
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</tbody>
</table>

Optional Content Areas:
0–9 credit hours

**Hospitality—Hotel Emphasis**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>HRM 100</td>
<td>Introduction to Hospitality</td>
<td>3</td>
</tr>
<tr>
<td>HRM 210</td>
<td>Guest Service Management</td>
<td>3</td>
</tr>
<tr>
<td>BUS 218</td>
<td>Customer Service</td>
<td>3</td>
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</tbody>
</table>

**Hospitality—Restaurant Emphasis**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>HRM 100</td>
<td>Introduction to Hospitality</td>
<td>3</td>
</tr>
<tr>
<td>HRM 140</td>
<td>Food Production Concepts</td>
<td>3</td>
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<tr>
<td>BUS 218</td>
<td>Customer Service</td>
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</table>

**Clerical**

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<tr>
<th>Course</th>
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</thead>
<tbody>
<tr>
<td>OIS 110</td>
<td>Keyboarding Review &amp; Speed</td>
<td>3</td>
</tr>
<tr>
<td>OIS 200</td>
<td>Professional Office Skills</td>
<td>3</td>
</tr>
<tr>
<td>BUS 218</td>
<td>Customer Service</td>
<td>3</td>
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</tbody>
</table>

**Computer Software**

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<th>Title</th>
<th>Credits</th>
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<tr>
<td>CIS 112</td>
<td>Introduction to Windows</td>
<td>2</td>
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<tr>
<td>CIS 120</td>
<td>Introduction to Computer Information Systems</td>
<td>3</td>
</tr>
<tr>
<td>CIS 122</td>
<td>Introduction to MS Word</td>
<td>2</td>
</tr>
<tr>
<td>CIS 123</td>
<td>Introduction to Excel Spreadsheets</td>
<td>2</td>
</tr>
</tbody>
</table>
Fire Science Certificate

Intermediate Certificate
The Fire Science Intermediate Certificate program is designed to introduce basic skills and to assist those who desire to enhance their abilities on the job. Included in the curriculum are practical applications and knowledge. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Fire Science.

Minimum credit hours required: 17

Certificate Requirements:
17 credit hours

- FSC 180 Firefighter I & II (8)
- FSC 138 Hazardous Materials/First Responder (3)
- FSC 236 Firefighter Occupational Safety (3)
- FSC 238 Emergency Scene Management (3)

Advanced Certificate
The Fire Science Advanced Certificate program is designed to introduce basic skills and to assist those who desire to enhance their abilities on the job. Included in the curriculum are practical applications and knowledge. Students may apply the hours of this program toward the Associate of Applied Science degree in Fire Science.

Minimum credit hours required: 40

Certificate Requirements:
40 credit hours

Completion of the Fire Science Intermediate Certificate (17)

- EMS 131 Emergency Medical Technician (7)
- FSC 135 Fundamentals of Fire Prevention (3)
- FSC 136 Fire Apparatus & Hydraulics (4)
- FSC 234 Fire Investigation (3)
- FSC 239 Fire Department Company Officer (3)
- FSC 241 Firefighter Safety & Building Construction (3)

1 Placement test and/or prerequisite required.
Geographic Information Systems (GIS) Certificate

The Geographic Information Systems (GIS) Basic Certificate will provide students with a solid foundation in the utilization of GIS as a tool for various spatial analysis applications. Coursework includes the introduction of the basic concepts of spatial analysis, history of GIS technology, an understanding of the principles of cartography, map interpretation, and student preparation for operation of ArcView GIS software packages. Coursework also includes the technical and quality control aspects of ArcView, exposure to ArcView applications in spatial analysis, and an internship practicum using ArcView in a GIS analysis project.

Basic Certificate

Minimum credit hours required: 18

Certificate Requirements:
18 credit hours

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>GEO 131</td>
<td>Introduction to Physical Geography</td>
<td>4</td>
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<tr>
<td>GIS 101</td>
<td>Geographic Information Systems</td>
<td>4</td>
</tr>
<tr>
<td>CIS 120</td>
<td>Introduction to Computer Information Systems</td>
<td>3</td>
</tr>
<tr>
<td>GIS 201</td>
<td>Introduction to ArcView</td>
<td>3</td>
</tr>
<tr>
<td>INT 210</td>
<td>Internship</td>
<td>4</td>
</tr>
</tbody>
</table>

* Placement test and/or prerequisite required.
Hospitality Certificate

The hospitality program prepares students for entry-level positions in the hospitality industry. Students completing this certificate will develop fundamental skills in which to compete in one of Arizona's fastest growing businesses. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Intermediate Certificate

Minimum credit hours required: 27

Certificate Requirements:
27 credit hours

ENG 135 Career Communication (3)
or
BUS 111 Business English (3)
BUS 100* Mathematics of Business (3)
BUS 209 Principles of Supervision (3)
BUS 218 Customer Service (3)
CIS 120 Introduction to Computer Science (3)
HRM 100 Introduction to Hospitality (3)
SPC 100 Speech Communication (3)

Restaurant Emphasis
HRM 140 Food Production Concepts (3)
HRM 170 Hospitality Information Technology (3)
or

Hotel Emphasis
HRM 210 Guest Service Management (3)
HRM 220 Property Management (3)

Advanced Certificate

Minimum credit hours required: 39

Certificate Requirements:
39 credit hours

Completion of the Intermediate Hospitality Administration Certificate (27)

ACC 101 Principles of Financial Accounting (3)
BUS 211 Human Resources/Personnel Management (3)
HRM 170 Hospitality Information Technology (3)
HRM 225* Hospitality Accounting (3)
HRM 235 Hospitality Law (3)

* Placement test and/or prerequisite required.
Legal Assistant Certificate

The Legal Assistant Certificate program is designed to give students an introduction to legal assistant skills and to assist those students who desire to enhance their abilities on the job. Included in the curriculum are practical applications and knowledge. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Office Information Systems. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 46

Certificate Requirements:
46-51 credit hours

AJS 150 Rules of Criminal Procedures (3)
BUS 100 Mathematics of Business (3)
BUS 111 Business English (3)
CIS 113 Introduction to PowerPoint (3)
CIS 115 Introduction to Internet (1)
CIS 120 Introduction to Computer Information Systems (3)
CIS 122 Introduction to MS Word (2)
CIS 123 Introduction to Excel Spreadsheets (2)
CIS 222 Advanced MS Word (2)
OIS 110 Keyboarding Review & Speed (3)
OIS 130 Machine Transcription (3)
OIS 200 Professional Office Skills (3)
OIS 210 Keyboarding with Applications (3)
OIS 240 Legal Transcription (3)
LDR 115 Workplace Ethics (1)
PAR 100 Introduction to Paralegal Studies (3)
PAR 105 Legal Computer Applications (2)
PAR 215 Legal Research Writing (3)

Optional: 3-6 credit hours

INT 210 Internship I (3-6)

1 Placement test and/or prerequisite required.
2 It is strongly recommended that students enroll in this elective course in addition to the required credit hours for completion of the Legal Secretary Certificate. Please see catalog for course description.
Medical Insurance, Coding & Billing Certificate

This certificate is designed for students seeking an introduction to medical insurance, coding, and billing in the office, clinic, or hospital. Completion of the program will enhance the knowledge and skills base of those already in the workplace. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 33

Certificate Requirements:
33–34 credit hours

AHS 100  Introduction to Health Services (3)
AHS 105  Communication & Behavior in the Health Care Setting (3)
AHS 110  Health Care Ethics & Law (3)
AHS 131  Medical Terminology (3)
AHS 135  Medical Coding, Insurance & Billing (3)
BIO 160  Introduction to Human Physiology & Anatomy (4)
ENG 100  Fundamentals of Composition (3)
ENG 101  English Composition I (3)
CIS 102  Computer Literacy (2)
CIS 120  Introduction to Computer Information Systems (3)
MAT 057  Math for Allied Health (3)
OIS 110  Keyboarding Review & Speed (3)
OIS 200  Professional Office Skills (3)

Placement test and/or prerequisite required.
Medical Office Assistant Certificate

The Medical Office Assistant Certificate program prepares students for the varied and expanded responsibilities involved in working within medical offices today. Students will receive training in numerous areas, which will give them a complete understanding of the intricate workings within today’s medical businesses. Graduates will have the skills necessary to obtain a position as a medical office assistant that will be able to perform numerous duties in the front office. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Medical Office Assistant. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Basic Certificate

Minimum credit hours required: 36

Certificate Requirements:
36–37 credit hours

AHS 100  Introduction to Health Services (3)
AHS 105  Communication & Behavior in the Health Care Setting (3)
AHS 110  Health Care Ethics & Law (3)
AHS 131  Medical Terminology (3)
AHS 135  Medical Coding, Insurance & Billing (3)
AHS 137  Back Office Procedures (3)
OIS 130  Machine Transcription (3)
CIS 120  Introduction to Computer Information Systems (3)
BUS 204  Business Communications (3)
INT 210  Internship (3)

Electives: 6–7 credit hours
Select a minimum of six credit hours from the following courses:

AHS 160  Phlebotomy Procedures (3)
AHS 161  Phlebotomy Practicum (4)
CIS 117  Introduction to Web Pages (2)
CIS 123  Introduction to Spreadsheets (2)
CIS 125  Introduction to Database (3)
OIS 110  Keyboarding Review & Speed (3)
OIS 200  Professional Office Skills (3)
OIS 230  Medical Transcription (3)

¹ Placement test and/or prerequisite required
² AHS 161 must be taken in conjunction with AHS 160.
Medical Transcription Certificate

The Medical Transcription Certificate program is designed to give students an introduction to medical transcription skills and to assist those students who desire to enhance their abilities on the job. Included in the curriculum are practical applications and knowledge. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Office Information Systems. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 36

Certificate Requirements:
36–37 credit hours

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Credit Hours</th>
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<tbody>
<tr>
<td>AHS 100</td>
<td>Introduction to Health Services</td>
<td>(3)</td>
</tr>
<tr>
<td>AHS 110</td>
<td>Health Care Ethics &amp; Law</td>
<td>(3)</td>
</tr>
<tr>
<td>AHS 131†</td>
<td>Medical Terminology I</td>
<td>(3)</td>
</tr>
<tr>
<td>AHS 135</td>
<td>Medical Coding, Insurance &amp; Billing</td>
<td>(3)</td>
</tr>
<tr>
<td>BUS 111</td>
<td>Business English</td>
<td>(3)</td>
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<tr>
<td>CIS 102</td>
<td>Computer Literacy</td>
<td>(2)</td>
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<td>or</td>
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<tr>
<td>CIS 120</td>
<td>Introduction to Computer Information Systems</td>
<td>(3)</td>
</tr>
<tr>
<td>CIS 122</td>
<td>Introduction to MS Word</td>
<td>(2)</td>
</tr>
<tr>
<td>CIS 222‡</td>
<td>Advanced MS Word</td>
<td>(2)</td>
</tr>
<tr>
<td>OIS 110</td>
<td>Keyboarding Review &amp; Speed</td>
<td>(3)</td>
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<td>OIS 130‡</td>
<td>Machine Transcription</td>
<td>(3)</td>
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<tr>
<td>OIS 200‡</td>
<td>Professional Office Skills</td>
<td>(3)</td>
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<tr>
<td>OIS 210‡</td>
<td>Keyboarding with Applications</td>
<td>(3)</td>
</tr>
<tr>
<td>OIS 230‡</td>
<td>Medical Transcription</td>
<td>(3)</td>
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</table>

Optional: 0–6 credit hours

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Credit Hours</th>
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</thead>
<tbody>
<tr>
<td>INT 210‡</td>
<td>Internship I</td>
<td>(0–6)</td>
</tr>
</tbody>
</table>

† Placement test and/or prerequisite required.
‡ It is strongly recommended that students enroll in this elective course in addition to the required credit hours for completion of the Medical Transcription Certificate. Please see catalog for course description.
Network Engineering Certificate

The Network Engineering Intermediate Certificate is designed to develop skills related to network engineering and to enhance communications skills and professional readiness. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Network Engineering.

Minimum credit hours required: 26

Certificate Requirements:
26 credit hours

BUS 204 Business Communications (3)
BUS 111 Business English (3)
LDR 115 Workplace Ethics (1)
CIS 120 Introduction to Computer Information Systems (3)
CIS 140 Cisco Networking Academy Semester 1 (4)
CIS 150 Cisco Networking Academy Semester 2 (4)
CIS 160 Cisco Networking Academy Semester 3 (4)
CIS 170 Cisco Networking Academy Semester 4 (4)

*Placement test and/or prerequisite required.
Nursing Assistant Certificate

This certificate is designed for students seeking an introduction to nursing assisting and the basic skills required for computations, documenting, team collaboration, communication, and client advocacy in the health care setting. It will enhance the knowledge and skills base of nursing assistants already in the workplace. Prepares students for entry level employment in acute care, long term care, and assisted living settings. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 29

Certificate Requirements:
29–30 credit hours

AHS 100  Introduction to Health Services (3)
AHS 105  Communication & Behavior in the Health Care Setting (3)
AHS 110  Health Care Ethics & Law (3)
AHS 131  Medical Terminology (3)
BIO 160  Introduction to Human Physiology & Anatomy (4)
CIS 102  Computer Literacy (2) or
CIS 120  Introduction to Computer Information Systems (3)

ENG 100  Fundamentals of Composition (3)

ENG 101  English Composition I (3)
MAT 057  Math for Allied Health (3)
NUR 110  Nursing Assistant I (4)
NUR 111  Nursing Assistant Clinical (1)

* Placement test and/or prerequisite required.
Certificate Programs

Office Support/Administrative Office Specialist Certificate

The Office Support/Administrative Office Specialist Certificate program is designed to prepare students for a professional office setting and enhance office/clerical skills and knowledge. Students may apply credit hours earned in this program toward the Associate of Applied Science degree in Office Information Systems. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 30

Certificate Requirements:
30 credit hours

BUS 100\(^1\) Mathematics of Business (3)
BUS 111 Business English (3)
CIS 113 Introduction to PowerPoint (1)
CIS 115 Introduction to Internet (1)
CIS 120 Introduction to Computer Information Systems (3)
CIS 122 Introduction to MS Word (2)
CIS 123 Introduction to Excel Spreadsheets (2)
CIS 222\(^2\) Advanced MS Word (2)
OIS 110 Keyboarding Review & Speed (3)
OIS 130\(^1\) Machine Transcription (3)
OIS 200\(^1\) Professional Office Skills (3)
OIS 210\(^1\) Keyboarding & Applications (3)
LDR 115 Workplace Ethics (1)

Optional: 3–6 Credit Hours

INT 210\(^2\) Internship I (3–6)

\(^1\) Placement test and/or prerequisite required.
\(^2\) It is strongly recommended that students enroll in this optional course in addition to the required credit hours for completion of the Clerical Certificate. Please see catalog for course description.
Phlebotomy Certificate

This certificate is designed to prepare students for entry-level positions as phlebotomists in acute care, clinic, or community-based agencies and settings. Addressing such skills as collection of specimens, infection control and safety, the operation of the clinical laboratory, health care delivery and terminology, and communication and professional behavior, this program meets the standards of the national accrediting organizations for phlebotomists. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 31

Certificate Requirements:
31–32 credit hours

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credits</th>
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<tr>
<td>AHS 100</td>
<td>Introduction to Health Services</td>
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<tr>
<td>AHS 105</td>
<td>Communication &amp; Behavior in the Health</td>
<td>(3)</td>
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<td>Care Setting</td>
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<tr>
<td>AHS 110</td>
<td>Health Care Ethics &amp; Law</td>
<td>(3)</td>
</tr>
<tr>
<td>AHS 131</td>
<td>Medical Terminology</td>
<td>(3)</td>
</tr>
<tr>
<td>AHS 160</td>
<td>Phlebotomy Procedures</td>
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<td>AHS 161</td>
<td>Phlebotomy Practicum</td>
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<tr>
<td>BIO 160</td>
<td>Introduction to Human Physiology &amp;</td>
<td>(4)</td>
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<tr>
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<td>Anatomy</td>
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<td>BUS 111</td>
<td>Business English</td>
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<td>CIS 102</td>
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<td>or</td>
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<td>CIS 120</td>
<td>Introduction to Computer Information</td>
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<td></td>
<td>Systems</td>
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<tr>
<td>MAT 057</td>
<td>Math for Allied Health Occupations</td>
<td>(3)</td>
</tr>
</tbody>
</table>

1 Placement test and/or prerequisite required.
2 AHS 161 must be taken in conjunction with AHS 160.
Pre-Professional Nursing Certificate

This certificate further develops the skills of the nursing assistant—adding to the caregiver’s written communication skills and providing advanced applied knowledge of the human body and mind, computation, and nutrition. The Pre-Professional Nursing Certificate includes all pre-requisite coursework requirements for application for admission to all regional community college associate degree-nursing programs and to the NAU baccalaureate-nursing program. This coursework may also be applied to most health science degrees. (The courses in this degree require prerequisites. Please see an advisor prior to enrolling in these courses.)

Minimum credit hours required: 24

Certificate Requirements:
24 credit hours

BIO 181   Unity of Life I: Life of the Cell (4)
BIO 201\footnote{Placement test and/or prerequisite required.}   Anatomy & Physiology (4)
CHM 130\footnote{Placement test and/or prerequisite required.}   General Chemistry (4)
ENG 101\footnote{Placement test and/or prerequisite required.}   English Composition I (3)
ENG 102\footnote{Placement test and/or prerequisite required.}   English Composition II (3)
MAT 142\footnote{Placement test and/or prerequisite required.}   Applications of College Algebra (3)
NTR 135\footnote{Placement test and/or prerequisite required.}   Human Nutrition (3)
Psychiatric Technician Certificate

This certificate is designed for students seeking entry-level preparation for the role of psychiatric technician or mental health worker and the basic skills required for computations, documenting, team collaboration, communication, and client advocacy in the mental health setting. The program will enhance the knowledge and skills base of psychiatric technicians already in the workplace. Psychiatric technicians, also known as mental health workers or psychiatric nursing assistants, have the closest contact with psychiatric and addictions patients; they provide physical care, participate in or offer components of the treatment program, and accompany patients to treatments and outings. To be employed in an accredited agency or to provide home care, psychiatric technicians are required to have a bachelor’s degree in a related field. This is a Tech Prep articulated program. For more information regarding Tech Prep, see page 141.

Minimum credit hours required: 28

Certificate Requirements:
28–29 credit hours

AHS 100 Introduction to Health Services (3)
AHS 105 Communication & Behavior in the Health Care Setting (3)
AHS 110 Health Care Ethics & Law (3)
AHS 131 Medical Terminology (3)
AHS 150 Psychiatric Technician I (3)
CIS 102 Computer Literacy (2)
or
CIS 120 Introduction to Computer Information Systems (3)
ENG 100 Fundamentals of Composition (3)
or
ENG 101 English Composition I (3)
NUR 110 Nursing Assistant I (4)
NUR 111 Nursing Assistant Clinical (1)
PSY 205 Introduction to Abnormal Psychology (3)

1 Placement test and/or prerequisite required.
Sheet Metal
Apprenticeship Certificate

Intermediate Certificate
The Intermediate Certificate in Sheet Metal is designed to introduce the student to the sheet metal industry. It provides the foundational classes in the layout and assembly of many sheet metal trades field applications in a progressively complicated sequence.

Certificate Requirements:
35 credit hours

<table>
<thead>
<tr>
<th>Course</th>
<th>Course Title</th>
<th>Hours</th>
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</thead>
<tbody>
<tr>
<td>ITC 145</td>
<td>Sheet Metal I</td>
<td>(5)</td>
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<tr>
<td>ITC 146</td>
<td>Sheet Metal II</td>
<td>(5)</td>
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<tr>
<td>ITC 147</td>
<td>Sheet Metal III</td>
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<tr>
<td>ITC 148</td>
<td>Sheet Metal IV</td>
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<td>ITC 149</td>
<td>Sheet Metal V</td>
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<tr>
<td>ITC 245</td>
<td>Sheet Metal VI</td>
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<tr>
<td>ITC 246</td>
<td>Sheet Metal VII</td>
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</tbody>
</table>

Advanced Certificate
The Advanced Certificate in Sheet Metal is designed to continue to improve the student’s expertise in the sheet metal industry. It provides more advanced classes in the layout and assembly of many sheet metal trades field applications in a progressively complicated sequence.

Certificate Requirements:
50 credit hours

Completion of the Intermediate Certificate (35)
<table>
<thead>
<tr>
<th>Course</th>
<th>Course Title</th>
<th>Hours</th>
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</thead>
<tbody>
<tr>
<td>ITC 247</td>
<td>Sheet Metal VIII</td>
<td>(5)</td>
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<tr>
<td>ITC 248</td>
<td>Sheet Metal IX</td>
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</tr>
<tr>
<td>ITC 249</td>
<td>Sheet Metal X</td>
<td>(5)</td>
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</tbody>
</table>
Course Descriptions
ACC—Accounting

ACC 100 (5)  
Practical Accounting Procedures  
Practical approach to the study of accounting for office, sales, and small business personnel. Includes the basic accounting cycle, special journals, and procedures for controlling cash and payroll accounting. Accounting systems and procedures for small businesses are stressed. Five lecture.

ACC 101 (3)  
Principles of Financial Accounting  
Financial accounting theory as applied to corporate form of business involving service and merchandising activities. Includes analysis and recording of business transactions and preparation of financial statements. Prerequisite: MAT 121 or placement, or ACC 100, or consent of instructor. Three lecture.

ACC 102 (3)  
Principles of Managerial Accounting  
Accounting theory and practice as it applies to the use of accounting information in the management decision making process of an organization. Introduces manufacturing accounting (job order, process cost, and standard cost systems) and budgeting. Prerequisite: ACC 101. Three lecture.

ACC 103 (3)  
Basic Office Accounting I  
Techniques, tools, and composition of a basic bookkeeping system. Includes journalizing an opening entry, journalizing and posting routine transaction from source documents, closing entries, preparing simple financial statements and preparing a post adjusting trial balance to complete the bookkeeping cycle. For non-accounting majors. Three lecture.

ACC 104 (3)  
Basic Office Accounting II  
Developing and maintaining a set of books for small business. Includes an introduction to the following: special journals, payroll systems, sales taxes, bad debts, depreciation, notes and interest, accruals, and the partnership and corporate form of business. For non-accounting majors. Prerequisite: ACC 103. Three lecture.

ACC 105 (3)  
Income Tax I  
Internal Revenue Service Code and Regulations as they pertain to the individual. Tax principles are applied to problems and the preparation of the individual income tax return. Three lecture.

ACC 107 (5)  
Income Tax  
A comprehensive explanation of the Internal Revenue Service code and regulations as they pertain to individuals, partnerships and corporations. Tax principles are applied to problems and the preparation of individual, partnership and corporation tax returns. Five lecture.

ACC 109 (3)  
Budget & Forecasting  
Roles, techniques, and uses of budgeting and forecasts. Application of budgets, and forecasting management decision-making and control. Prerequisite: ACC 101. Three lecture.

ACC 110 (3)  
Payroll Accounting  
A course that provides comprehensive and practical instruction in manual and computerized preparation and calculation of a business's payroll records and tax returns. Prerequisite: ACC 100 or ACC 101 or instructor's consent. Three lecture.

ACC 201 (3)  
Intermediate Accounting I  
Critical analysis of balance sheet accounts. Introduces analysis of income statement expense and revenue accounts with emphasis on the matching process. Problems keyed to studies made by professional accounting societies are studied. Prerequisite: ACC 102. Three lecture.

ACC 202 (3)  
Intermediate Accounting II  

ACC 206 (3)  
Computerized Accounting  
Electronic data processing systems as they apply to accounting systems. Provides hands-on experience with microcomputer hardware and software packages. Includes accounting cycle transaction and management decision-making applications. Three lecture.

ACC 210 (3)  
Financial Statement Analysis  
Characteristics of financial statements with a review of basic accounting principles as applied to financial statements. Emphasizes developing the tools and techniques used in analyzing financial statements, including the use of computer spreadsheets. Three lecture.
ACC 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

AES—Air Force Studies

AES 101 (2)
The Air Force Today I
Survey course focusing on organizational structure and missions of Air Force organizations, military customs and courtesies, officership and Corp values, and an introduction to written and oral communication skills, physical fitness training and demonstration of command. One lecture; two lab.

AES 102 (2)
The Air Force Today II
Survey course focusing on role and mission of U.S. strategic offensive and defensive forces, aerospace support forces, and general purpose forces; examination of topics in the use of national power; principles and theory of flight, and basic communication skills, physical fitness training and demonstration of personal leadership and managerial abilities. One lecture; two lab.

AES 201 (2)
Development of Air Power I
This course covers the historical survey of trends, events, and policies that led to the emergence of air power through the Persian Gulf War. It also provides an introduction to basic leadership and management skills, ethical decision-making, basic communication skills, and prepares students to attend field training. One lecture; two lab.

AES 202 (2)
Development of Air Power II
This course covers the establishment of the Air Force as a separate service, the Cold War, development of various concepts of employment and technological improvements of air power from the Korean Conflict to present; effective communication skills and application of elements of personal leadership. One lecture; two lab.

AHS—Allied Health Sciences

AHS 100 (3)
Introduction to Health Services
Overview of the inner workings of the health care industry and the political, cultural, and socio-economic forces that shape the delivery of health services. Predominant health care systems in the U.S. including Medicare and Medicaid will be examined along with the availability and utilization of various resources, health ethics and law, and quality of care. Three lecture.

AHS 101 (3)
Careers in Health Care
Presents an introduction to the breadth of health care provider and supportive roles in today's rapidly diversifying health care industry. Three lecture.

AHS 105 (3)
Communication & Behavior in the Health Care Setting
Introduces the student of health occupations to essential workplace communication and behavioral skills that fosters the provision of quality patient care, teamwork, and employee job satisfaction. Three lecture.

AHS 110 (3)
Health Care Ethics & Law
Study of the central legal and ethical issues facing health care providers in today's complex health care delivery system; examine managed care, bioethics, telemedicine, death and dying, workplace and practice employment issues, and liability and malpractice through the use of case studies and scenarios. Three lecture.

AHS 131 (3)
Medical Terminology I
Medical vocabulary for beginning students in allied health and science fields. Includes word roots, prefixes, suffixes, and abbreviations. Emphasizes spelling, pronunciation, and definition. Three lecture.

AHS 135 (3)
Medical Coding, Insurance & Billing
Students learn to submit, trace, appeal, and transmit health care claims; includes step-by-step instruction for all major forms of claims using real-life cases and classroom instruction with current software that provides immediate feedback, self-tests, and additional self-paced exercises. Prerequisites: CIS 102 or 120, and OIS 110, and AHS 100. Co-requisites: AHS 131, ENG 100 or ENG 101; or consent of instructor. Three lecture.
AHS 137 (3)  
Back Office Procedures  
Theory of basic medical assistant clinical duties. Focus is placed on basic information about common medical conditions, procedures and patient interaction and care within the medical office. Prerequisite: AHS 131. Three lecture.

AHS 140 (3)  
Care-Giving in Assisted Living  
Students examine the foundation principles of assisted living. These include general resident supervision, crisis intervention, self-administration of prescribed medication, concepts of aging and associated physical and medical sequelae and their monitoring, personal care needs, social and rehabilitative activity, care-planning, the management of staff and services for residents, and the laws, policies and procedures regulating the assisted living environment. Meets the training requirements of the Arizona Department of Health Services for caregivers and managers in assisted living facilities. Two lecture; three lab.

AHS 150 (3)  
Psychiatric Technician I  
A comprehensive introduction to the role of the psychiatric and mental health aide in both the acute care and out-patient or partial-hospitalization psychiatric and addictions milieu; content addresses such issues as common disorders, developmental anomalies, patients' rights, family dynamics and therapy, managing therapeutic groups, coping and maladaptive strategies, violence, and sexuality. Pre- or co-requisites: PSY 205, AHS 100, AHS 105 or consent of instructor. Two lecture; three lab.

AHS 160 (3)  
Phlebotomy Procedures  
Theory and practice of basic phlebotomy and specimen processing including laboratory test codes, equipment, procedures, role development and the health care team, ethics and safety, and legal issues and quality assurance. Prerequisite: AHS 131. Co-requisite: AHS 161; this course must be taken in conjunction with AHS 161. Three lecture.

AHS 161 (4)  
Phlebotomy Practicum  
Theory and practice of basic phlebotomy and specimen processing; clinical experiences in acute care, clinic, and community agency settings. Co-requisite: AHS 160. One lecture; nine lab. This course must be taken in conjunction with AHS 160.

AJS 101 (3)  
Introduction to Administration of Justice  

AJS 102 (3)  
Introduction to Military Justice  
Basic overview of the organization and jurisdiction of military justice and judicial system. Three lecture.

AJS 105 (3)  
Juvenile Detention Studies  
Introduction to the field of juvenile detention, including responsibilities and job duties of the detention employee. The course will include both legal and procedural issues in the subject area. Three lecture.

AJS 110 (3)  
The Correction Function  
History and development of correctional theories and institutions. Three lecture.

AJS 120 (3)  
Substantive Criminal Law  
Philosophy and legal sanctions and historical development from the common law to modern American criminal law. Classifications of crimes, elements of and parties to crimes, general definitions of crime, common defenses utilized, and review of offenses and the essential elements of each defense. Three lecture.

AJS 130 (3)  
The Police Function  
Theories of procedures and methods of operations with emphasis on the discretionary powers available to the working police officer. Career opportunities and current trends in law enforcement will be presented. General Education: Social and Behavioral Sciences. Three lecture.

AJS 141 (3)  
Gang Behavior & Street Violence  
Development of gangs, how society promotes them, and how they are self-sustaining through street violence. Includes a detailed look at victims' rights and the history of vigilantes in America. Three lecture.

AJS 150 (3)  
Rules of Criminal Procedures  
Procedural criminal law including the judiciary role in the criminal justice systems, the right to council, pretrial release, grand juries, adjudication process, types and rules of evidence, and sentencing. Three lecture.
AJS 160 (3)  
**Justice System Management**  
Principles of administration and organization of management functions and services within criminal justice systems. Three lecture.

AJS 170 (3)  
**Security Issues in Private Industry**  
A historical overview of the development and evolution of law enforcement and its developing relationship and dependence on the need for private asset protection. Students will assess current prevention technology, its development and history, and future direction and application. The class will further examine the roles of law enforcement and private security officers as well as the inherent differences. Legal limitations and provisions, public/private security agency(ies) and liability issues in the industry will be analyzed. Three lecture.

AJS 200 (3)  
**Community Relations**  
Examination, recognition, and understanding of community problems; community action programs; methods of coping with human behavior, conflict and communications; ethnic and minority cultures and environments; the community and the relationships with the criminal justice system. Three lecture.

AJS 209 (3)  
**Criminal Jurisdiction on Federal and Indian Land**  
Jurisdiction of local, state, and tribal law enforcement ABS agencies over crimes committed on federal military reservation, national parks, national forests, federal buildings, as well as Indian lands. Agreements with tribal governments, including courts, and police agencies of tribes, counties, states, and the federal government will also be examined. Three lecture. Spring only.

AJS 220 (3)  
**Rules of Evidence**  
Understanding of the rules of evidence which most often affect personnel concerned with the administration of the criminal law. Three lecture.

AJS 230 (3)  
**Deviant Behavior**  
Basic concepts of deviant behavior; evaluates current literature and studies the application of current criminological theories related to patterns of deviance. General Education: Social and Behavioral Sciences. Three lecture.

AJS 240 (3)  
**Juvenile Justice Procedure**  
History and development of juvenile procedures and institutions. Three lecture.

AJS 250 (3)  
**Criminal Investigations**  

AJS 260 (3)  
**Constitutional Law**  
Constitutional law as it relates to the operation of the criminal justice system. Three lecture.

AJS 265 (3)  
**Probation & Parole**  
The selection process for the release of both adults and juveniles under the supervision of probation and parole guidelines and the community values consistent with those under supervision. Three lecture.

AJS 280 (3)  
**Criminology**  
Deviance and society’s role in defining behavior; theories of criminality and the economic, social, and psychological impact of crime and victimization; relationships between statistics and crime trends. General Education: Social and Behavioral Sciences. Three lecture.

AJS 285 (3)  
**Women and the Criminal Justice System**  
Fundamental Components of the American criminal justice system with emphasis on the experiences of women regarding: crime, victimization, and the differential treatment of women in the system. This course is a basic overview of the American criminal justice system, women as perpetrators, women as victims, and women working in the field of criminal justice. Three Lecture.

AJS 291 (3)  
**Terrorism & Counter-Terrorism**  
Nature of terrorism, terrorist threat, and countermeasures to combat terrorism. Three lecture.

AJS 292 (3)  
**Hostage Negotiations**  
Essentials of hostage negotiations for all personnel and may serve as a refresher for trained personnel. Three lecture.

AJS 295 (3)  
**White Collar & Corporate Crime**  
A close look at the theories, laws and issues surrounding white collar crime in contemporary society. Three lecture.
Course Descriptions

AJS 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ANT—Anthropology

ANT 101 (4)
Introduction to Physical Anthropology
An introductory survey of the basic principles, concepts, assumptions, theories, and vocabulary of human evolution and world archaeology. General Education: Physical and Biological Sciences Three lecture; two lab.

ANT 102 (3)
Introduction to Cultural Anthropology
Principles of cultural and social anthropology, with illustrative materials from a variety of cultures. The nature of culture; social, political, and economic systems; religion, aesthetics and language. General Education: Social and Behavioral Sciences, Special Requirements: Contemporary Global/International Awareness or Historical Awareness; Ethnic/Race/Gender Awareness. Three lecture.

ANT 110 (3)
Exploring Archaeology

ANT 210 (3)
Peoples of the World
A comparative study of selected peoples and cultures from various regions of the globe, including the historical and contemporary experiences of these groups. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness, Contemporary Global/International Awareness or Historical Awareness. Three lecture.

ANT 230 (3)
Peoples of the Southwest
Ethnohistorical survey of the American Southwest culture area, focusing on selected Pueblo and non-Pueblo peoples. This course is designed to expose the student to the richness of traditional Southwestern cultures in order to stimulate an appreciation for the Native history and ethnic diversity of the region. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness, Contemporary Global/International Awareness or Historical Awareness. Three lecture.

ANT 241 (3)
Anthropology of Religion
Anthropology of religious practices employed by both western and non-western peoples in dealing with adversity, misfortune, illness, death and similar phenomena beyond human control. Three lecture.

ANT 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ART—Art

ART 100 (3)
Art Appreciation
Historical overview and appreciation of painting, sculpture, architecture, film, and crafts. Examines individual works of art with regard to both their formal qualities and the way they reflect the shifting patterns of culture. Field trips. General Education: Arts and Humanities. Three lecture.

ART 103 (3)
Native American Art of the Southwest
Survey of Native American artwork from the southwestern United States covering architecture, arts and crafts from the prehistoric period to the present. Also includes the history of native cultures of the region. Field trips to local prehistoric sites and museums. General Education: Arts and Humanities. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture. May be taken for S/U credit.

ART 105 (3)
Beginning Art
Introductory course in drawing and painting techniques and materials for students who would like to explore their creativity. One lecture; five lab. May be taken for S/U credit.

ART 110 (3)
Drawing I
Perspective and visual perception as related to developing artistic visual growth in perceiving our environment. Emphasizes analysis of objects and their compositional placement within the pictorial construction. One lecture; five lab. May be taken for S/U credit.
ART 111 (3)
Drawing II
Further development of technical and perceptual drawing skills. Emphasis on composition and pictorial content. Prerequisite: ART 110 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 114 (3)
Stained Glass I
Copper foil and lead techniques of stained glass, including precision glass cutting and creative application of these techniques in producing interior and architectural pieces. One lecture; five lab. May be taken for S/U credit.

ART 115 (3)
Color Theory
Principles of color theory related to the visual arts. Includes a variety of media. Prerequisite: ART 110 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 120 (3)
Ceramics I
Introduction to handbuilding techniques, wheel throwing, glazing and other decorative techniques, kiln firing and ceramics history. One lecture; five lab. May be taken for S/U credit.

ART 121 (3)
Ceramics II
Emphasis on developing intermediate skill with the potter's wheel and handbuilding methods, glazing and decoration techniques, and kiln operations. Prerequisite: ART 120. One lecture; five lab. May be taken for S/U credit.

ART 130 (3)
Computer Graphics I
An introductory course in computer graphics. Introduction to design principles and visual problem solving with software suitable for two-dimensional design and illustration. Prerequisite: CIS 102 or CIS 120 or consent of instructor. Recommended: ART 110 and ART 160. Two lecture; two lab. May be taken for S/U credit.

ART 133 (2)
Calligraphy I
Basic calligraphic skills including letter form, spacing, and page design. One lecture; two lab. May be taken for S/U credit.

ART 134 (2)
Calligraphy II
Expands calligraphic skills including letterform, spacing, and page design. One lecture; two lab. May be taken for S/U credit.

ART 135 (2)
Adobe PhotoShop
Introduction to Adobe Photoshop software, its variety of tools and basic techniques for working with them. Includes practice with basic scanning and printing devices and techniques. Prerequisites: CIS 120 or consent of instructor. Two lecture. May be taken for S/U credit.

ART 140 (3)
Jewelry I
Jewelry and the hand working of nonferrous craft metals and associated materials. One lecture; five lab. May be taken for S/U credit.

ART 150 (3)
Photography I
Photography as an art form. Includes camera operation with emphasis on its use as a creative tool. Basic darkroom techniques, including film development, printing, and composition. Two lecture; four lab. May be taken for S/U credit.

ART 151 (2)
Photography Techniques & Materials
More advanced techniques and materials than the basic course. Emphasis on developing an alternative vision. Prerequisite: ART 150 or consent of instructor. One lecture; two lab.

ART 160 (3)
Color & Design
Fundamentals of two-dimensional design emphasizing study and utilization of the principles of design, development of a visual vocabulary, and study of color theory. Prerequisite: ART 110 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 165 (3)
Three-dimensional Design
Introduction to the fundamental concepts and design principles involved in organizing three-dimensional space and materials used in three-dimensional art forms. One lecture; five lab.

ART 180 (3)
Sculpture I
Introduction to sculptural processes, techniques and materials in clay, metal, wood, and stone. Includes sculptural history and criticism. Prerequisite: ART 165 or consent of instructor. One lecture; five lab. May be taken for S/U credit.
ART 190 (3)
Oil/Acrylic Painting I
Introduction to techniques and materials traditionally used in oil and/or acrylic painting. Prerequisite: ART 110 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 191 (3)
Oil/Acrylic Painting II
Intermediate course in developing expressive and descriptive skills using oil and/or acrylic paint. Prerequisite: ART 190 and ART 160 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 194 (3)
Watercolor I
Transparent qualities of watercolor medium. Techniques and materials will be used to stimulate personal creativity and uniqueness of expression. One lecture; five lab. May be taken for S/U credit.

ART 195 (3)
Watercolor II
Increased opportunity for independent development. Implements study of techniques to fit individual needs. Prerequisite: ART 194 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 199 (0.5–6)
Workshop
Designed to provide workshop courses based on student and faculty interest in pursuing or presenting an original topic. Workshops may be developed to enhance existing curriculum or to give students experience that is not covered by existing curriculum. One-half to six variable credit hours. May be taken for S/U credit.

ART 201 (3)
Art History I
Study of the historical development of significant periods and styles in painting, sculpture, and architecture from the prehistoric through the Gothic periods. Emphasis is placed upon the cultural context within which the works of art are created. Prerequisite: ENG 101. General Education: Arts and Humanities, Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture.

ART 202 (3)
Art History II
Historical development of significant periods and styles in painting, sculpture, and architecture from the Renaissance to the twentieth century with an emphasis on the cultural context within which the works of art were created. Prerequisite: ENG 101. General Education: Arts and Humanities, Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture.

ART 203 (3)
Artist's Business Course
Business skills for the practicing artist. Budgeting, bookkeeping, tax planning, contracts, marketing, and grantsmanship. Three lecture.

ART 210 (3)
Life Drawing I
Application of the elements of drawing in the description of the human figure, drawing from the model. Topics include: light and shade, composition, and anatomy. Prerequisite: ART 110 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 214 (3)
Stained Glass II
Design and construction of stained glass pieces using copper foil and/or lead processes, manipulation of the surface of glass using an etching process, basic glass design vocabulary, developing proficiency with glass working hand tools. Prerequisite: ART 114. One lecture; five lab. May be taken for S/U credit.

ART 220 (3)
Art of the United States
Study of the historical development of the arts and architecture in America from the Colonial period to the present. Prerequisite: ENG 101. General Education: Arts and Humanities, Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture. May be taken for S/U credit.

ART 221 (3)
Art of the Southwest
A historical survey of painting, sculpture, and architecture in the southwestern region of the United States from prehistoric time to the present. Prerequisite: ENG 101. General Education: Arts and Humanities, Special Requirements: Contemporary Global/International Awareness or Historical Awareness, Ethnic/Race/Gender Awareness. Three lecture.

ART 225 (3)
History of Photography
Historical development of the aesthetics and technology of photography from 1836 to the present. Prerequisite: ENG 101. Three lecture.

ART 230 (3)
Illustration I
Introduction to illustration styles, techniques and materials. Emphasis on creative solutions to visual communications projects. One lecture; three lab.
ART 232 (3)  
Documentary Photography  
An introductory course in the field of documentary photography, to include camera use, documentary history and techniques. Field trips. Prerequisite: ART 150, English 101, or consent of the instructor. Two lecture; two lab.

ART 280 (3)  
Advanced Studio Workshop  
A course for students interested in further developing artistic expression and skills in order to pursue personal artistic goals. Prerequisite: ART 111, or ART 190, or ART 195, or ART 210. One lecture; five lab.

ART 290 (3)  
Visual Arts Practicum  
Portfolio development and community based service learning experience for visual arts majors. One lecture; three lab.

ART 294 (3)  
Watercolor III  
An advanced course in watercolor painting with increased opportunity for development of individual style through traditional and experimental techniques. Prerequisite: ART 195 or consent of instructor. One lecture; five lab. May be taken for S/U credit.

ART 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ASL—American Sign Language

ASL 101 (4)  
American Sign Language I  
Principles, methods, and techniques for acquiring basic skills using American sign language, with emphasis on developing visual and receptive skills and basic communication. General Education: Options. Four lecture.

ASL 102 (4)  
American Sign Language II  
Further emphasis on American Sign Language vocabulary, grammar, receptive, and expressive technique development. Prerequisite: ASL 101 or consent of instructor. General Education: Options. Four lecture.

ASL 201 (4)  
American Sign Language III  
Enhanced focus on expressive and receptive American Sign Language sign skills. Application of syntactical and grammatical structure, idioms, body language, and cultural aspects of deafness. Prerequisite: ASL 102 or consent of instructor. General Education: Options. Four lecture.

ASL 202 (4)  
American Sign Language IV  
Further development of American Sign Language communication skills with emphasis on spontaneous conversation, discussions, narratives, and register. Prerequisite: ASL 201 or consent of instructor. Four lecture. General Education: Options. Four lecture.

ASL 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

AUT—Automotive

AUT 100 (3)  
Automotive Basics  
Basic automotive knowledge as it relates to owner and operator of an automobile or light truck. It will give the student an understanding of systems and maintenance. Two lecture; two lab.

AUT 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

AVT—Aviation

AVT 131 (3)  
Private Ground School  
Aviation fundamentals including aerodynamics, aircraft performance and operations, earth’s atmosphere and weather systems, radio communications and navigation, aeronautical chart reading and course plotting, use of the plotter and slide graphic physiology. Three lecture. May be taken for S/U credit.

AVT 132 (3)  
Instrument Pilot Ground School  
Non-flying aspects of instrument pilot aviation needed to prepare for the FAA written examination and to become an instrument-rated pilot. Topics include instrument flight environment, operational confederations, advanced meteorology, instrument flight planning, and regulations. Three lecture.
Course Descriptions

AVT 298 (1-6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

AZG—Arizona Government University

AZG 298 (.25-3)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. .25 to three variable credit hours.

BIO—Biology

BIO 100 (4)  
Biology Concepts  
Basic principles and concepts of biology. Explores methods of scientific inquiry and behavior of organisms and energy in biological systems. Prerequisites: MAT 087 or placement; ENG 101 or placement; or consent of instructor. General Education: Physical and Biological Sciences. Three lecture; three lab.

BIO 105 (4)  
Environmental Biology  
Basic concepts of ecology and the importance of human interaction with the natural ecosystem. Field trips. Pre- or co-requisites: MAT 087, or placement; ENG 102; or consent of instructor. General Education: Physical and Biological Sciences; Special Requirements: Contemporary Global/International Awareness or Historical Awareness; Intensive Writing/Critical Inquiry. Three lecture; three lab.

BIO 109 (4)  
Natural History of the Southwest  
Based on the life zone concept, an examination of the geologic history and ecological history of the Southwest. Emphasis is on the identification and adaptations of biotic populations. Involves field trips. General Education: Physical and Biological Sciences. Prerequisite: ENG 101 or consent of instructor. Three lecture; three lab.

BIO 112 (2)  
Native Plants of Northern Arizona  
An exploration of common plant species native to Northern Arizona with special emphasis on plant identification, collection, and distribution. Field Trips. One lecture. Three lab.

BIO 160 (4)  
Introduction to Human Anatomy & Physiology  
Biology 160 is the study of the structure and function of the human body. It is designed for students who want a one semester course in anatomy and physiology and those pursuing certificates in the allied health sciences; students majoring in the sciences or preparing for professional health science careers should enroll in the BIO 201/202 sequence. Prerequisite: ENG 031 or placement. General Education: Lab Sciences. Three lecture; three lab.

BIO 181 (4)  
Unity of Life I: Life of the Cell  
An introductory course for biology majors emphasizing central principles related to cellular and molecular processes in the cell. Course will include molecular structure, cell structure, reproduction, metabolism molecular genetics and evolution. Prerequisite: high school algebra and biology or consent of instructor. Three lecture; three lab.

BIO 182 (4)  
Unity of Life II: Multicellular Organisms  
The second semester of introductory biology majors course. Builds on principles from BIO 181 to emphasize organism principles of life. Covers all multicellular organisms. Prerequisite: BIO 181. Three lecture, three lab.

BIO 201 (4)  
Human Anatomy & Physiology I  
Design and function of the human body. Topics include cells, tissues, integumentary, muscular, skeletal, nervous, and sensory systems. Prerequisite: BIO 181. General Education: Physical and Biological Sciences. Three lecture; three lab.

BIO 202 (4)  
Human Anatomy & Physiology II  
Design and function of the human body. Topics include body fluids, immune, cardiovascular, respiratory, digestive, urinary, and reproductive systems. Prerequisite: BIO 201 or consent of instructor. General Education: Physical and Biological Sciences. Three lecture; three lab.

BIO 205 (4)  
Microbiology  
Microorganisms and their relationships to health, ecology, and related areas. Prerequisite: one semester of college-level chemistry or consent of instructor. General Education: Physical and Biological Sciences. Three lecture; three lab.
BIO 253  (4)
Biotechnology & Current Issues
Examinations of the natural and human-manipulated processes involved in genetics and gene expression. Concentrations on current genetic manipulations and potential consequences in biological, ecological, and social systems along with potential ethical, and legal concerns. Curriculum may vary depending on current concerns. Field trips may be involved. Intended for those interested in the influence of science on society. Prerequisite: BIO 100 or consent of instructor. General Education: Physical and Biological Sciences. Three lecture; three lab.

BIO 298  (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

BUS—Business

BUS 100  (3)
Mathematics of Business
Mathematical concepts and procedures involved in financial transactions. Includes percentages, liabilities, insurance, investments, assets, amortization, proration, taxes, and banking as it pertains to business. Prerequisite: MAT 087 or placement. Three lecture.

BUS 103  (3)
Personal Finance
Problem solving for the financial needs of individuals. Includes budgeting, banking, home ownership and real estate, saving, investing, borrowing, insurance, and planning for wills and trusts. Three lecture.

BUS 105  (3)
Basic Investments
Study of inflation, taxation, government securities, stocks and bonds, real estate, and retirement plans. Three lecture.

BUS 111  (3)
Business English
Effective listening, responding, reading, and writing with emphasis on using these skills in the work place, from job application and interview to on-the-job oral and written communications. Prerequisite: ENG 101 or placement. Three lecture.

BUS 203  (3)
Business Law

BUS 204  (3)
Business Communications
Solving business problems through effective oral and written communications. Letter forms and methods of writing business letters. Creating functional letters related to inquiry, response, good will, sales, credit, and adjustment and collection. Prerequisite: ENG 101 or BUS 111 or placement on the Business English Proficiency Test. Three lecture.

BUS 206  (3)
Principles of Management
Fundamentals of management including the management principles and techniques used for business objectives, structure, operational procedures, and control procedures. Principles and techniques discussed may be applied to any area of business and industry. Three lecture.

BUS 207  (3)
Principles of Marketing
Environment of marketing including analysis of various marketing activities and discussion of the economic, psychological and sociological factors which influence marketing activities. Three lecture.

BUS 209  (3)
Principles of Supervision
Concepts and techniques used in the direct supervision of others. Supervisor's relationship to those directly supervised and others in the organization, management of human and physical resources, group processes, communication, and leadership skills. Three lecture.

BUS 211  (3)
Human Resources/Personnel Management
Human resources planning and its application to the organization's goals and objectives. Human resources policies, job analysis, employee selection, training, performance evaluation, benefits, compensation, labor relations, morale, safety, and termination. Three lecture.

BUS 213  (3)
Small Business Management
Fundamentals of starting and operating a small business. Location, financing, organization, feasibility studies, and sales promotion. Three lecture.

BUS 214  (3)
Legal, Ethical & Regulatory Issues in Business
Legal theories, ethical issues, and regulatory climate affecting business policies and decisions. Prerequisite: ENG 101 or consent of instructor. General Education: Social and Behavioral Sciences. Three lecture.
BUS 216 (3)
Principles of Business Finance
Principles of financial management as applied to the operations of non-financial business and industry firms. Application of financial analysis tools and techniques needed for the process of business and industry financial administration and decision making, goals and functions of financial management, analysis and planning, working capital management, capital budgeting, and the cost of capital risk. Three lecture.

BUS 218 (3)
Customer Service
Effective communication skills to benefit the customer service contact personnel. Establishing contact, defining and resolving problems, and closing an encounter. Three lecture.

BUS 232 (3)
Business Statistics & Analysis
Business statistics, including the collection, tabulation, and analysis of business and economic data. Averages, dispersion, statistical inference, correlation and regression, and statistical decision making and problem solving. Prerequisite: MAT 142 or higher. Three lecture.

BUS 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

CHM—Chemistry

CHM 090 (3)
Preparatory Chemistry
Introductory course designed for students who have not had chemistry before and are planning to take CHM 130 or CHM 151. Includes basic principles and concepts of chemistry. Prerequisite: MAT 087 or placement, and ENG 060 or placement. Three lecture. S/U credit only.

CHM 130 (4)
Fundamental Chemistry
General inorganic chemistry, scientific methods, and general laboratory procedures. Prerequisites: high school chemistry or CHM 090 and MAT 121 or equivalent, or consent of instructor. General Education: Physical and Biological Sciences. Three lecture; three lab.

CHM 151 (5)
General Chemistry I
Fundamental concepts in chemistry. Stoichiometry, gas laws, atomic and molecular theory, and states of matter. Prerequisites: MAT 121 or placement and high school chemistry or satisfactory completion of CHM 090, or consent of instructor. General Education: Lab Sciences. Four lecture; three lab.

CHM 152 (5)
General Chemistry II
Continuation of Chemistry 151 with an emphasis on kinetics and equilibrium, nuclear, aqueous solution, and electrochemistry. Prerequisite: CHM 151. General Education: Physical and Biological Sciences. Four lecture; three lab.

CHM 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

CIS—Computer Information Systems

CIS 102 (2)
Computer Literacy
Introduces students to general computer concepts including computer-related terminology, computer system components, and computer operations. Students will have an opportunity to become familiar with personal computers for personal or business applications and create documents using word processing, spreadsheet, charting, and database software. No prior computer experience is necessary. Two lecture. May be taken for S/U credit.

CIS 110 (3)
Windows, the Internet, and Online Learning
Introduces students to the Windows Operating System, the Internet, and online instruction with an emphasis on hands-on learning. Students will gain the skills necessary to work comfortably in the Windows and WebCT environments, manage files efficiently, use e-mail effectively, and conduct research on the World Wide Web. Students will become familiar with the skills and mindset necessary to succeed in online courses. Three lecture.

CIS 111 (2)
Principles of Programming
Introduction to programming logic and structures as applied to business computer applications and programming languages. Structure techniques and high-level languages. No prior computer experience necessary. Two lecture. May be taken for S/U credit.

CIS 112 (2)
Introduction to Windows
Basic operations and components of Windows environment through hands-on experience use many of the Windows tools and accessory applications. Two lecture. May be taken for S/U credit.
CIS 113  (1)
Introduction to PowerPoint
An introduction to creating, modifying, enhancing and presenting a PowerPoint presentation. Students will learn basic techniques and skills needed to create slides with special effects, animation and transition elements for professional presentations. One lecture. May be taken for S/U credit.

CIS 115  (1)
Introduction to the Internet
Introduces students to general concepts, components, and operations related to the use of the Internet. Through hands-on computer activities, students will gain the skills necessary to browse and search the World Wide Web and to use e-mail. No prior computer experience is necessary. One lecture. May be taken for S/U credit.

CIS 117  (2)
Intro to Web Page Design
An introduction to creating and editing documents for the World Wide Web (WWW). Students will learn basic editing and design skills and develop a multi-page document including graphical elements. CIS 115 or prior fundamental working knowledge of the Internet is recommended. Two lecture. May be taken for S/U credit.

CIS 120  (3)
Introduction to Computer Information Systems
Concepts and theories regarding computer hardware, software, and information processing systems. Includes an intensive lecture component covering the most current technological and computer information available and a hands-on component using word processing, spreadsheet, database, and presentation, e-mail and web browsing application software packages. No prior experience necessary. General Education: Options. Three lecture.

CIS 122  (2)
Introduction to MS Word
Concepts and capabilities of word processing software Microsoft Word in the Windows environment through extensive hands-on experience with business applications creating, editing, and enhancing documents appropriate to the work environment and personal use. No prior computer experience required. Two lecture. May be taken for S/U credit.

CIS 123  (2)
Introduction to Excel Spreadsheets
Concepts and capabilities of electronic spreadsheet software using Microsoft Excel through extensive hands-on experience. Students will gain the necessary knowledge and skills to: create, edit, enhance worksheets and charts; use the data features of filtering, summarizing through sub-totals and totals, and pivot tables; link and embed objects between various Microsoft Office application software appropriate for workplace or personal use. Prior computer experience is not required. Two lecture. May be taken for S/U credit.

CIS 125  (3)
Introduction to Databases

CIS 127  (3)
Introduction to Desktop Publishing
Basic and advanced concepts and capabilities of desktop publishing software in the Windows environment through extensive hands-on experience using business and personal applications. Prerequisite: CIS 122, or consent of instructor. Three lecture. May be taken for S/U credit.

CIS 130  (3)
Microcomputer with A+
This course will prepare students for the A+ CompTIA core exam. Focus will be on installations, configuration, and upgrading, diagnosing and troubleshooting, preventive maintenance, motherboards, processors, memory, printers, basic networking, system and bus architecture, expansion boards and slots, floppy/hard drive components and controllers, input and output devices, power supplies, and customer service. Three lecture.

CIS 135  (3)
Microcomputer Repair A+ OS
This course will prepare students for the A+ CompTIA OS exam. Focus will be on operating system's functions, file concepts and procedures, Windows OS 9X, 2000, and XP installations, configuration and upgrading, boot system sequences, diagnosing and troubleshooting error messages, basic system network procedure and connections. Prerequisite: CIS 130 or consent of instructor. Three lecture.

CIS 140  (4)
CISCO Network Academy Semester 1
This is the first of four semester courses designed to provide students with classroom and laboratory experience in current and emerging networking technology that will empower them to enter employment or further education and training in the computer networking field. A task analysis of current industry standards and occupational analysis was used to develop the content. Instruction includes, safety, networking, network terminology and protocols, network standards, local-area networks (LANs), wide-area networks (WANs), open system interconnection (OSI) models, cabling, cabling tools, routers, router programming, Ethernet, internet protocol (IP)
addressing, and network standards. Particular emphasis is given to the use of decision-making and problem-solving techniques in applying science, mathematics, communication, and social-studies concepts to solve networking problems. In addition, instruction and training are provided in the proper care, maintenance, and use of networking software, tools, and equipment and all local, state, and federal safety, building, and environmental codes and regulations. Co-requisite: CIS 120. Four lecture. Fall only.

CIS 150 (4)  
CISCO Network Academy Semester 2  
This is the second of four semesters in the Cisco Networking Academy Program. The program is designed to teach students the skills they will need to design, build, and maintain small to medium size networks. This provides them with the opportunity to enter the workforce and/or further their education and training in the computer-networking field. Prerequisite: CIS 140. Four lecture. Spring only.

CIS 160 (4)  
CISCO Network Academy Semester 3  
This is the third of four semesters in the Cisco Networking Academy Program. The program is designed to teach students the skills they will need to design, build, and maintain small to medium size networks. This provides them with the opportunity to enter the workforce and/or further their education and training in the computer-networking field. Prerequisite: CIS 150. Four lecture. Fall only.

CIS 161 (4)  
UNIX Administration I  
This is the first of two semester courses designed to provide students with classroom and laboratory experience in current and emerging UNIX Administration that will empower them to enter employment or further education and training in the computer administration/networking field. A task analysis of current industry standards and occupational analysis was used to develop the content. Instruction includes, but is not limited to, safety, UNIX Administration, UNIX networking, UNIX terminology and related protocols, network operation system standards, local-area networks (LANs), network management tools, user administration, files and directories, backup and recovery, and internet protocol (IP) addressing. Particular emphasis is given to the use of decision-making and problem-solving techniques in applying science, mathematics, communication, and social studies concepts to solve UNIX Administration/Networking problems. In addition, instruction and training are provided in the proper care, maintenance, and use of UNIX software, tools, and equipment. Prerequisite: CIS 161. Four lecture. Spring only.

CIS 170 (4)  
CISCO Network Academy Semester 4  
This is the last of four semesters in the Cisco Networking Academy Program. The program is designed to teach students the skills they will need to design, build, and maintain small to medium size networks. This provides them with the opportunity to enter the workforce and/or further their education and training in the computer-networking field. Prerequisite: CIS 160. Four lecture. Spring only.

CIS 171 (4)  
UNIX Administration II  
This is the second of two semester courses designed to provide students with classroom and laboratory experience in current and emerging UNIX administration that will empower them to enter employment or further education and training in the computer administration and networking field. A task analysis of current industry standards and occupational analysis was used to develop the content. Instruction includes, but is not limited to, safety, UNIX administration, UNIX networking, UNIX terminology and related protocols, network operation system standards, local-area networks (LANs), network management tools, user administration, files and directories, backup and recovery, and internet protocol (IP) addressing. Particular emphasis is given to the use of decision-making and problem-solving techniques in applying science, mathematics, communication, and social studies concepts to solve UNIX administration and networking problems. In addition, instruction and training are provided in the proper care, maintenance, and use of UNIX software, tools, and equipment. Prerequisite: CIS 161. Four lecture. Spring only.

CIS 217 (3)  
Web Publishing I  
Design and creation of presentations for publishing on the World Wide Web. Through extensive hands-on experience, students will gain the necessary authoring skills to design, prepare, edit, publish and maintain Web sites that incorporate tables, forms, image maps, Common Gateway Interface (CGI) scripts, animation, multimedia, and HTML programming. Covers emerging issues in Web publishing. Prior understanding of the fundamentals of Web page design and experience creating Web pages is required. Prerequisites: CIS 117 or consent of instructor. Three lecture. May be taken for S/U credit.

CIS 220 (4)  
Computer Programming I  
Focuses on using programming language to illustrate good programming practices, application development techniques and visual design. The course will provide students with a good foundation in structured programming concepts and practices. Emphasis placed on the development of small business systems
applications. CIS 111 Principles of Programming strongly recommended prior to this course. Prerequisite: CIS 120 or consent of instructor. Four lecture.

CIS 221 (4)
Computer Programming II
Focuses on features to construct Java applets, Java applications, control structures, methods, arrays, character and string manipulation, graphics, object-oriented programming, and structured. Prerequisite: CIS 220 or consent of instructor. Four lecture.

CIS 222 (2)
Advanced MS Word
Extensive hands-on experience in advanced concepts and capabilities of MS Word. Prior experience creating, editing, and formatting documents required. Prerequisite: CIS 122 or consent of instructor. Two lecture. May be taken for S/U credit.

CIS 223 (2)
Advanced Excel Spreadsheets
Advanced features of Microsoft Excel spreadsheet software that can be applied for personal use or in a business environment. Features will include: multiple worksheets and summary sheets, mail merge, range names, financial functions, macros, scenario. Prior experience creating, editing, and formatting spreadsheets and charts required. Prerequisite: CIS 123 or consent of instructor. Two lecture. May be taken for S/U credit.

CIS 230 (4)
Implementing & Supporting Windows
Installing, configuring, customizing, optimizing and troubleshooting Windows 2000 operating system. This course includes integrating Windows 2000 with various networks. This course helps to prepare students to take the Microsoft Certified Professional exam for Windows 2000 Professional (70-210). Prerequisite: CIS 130 and 135. Four lecture.

CIS 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

DAN—Dance

DAN 100 (2)
Beginning Dance Movement

DAN 105 (2)
Aerobic Dance I
Aerobic dance as a fun way to develop strength, endurance, and flexibility through strengthening, stretching, and cardiovascular activity. One lecture; two lab. May be taken for S/U credit.

DAN 110 (2)
Ballet I
Basic ballet techniques and appreciation of ballet as a form of artistic expression. One lecture; two lab. May be taken for S/U credit.

DAN 111 (2)
Beginning Yoga
Beginning Yoga including yoga postures, breathing, history, and philosophy. One lecture; two lab. May be taken for S/U credit.

DAN 120 (2)
Modern Dance I
Beginning modern dance technique. One lecture; two lab. May be taken for S/U credit.

DAN 130 (1)
Concert Dance I
Performance in specially choreographed dance productions. Methods used in choreography. Two lab. May be taken for S/U credit.

DAN 140 (1)
Folk Dance I
Elements of folk dancing. Two lab. May be taken for S/U credit.

DAN 150 (2)
Jazz Dance I
Basic jazz dance technique. One lecture; two lab. May be taken for S/U credit.

DAN 160 (3)
Awareness through Dance
This is a class for students wishing to gain a greater sense of awareness of themselves through movement and dance techniques. The class incorporates different movement and awareness modalities such as Feldenkrais, yoga, Tai Chi, and improvisational dance. One lecture; four lab. May be taken for S/U credit.

DAN 170 (3)
Dance for Performing Artists
Movement techniques and styles for the performing artist. Beginning dance, improvisation, mime, vocalization and a stage presence are among the topics covered. Designed for students and performers involved in theatre, musical theatre and opera. Two lecture; two lab. May be taken for S/U credit.
DAN 180 (3)  
Dance Production  
Theory and practice of lighting, scenery, sound, and stage management for dance production. One lecture; three lab. May be taken for S/U credit.

DAN 199 (0.5–6)  
Dance Workshop  
Designed to provide workshop courses based on student and faculty interest in pursuing or presenting an original topic. Workshops may be developed to enhance existing curriculum or to give students experience that is not covered by existing curriculum. One-half to six variable credit hours.

DAN 200 (2)  
Improvisation  
Introduces principles of dance improvisation. Study and development of creative movement sources and potential through exploration of human and environmental relationships. One lecture; two lab. May be taken for S/U credit.

DAN 211 (3)  
Ballet II  
Ballet techniques for the student with previous ballet experience. Two lecture; two lab. May be taken for S/U credit.

DAN 215 (3)  
Teaching Dance for Children  
Theory and practice of teaching creative dance for children. Prerequisites: DAN 200 and one of the following: DAN 211 or DAN 221 or DAN 250; or consent of instructor. May be taken for S/U credit.

DAN 221 (3)  
Modern Dance II  
Intermediate modern dance techniques. Two lecture; two lab. May be taken for S/U credit.

DAN 230 (3)  
Beginning Choreography  
Introduction to basic choreographic principles including composition and form and content in dance. Prerequisites: DAN 200 and one of the following: DAN 210 or DAN 221 or DAN 250; or consent of instructor. One lecture; three lab.

DAN 250 (3)  
Jazz Dance II  
Study of technical detail in the development and conditioning of the body for jazz and professional dance today. Two lecture; two lab. May be taken for S/U credit.

DAN 251 (3)  
Jazz Dance III  
Advanced study of the art and technique of jazz dance at a pre-professional level. Prerequisite: DAN 250 or permission of the instructor. Two lecture; two lab. May be taken for S/U credit.

DAN 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

DFT—Drafting

DFT 110 (3)  
Technical Drafting & CAD Fundamentals  
Technical drafting fundamentals, supported by introductions to computer-aided drafting (CAD), enabling the familiarization and visualization of drafting principles, standards, tools, and techniques. Two lecture; two lab.

DFT 125 (3)  
Architectural Drafting I  
Principles of architectural drafting design and techniques. This board-drafting course covers fundamentals of design, space, utilization, drafting tool usage, construction drafting requirements, and the development of a set of blueprints. Prerequisite: DFT 110 or consent of instructor. Two lecture; two lab.

DFT 150 (3)  
AutoCAD 2D  
This course will enable students to utilize computer-aided drafting (CAD) in a 2D medium. Prerequisite: DFT 110 or consent of instructor. Two lecture; two lab.

DFT 170 (3)  
CADKey I  
Working knowledge of geometric construction and an introduction to computer-aided manufacturing software program in creating 2D drawings. Two lecture; two lab.

DFT 200 (3)  
AutoCAD 3D  
This course furthers a student's mastery of computer-aided drafting (CAD) by exploring how to unlock the power of 3D through the use of advanced AutoCAD applications. Prerequisite: DFT 150. Two lecture; two lab.

DFT 210 (3)  
Technical Drafting I: CAD 2D  
Application of technical drafting technology using computer-aided drafting (CAD) as the medium for drafting. Auxiliary views, revolutions, dimensioning, tolerancing, fasteners, design, and working drawings shall be covered, utilizing several working drawings. Prerequisite: DFT 150. Two lecture; two lab.
DFT 225  (3)  
Architectural Drafting I: CAD  
Application of constructing architectural drawings uses the power of computer-aided drafting (CAD) as the medium for drafting. Utilizes working drawings to focus on scale to drawing parameters, symbol libraries, dimensioning, and drafting enhancement. Prerequisites: DFT 125 and DFT 150. Two lecture; two lab.

DFT 260  (3)  
Architectural Drafting II: CAD  
Advanced application of construction architectural drawings using the power of 2D and 3D computer-aided drafting (CAD) as the medium for drafting. Advanced 2D detail views, electrical, mechanical, and plumbing, 3D drawings including floor plans, plot plans, elevations, perspectives, landscape, and detail views, utilizing several working drawings interfacing with a multi-pen plotter. Prerequisites: DFT 200 and DFT 225. Two lecture; two lab.

DFT 270  (3)  
CADKey II  
Advanced knowledge of the 3D capabilities of the computer-aided drafting (CAD) software and the Cartesian coordinate system common to most CAD systems with the addition of the Z axis or depth of a given design. Prerequisite: DFT 170. Two lecture; two lab.

DFT 298  (1-6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ECE—Early Childhood Education

ECE 100  (3)  
Introduction to Early Childhood Education  
An introduction to the profession of early childhood education, including an historical overview, developmentally appropriate practice, cultural diversity, family roles, teacher roles, professional development and current issues. Three lecture.

ECE 110  (3)  
Early Childhood Curriculum  
The fundamentals of curriculum theory and design appropriate to the developmental needs of young children. Three lecture.

ECE 120  (3)  
Health, Safety & Nutrition for the Young Child  
Provides a study of health, safety and nutrition with related activities including current issues, guidelines and practices in early childhood settings. Three lecture.

ECE 200  (3)  
Child Guidance  
Exploration, through observation and recording, of behaviors of young children. Emphasis placed on positive guidance techniques to promote pro-social behaviors and self-guidance for young children. Prerequisite: PSY 101. Three lecture.

ECE 210  (3)  
Creative Arts for the Young Child  
Evaluating and designing developmentally appropriate activities for the young child. Emphasis given to visual arts, dramatic play, creative music and movement, exploration and discovery. Three lecture.

ECE 220  (3)  
Language Arts for the Young Child  
Study of theories and practices to assist young children in language and literacy development. Focus on both oral and written literacy through listening, speaking, reading and writing. Three lecture.

ECE 230  (3)  
Exploration & Discovery for the Young Child  
Study of theories, methods and materials for promoting questioning and problem solving in young children. An emphasis on math and science through discovery and play. Three lecture.

ECE 240  (3)  
School, Family & Community Relations  
Study of the relationship between the child, the family, the community and the early childhood educators. Involves multicultural issues and diversity. Prerequisite: ECE 100. Three lecture.

ECE 250  (3)  
Children with Special Needs  
Survey of information regarding young children with special needs. Includes assessment of needs, curriculum development, available resources, advocacy roles and legislative issues. Prerequisite: PSY 234. Three lecture.

ECN—Economics

ECN 204  (3)  
Macroeconomic Principles  

ECN 205  (3)  
Microeconomic Principles  
Course Descriptions

ECN 298 (1–6)
Special Topics
Designed to meet the needs of individual with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

EDU—Education

EDU 200 (3)
Introduction to Education
An examination of the development of education in the United States, the historical development and social foundations of education and teachings, the student as learner, and current issues and trends in education. This course includes 30 hours of classroom experiential involvement in local schools. Three lecture.

EDU 222 (3)
Introduction to Special Education
Study of special education with emphasis on factors relating to current practices, identification, and characteristics of emotionally handicapped, learning disabled, and mentally handicapped children. Three lecture.

EDU 230 (3)
Cultural Diversity in Education
Examination of the relationship of cultural values to the formation of the child’s self-concept and learning styles, as well as the examination of the role of prejudice, stereotyping and cultural incompatibilities in education. Emphasis on preparing future teachers to offer an equal educational opportunity to children of all cultural groups. Three lecture.

EDU 240 (3)
Teaching Basic Literacy
Examine effective reading and writing instruction for children. Focusing on the skills and knowledge necessary to educate thoughtful, competent readers through an integrated program of reading, writing, speaking and listening skills. Three lecture.

EDU 250 (3)
The Community College
Development and purpose of the community college in the United States including current practices and issues. A methods course that focuses on analysis of teaching and learning styles, delivery, student assessment at course and program level, and curriculum development. Three lecture.

EDU 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ELT—Electronics

ELT 100 (3)
Concepts of Electricity & Basic Electronics
Electronics, including DC and AC, transistors, optoelectronic devices, linear and digital ICs, and electronic career opportunities. One lecture; three lab.

ELT 120 (3)
Direct Current (DC)
Basic electricity theory and components beginning with Ohm’s Law and atomic structure and progressing to circuit analysis techniques used in solving series, parallel and series-parallel networks. Uses network theorems to evaluate multiverse circuits. Prerequisite: MAT 121 or placement. Two lecture; two lab.

ELT 130 (3)
Alternating Current (AC)
Basic electrical theory as it applies to circuits containing capacitance, inductance, and resistance with sinusoidal voltages applied. Simple and complex circuits are studied and measured using instruments such as a signal generator and oscilloscope. Prerequisite: MAT 121 or placement. Two lecture; two lab.

ELT 135 (3)
Microcomputer Operating Systems & Architecture
Theory of digital logic gates, characteristics of input and output devices, memory hierarchy, central processing action, program processing, data transfer groups, interrupts, programmable peripheral group, C high level language, parallel and serial ports. Operation of utility programs to analyze system performance, diagnosis and correction of disk problems using real-world applications. Prerequisite: CIS 111. Co-requisite: MAT 121 or consent of instructor. Two lecture; two lab. May be taken for S/U credit.

ELT 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

EMS—Emergency Medical Services

EMS 100 (3)
Emergency Medical Services First Response Training Course
Working knowledge of emergency medicine per the U.S. Department of Transportation guidelines. Two lecture; two lab.
EMS 131 (7)
Emergency Medical Technician
Uses the 1994 curriculum adapted by the Arizona Department of Health Services. Helps prepare students for the Arizona State Department of Health Services EMT Examination. Prerequisites, per DHS standards, are required prior to entry into the course: 18 years old, must have current level "C" CPR certification, show proof of passing certified ninth-grade reading level proficiency exam. Evidence of MMR vaccination, TB test six months prior to the start of class. Seven lecture.

EMS 211 (2)
Emergency Medical Technician Refresher
Updates basic EMT graduates on new techniques and reviews important principles in client care, basic life support, and transportation of the sick and injured. Emphasizes practical usage and experience in all phases. Meets Arizona Department of Health Services refresher training requirements. Prerequisite: EMS 131 or equivalent. May be repeated for additional credit as an exception to general college policy; maximum of six credits in EMS 211 may apply toward a degree. Two lecture.

EMS 252 (13)
Intermediate Emergency Medical Technician I
An approved Arizona Department of Health Services course to upgrade from a certified Emergency Medical Technician. Prerequisite: Certified EMT for one year, and acceptance into course. Ten lecture; six lab.

EMS 262 (20)
Certified Emergency Paramedic
Preparation of the basic emergency medical technician to an advanced paramedic provider level. Includes human anatomy and physiology, physical assessment, airway and ventilation techniques, IV therapy, medical emergencies, and trauma patient management required for preparation for EMS 251. Prerequisite: one year as a Certified EMT and acceptance into the program. Thirteen lecture; twenty-one lab.

EMS 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ENG—English

ENG 020 (1)
Sentence Structure
Individualized, self-paced instruction in basic sentence construction, adding elements, and writing a variety of sentences. Audio-tutorial. Prerequisite: consent of advisor. Three lab. May be taken for S/U credit.

ENG 021 (1)
Grammar Skills
Individualized, self-paced instruction in grammar with emphasis on correct verb, pronoun, adverb, and adjective usage. Audio-tutorial. Prerequisite: consent of advisor. Three lab. May be taken for S/U credit.

ENG 022 (1)
Punctuation Skills
Individualized, self-paced instruction in the use of commas, semicolons, colons, and other punctuation marks. Audio-tutorial. Prerequisite: consent of advisor. Three lab. May be taken for S/U credit.

ENG 023 (1)
Paragraph Development
Individualized, self-paced instruction in writing topic sentences and organizing specific support in basic paragraphs. Audio-tutorial. Prerequisite: consent of advisor. Three lab. May be taken for S/U credit.

ENG 024 (1)
Spelling Improvement
Individualized, self-paced instruction in spelling with emphasis on hearing, seeing, and writing common English words. Audio-tutorial. Prerequisite: consent of advisor. One lecture. May be taken for S/U credit.

ENG 025 (1)
Vocabulary Improvement
Individualized, self-paced instruction in strengthening vocabulary with emphasis on prefixes, suffixes, roots, and understanding words in context. Audio-tutorial. Prerequisite: consent of advisor. Three lab. May be taken for S/U credit.

ENG 036 (2)
Introduction to English as a Second Language
Individual and small group works in listening to, speaking, reading, and writing the English language. Prerequisite: consent of instructor. Two lecture. May be taken for S/U credit.

ENG 037 (3)
English as a Second Language
Intensive study for improving basic skills in listening to, speaking, reading, and writing in English. Prerequisite: placement or consent of instructor. Three lecture. May be taken for S/U credit.

ENG 050 (1)
Fundamentals of English Grammar
Intensive study and review of basic English grammar with emphasis on parts of speech, basic sentence parts and patterns, sentence modifiers, main and subordinate clauses, agreement, punctuation, capitalization, and usage. One lecture. S/U credit only.
 COURSE DESCRIPTIONS

ENG 089  (4)
Basic Reading Skills
Word identification, vocabulary in context, and comprehension. Prerequisite: Placement or consent of instructor. Four lecture. May be taken for S/U credit.

ENG 090  (4)
Intensive Writing Skills
Individual and small group work emphasizing grammar in the context of sentence writing and essay development. Pre or Co-requisite: ENG 089 or placement. Four lecture. May be taken for S/U credit.

ENG 099  (4)
Advanced Reading Improvement
Individual and small-group instruction in mastery of reading skills with emphasis on vocabulary improvement, comprehension, and flexibility of reading rate. Prerequisite: ENG 089 or placement. Three lecture. May be taken for S/U credit.

ENG 100  (4)
Fundamentals of Composition
Integrated reading/critical thinking/writing approach to basic skills needed for success in college. Extensive writing practice with emphasis on purpose, organization, and revision for clarity and correctness. Prerequisite: ENG 099 or ENG 090 or placement. Pre or Co-requisite: ENG 099. Four lecture.

ENG 101  (3)
College Composition I
Extensive practice in critical reading, thinking, and writing, with emphasis on using the writing process to communicate in multiple formats, both formal and informal, and for multiple audiences and purposes. Includes documented research. Prerequisites: ENG 100 and ENG 099, or placement. General Education: English Composition. Three lecture.

ENG 102  (3)
College Composition II
Continued development of ideas and strategies introduced in ENG 101. Extensive practice in critical thinking, reading, and writing with emphasis on composing analytical essays on literary topics and a documented research paper. Prerequisite: ENG 101. General Education: English Composition. Three lecture.

ENG 135  (3)
Career Communication
Effective listening, responding, reading, and writing with emphasis on using these skills in the work place, from job application and interview to on-the-job oral and written communications. Three lecture.

ENG 136  (3)
Career Writing
Presents situations and problems that students as business and technical writers will face. Extensive practice in writing in the workplace including memos, resumes, business letters, and technical reports. Prerequisite: ENG 060 or placement. Three lecture.

ENG 137  (3)
Introduction to Technical Writing
A practical introduction to technical writing that emphasizes proposals, technical descriptions, abstracts, reports, letters, memos, document format together with instructions and applicable graphics. Pre-requisite: ENG 100 and ENG 30 or placement. Three lecture.

ENG 139  (3)
Introduction to Creative Writing
Techniques of writing poetry, fiction, and creative nonfiction, with analysis of both published and student writing. Prerequisites: ENG 100, ENG 101 or consent of instructor. Three lecture. May be taken for S/U credit.

ENG 140  (3)
Fundamentals of Screenwriting
An integrated approach to basic skills needed for the successful completion of a feature-length script. Extensive screenwriting practice with critical analysis and group workshops to compliment the revision process. Prerequisites: ENG 101. Three lecture.

ENG 141  (3)
Critical Reading
Increasing reading rate flexibility and speed, with emphasis on improving comprehension and analytical reading skills. Prerequisite: ENG 031 or placement. Three lecture.

ENG 229  (3)
Introduction to Native American Literature
Reading and analysis of Native American literature addressing historical and contemporary cultural concerns. Pre-requisite: ENG 101 or consent of instructor. Three lecture.

ENG 234  (3)
Information Age Communication
Extensive practice in audience-centered, professional and technical communication. Emphasizes reading and critical analysis of technical writing, and computer-based composing and summarizing of technical concepts for the workplace. Prerequisites: ENG 100, ENG 136, or placement. Three lecture.

ENG 236  (3)
Introduction to the American Short Story
Reading and critical analysis of a broad representation of American short stories including the examination of ethnic, race, and gender issues. Prerequisite: ENG 101 or consent of instructor. General Education: Arts and Humanities. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture.
ENG 237 (3)
Women in Literature
Literature by and about women emphasizing stereotypes, changing roles, and psychological and philosophical concerns. Prerequisite: ENG 101 or consent of instructor. General Education: Arts and Humanities. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture.

ENG 238 (3)
Literature of the Southwest
Literature of the land and peoples of the Southwest, the influence and interaction of Native American, Chicano, and Anglo cultures, and contemporary concerns of Southwestern writers. Prerequisite: ENG 101 or consent of instructor. General Education: Arts and Humanities. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture.

ENG 240 (3)
English Literature I
A general survey of the major works in English literature from Beowulf through the neoclassical period. Prerequisite: ENG 101 or consent of instructor. Three lecture.

ENG 241 (3)
English Literature II
A general survey of the major works in English literature from the romantic period to the present. Prerequisite: ENG 101 or consent of instructor. Three lecture.

ENG 270 (3)
Creative Writing: Fiction
Extensive practice in writing and revising fiction, with emphasis on critical analysis of published models and students' work. Prerequisite: ENG 101 or consent of instructor. Three lecture. May be taken for S/U credit.

ENG 271 (3)
Creative Writing: Poetry
Extensive practice in writing and revising poetry, with emphasis on critical analysis of published models and students' poems. Prerequisite: ENG 101 or consent of instructor. Three lecture. May be taken for S/U credit.

ENG 272 (3)
Creative Writing: Non-Fiction

ENG 273 (3)
Introduction to Shakespeare
Study of a selection of Shakespeare's plays, selected sonnets, and poems. Includes an investigation into relevant history, social conditions, and literary background. Prerequisite: ENG 101 or consent of instructor. Three lecture.

ENG 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

ENV—Environmental Studies

ENG 111 (3)
Local Environmental Issues
Learners will examine their local biophysical environment, survey the regional history and economics, and then assess local environmental issues that may affect the health and well being of the local environment. Topics of concern vary depending on specific location and issues of concern. Learners may submit comments of concern to appropriate government officials. Field trips required. May be taken for S/U credit. Three lecture.

ENG 112 (4)
Regional Environmental Issues
An examination of Southwest environmental issues including an overview of regional biophysical processes and impacts from human population. Field trips (possibly overnight). Prerequisite: ENG 101 and MAT 087, or placement. May be taken for S/U credit. Three lecture; three lab.

ENG 150 (3)
Introduction to Environmental Engineering
Environmental engineering, science, and technology. Methods of calculating contaminate levels and associated risk, regulatory approaches, and engineering design of environmental pollution control. Pre- or co-requisites: MAT 151 and CHM 130 or CHM 151. Three lecture.

ENV 213 (3)
Global Environmental Issues
Students will examine the scientific basis of and reasons for concern about human population growth, loss of biodiversity and atmospheric alterations (global warming and ozone depletion). Prerequisite: any science course numbered 100-level or above, or consent of instructor. Three lecture.
ENV 298  (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

FRE—French

FRE 101  (4)
Beginning French I

FRE 102  (4)
Beginning French II
Further emphasis in basic grammar, vocabulary, and culture. Practice in speaking, reading, and writing French. Prerequisite: FRE 101 or consent of instructor. General Education: Options. Four lecture.

FRE 131  (3)
Conversational French I
Basic grammar, vocabulary, and culture in conversational practice. Three lecture. May be taken for S/U credit.

FRE 201  (4)
Intermediate French I
Improving basic skills of speaking, comprehension, reading, and writing. Taught in French. Prerequisite: FRE 102 or consent of instructor. General Education: Options. Four lecture.

FRE 202  (4)
Intermediate French II
Further development of speaking and writing communication skills with emphasis on compositions and readings. Taught in French. Prerequisite: FRE 201 or consent of instructor. General Education: Options. Four lecture.

FRE 298  (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

FSC—Fire Science

FSC 101  (2)
Fire Service Orientation & Indoctrination
Fire service, history and evaluation of fire department organization, role of the fire service in the fire department organization and in the community. Department function, management, techniques of fire fighting, laws and ordinances, and private fire protection. Two lecture.

FSC 135  (3)
Fundamentals of Fire Prevention
Role and functions of fire prevention. Practical rather than theoretical aspects of fire prevention. Three lecture.

FSC 136  (4)
Fire Apparatus & Hydraulics
Principles of care, maintenance, and operation of fire apparatus and pumps. Pump construction, pumping and pump accessories, power development and transmission, driving, trouble shooting, and producing effective fire streams. Three lecture; two lab.

FSC 137  (5)
Hazardous Materials/First Responder Awareness
Identifies hazardous materials as well as the role of various agencies at the scene of a hazardous materials incident. Recognition and identification, safety considerations, capabilities and limitations, and pre-emergency planning. One-half lecture.

FSC 138  (3)
Hazardous Materials/First Responder
Definition, detection, identification, scene management, basic training, equipment planning, strategy, and tactics in the management of hazardous materials incidents. Preparation for Department of Emergency Services certificate. Three lecture.

FSC 180  (8)
Firefighter I & II
For the new firefighter or student interested in fire fighting. Fire behavior and basic fire fighting skills, with hands-on use of fire fighting equipment. Prerequisites: FSC 138 and EMS 131. Six lecture; four lab.

FSC 233  (3)
Introduction to Wildland Fire Suppression
Provides a fundamental knowledge of the factors affecting wildland fire prevention, fire behavior, and control techniques along with an introduction to the Incident Command System. Covers material from S-190, S-130, I-100, and standards for survival (PMS 416-1). After completion, students may qualify for Red Card Certification. Three lecture.

FSC 234  (3)
Fire Investigation
Methods of determining point of fire origin and fire cause, and detection of incendiary fires. Includes simplified physics and chemistry necessary to analyze fire behavior. Three lecture.

FSC 235  (3)
Fire Protection Systems
Required standard for water supply, protection systems, automatic sprinklers, and special extinguishing systems, including analysis of various automatic signaling and detection systems. Prerequisite: FSC 180 or consent of instructor. Three lecture.
FSC 236  (3)  
Firefighter Occupational Safety 
Informational base to reduce injuries to fire fighting personnel. Awareness, training, and research of equipment to develop a safety program to meet the needs of the fire service. Three lecture.

FSC 238  (3)  
Emergency Scene Management 
Effective methods of managing emergency incidents including multiple alarm fires, high-rise fires, brush fires, hazardous materials incidents, and multi-casualty medical incidents. Includes effective interaction among numerous agencies to achieve control. Prerequisite: FSC 180 or consent of instructor. Three lecture.

FSC 239  (3)  
Fire Department Company Officer 
Administrative methods for the fire department in fire safety, department organization, and personnel supervision. Includes elements of management needed for the fire department first-level supervisor. Prerequisite: BUS 209 or consent of instructor. Three lecture.

FSC 241  (3)  
Firefighter Safety & Building Construction 
Safety for firefighters on the fire ground. Effects of fire and heat on various types of building construction resulting in the loss of structure will be explored. Includes signs and symptoms of structural damage. Three lecture.

FSC 243  (5)  
Intermediate Wildland Fire Suppression 
Instructions for an initial attack on wildland fires and the incident command system. Covers material from S-205, S-290, and I-200. After completion students may qualify for Red Card Certification. Prerequisite: FSC 233 or consent of instructor. Five lecture.

FSC 253  (5)  
Advanced Wildland Fire Suppression 
Designed to train qualified squad bosses in firing techniques and firing devices along with advanced training in the incident command system. Covers materials from S-234, S-336, and I-300. Prerequisites: FSC 233 and FSC 243 or consent of instructor. Five lecture.

FSC 298  (1–6)  
Special Topics 
Special Topics Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

GEO—Geography

GEO 102  (3)  
Human Geography 
Thematic approach towards the study of global attributes to provide a bridge between the social and environmental sciences. Emphasis consists of comparisons and contrasts among regions of the world regarding the social, cultural, economic, and political aspects of human life and understanding interactions between people and their environment. Three lecture.

GEO 131  (4)  
Introduction to Physical Geography 
Natural processes of weather, climate, hydrology, ecology, geology and tectonics, diastrophism, volcanism, denudation, soils, glaciation, and coastal processes emphasizing geographic distribution. General Education: Physical and Biological Sciences. Three lecture; three lab.

GEO 133  (3)  
World/Regional Geography 
Physical (climate, vegetation, landform) and cultural (ethnic, religious, political, economic) attributes of the world’s major regions and the interplay between them. Includes a study of world place-name geography. General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture.

GEO 298  (1–6)  
Special Topics 
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

GER—German

GER 101  (4)  
Beginning German I 
Basic grammar, vocabulary, and culture. Practice in speaking, reading, and writing German. General Education: Options. Four lecture.

GER 102  (4)  
Beginning German II 
Further emphasis in basic grammar, vocabulary, and culture. Practice in speaking, understanding, reading, and writing German. Prerequisite: GER 101 or consent of instructor. General Education: Options. Four lecture.

GER 298  (1–6)  
Special Topics 
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.
GIS—Geographic Information Systems

GIS 101 (4)
Geographic Information Systems
Basic concepts of spatial analysis and history of GIS technology. Principles of cartography, map interpretation, and student preparation for training in specific GIS software packages. Four lecture.

GIS 201 (3)
Introduction to Arc View
Technical and quality control aspects of ArcView GIS software. Hands-on experience, training, and exposure to ArcView applications in spatial analysis. Three lecture.

GLG—Geology

GLG 101 (4)
Physical Geology
The study of Earth's processes and materials including rocks and minerals, structures, landforms and their origins. General Education: Physical and Biological Sciences. Three lecture; three lab.

GLG 102 (4)
Historical Geology
Chronological study of the sequence of events involved in the creation of the earth and its inhabitants as revealed in the rock record. Prerequisite: GLG 101. General Education: Physical and Biological Sciences. Three lecture; three lab.

GLG 105 (4)
Introduction to Planetary Science
A survey of solar system objects and their geologic evolution, surfaces, interiors and atmospheres, and the methods used to study them; weekly laboratory for data analysis and experiments; may include field trip(s). Three lecture; three lab.

GLG 111 (2)
Geology of Northern Arizona
Concepts in stratigraphy, volcanology, geomorphology, and glacial and structural geology in the Northern Arizona region. Field trips. One lecture; three lab.

GLG 112 (2)
Geology of the Grand Canyon
Concepts in stratigraphy, volcanology, geomorphology, and glacial and structural geology in the Grand Canyon. Field trips. One lecture; three lab.

GLG 240 (2)
Fundamentals of Geologic Field Methods
Fundamental procedures and techniques of gathering field data in a geologic setting. Emphasis on regional landforms, structures and stratigraphy. Field trips required. Prerequisite: GLG 101 or consent of instructor. One lecture; three lab.

GLG 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

HDE—Human Development Education

HDE 099 (1)
Research Skills
Eight-week course designed to teach the skills required to utilize public and academic library resource tools. One lecture; one lab. S/U credit only.

HDE 101 (2)
Self & Career Exploration
Exploration of personal interests and strengths and compatible career choices with practical job-hunting information. Two lecture. May be taken for S/U credit.

HDE 102 (3)
College Study Skills
Improvement of academic performance through information, discussion, and experiential activities. Topics include time management, reading textbooks, taking notes, and preparing for tests. Three lecture.

HDE 104 (3)
Employment Success Strategies
Techniques for developing professional and personal skills. Includes career exploration, gender awareness, setting personal and professional goals, writing resume, cover letters and developing interviewing skills, managing time and stress. Legal rights and local community resources. Students will meet and listen to representatives from a wide range of local community service organizations. Recommended: some computer knowledge. Two lecture; two lab. May be taken for S/U credit.

HDE 131 (2)
Assertive Training
Consideration of personal rights, identifying blocks to standing up for those rights, and practice in being more assertive. Two lecture. May be taken for S/U credit.

HDE 132 (1)
Stress Management
Identifying the sources and effects of stress and learning methods to reduce stress. One lecture. May be taken for S/U credit.

HDE 133 (1)
Motivation Skills
Motivation and positive attitude in relationship to personal, interpersonal, academic, and career enhancement and success. One lecture. May be taken for S/U credit.
HDE 134 (1)
Building Self-Esteem
Self-image and self-esteem, how to stop negative thinking and behavior, and improve self-esteem. One lecture. May be taken for S/U credit.

HDE 135 (2)
Self Management Skills I
Assists in the transition from dependency and low self-esteem to independence, a higher level of self-esteem and personal empowerment. An interactive seminar. Two lecture. May be taken for S/U credit.

HDE 136 (2)
Self Management Skills II
Personal and professional development. An interactive working seminar. Prerequisite: HDE 135 or consent of instructor. Two lecture. May be taken for S/U credit.

HDE 141 (1)
The Job Search
Job search strategies, interview skills, and résumé preparation. One lecture. May be taken for S/U credit.

HDE 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

HIS -- History

HIS 131 (3)
U.S. History to 1877
Study of the peoples and forces that comprise the history of the United States from the pre-Columbian era to the end of Reconstruction (1877). General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness or Historical Awareness, Ethnic/Race/Gender Awareness. Three lecture.

HIS 132 (3)
U.S. History from 1877
History of the United States and the peoples and forces that shape it from the end of Reconstruction to the present. General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness or Historical Awareness, Ethnic/Race/Gender Awareness. Three lecture.

HIS 135 (3)
History of Mexico
Political, economic, and social forces which have created the history of Mexico from pre-Columbian times to the present. Three lecture.

HIS 136 (3)
Women in American History
Roles and contributions of women in the history of the U.S., with an emphasis on the social and cultural aspects of the feminist movements in the nineteenth and twentieth centuries. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness, Contemporary Global/International Awareness or Historical Awareness. Three lecture.

HIS 201 (3)
Western Civilization to 1660
Interdisciplinary approach to the history and development of Western civilizations from the ancient civilization of Egypt and Mesopotamia to 1660 or the dawning of modern Europe. General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture.

HIS 202 (3)
Western Civilization from 1660
Interdisciplinary approach to the history and development of Western civilizations from 1660 to the present. General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture.

HIS 236 (3)
History of the Southwest
History of the American Southwest from pre-Colombian times to the present with emphasis on how the physical geography has influenced human settlement and on the various cultures and their contributions. Three lecture.

HIS 237 (3)
Arizona History
Arizona history from the pre-Colombian period to present with emphasis on the waves of immigration and the various cultures that has shaped Arizona history. Three lecture.

HIS 238 (3)
Navajo History
Examines Diné (The People) history with emphasis on the role the Navajo have played in the economic, cultural, and political life of the Navajo nation. Three lecture.

HIS 250 (3)
Asian Civilization through 1644
Study of the political, social, economical, cultural, and intellectual history of China, Japan, and India to 1644 A.D. General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness or Historical Awareness, Ethnic/Race/Gender Awareness. Three lecture.
HIS 251 (3)
Asian Civilization from 1645
Study of the political, social, economical, cultural, and
intellectual history of China, Japan, and India since 1644
A.D. General Education: Social and Behavioral Sciences.
Special Requirements: Contemporary Global/
International Awareness or Historical Awareness,
Ethnic/Race/Gender Awareness. Three lecture.

HIS 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with
interest in pursuing an original topic in an instructional
area under faculty supervision. One to six variable credit
hours.

HON—Honors

HON 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) who has
an interest in pursuing an original topic in an
instructional area under faculty supervision.
Prerequisites: Must have verifiable overall GPA of 3.0 or
above with 12 hours earned in residence at CCC, or
consent of instructor. One to six variable credit hours.

HRM—Hotel & Restaurant
Management

HRM 100 (3)
Introduction to Hospitality
History, policies, and procedures of the hospitality
industry relating to hotel/restaurant management. Three
lecture.

HRM 140 (3)
Food Production Concepts
Introductory course identifying and describing the
various interrelated components of systematic food
service management. Three lecture.

HRM 144 (3)
Gourmet Foods I
Appreciation of international foods and their
preparation. Includes foods of France, Italy, China,
Japan, and Mexico. Three lecture; one lab. May be taken
for S/U credit.

HRM 145 (3)
Gourmet Foods II
Advanced principles and materials used in international
gourmet cooking and baking, including uses of more
advanced cookbooks, and expanded identification and
use of kitchen tools. Progressive use of spices, herbs,
wines (for cooking purposes only), and sauces. Students
will, through practical application, prepare, bake, and
serve international gourmet foods. Prerequisite: HRM
144 or consent of instructor. Three lecture; one lab. May
be taken for S/U credit.

HRM 170 (3)
Hospitality Information Technology
Introduction to information processing principles
specific to the hospitality industry, basic concepts of
hardware and software, and generic software
applications. Two lecture; two lab.

HRM 210 (3)
Guest Service Management
Overviews of the hotel industry, front office management,
guest expectations, reservations, uniformed services, and
guest accounting. Also emphasizes the importance of
communication and the key role front office plays within
the framework of the entire hotel. Three lecture.

HRM 220 (3)
Property Management
Introduction to the direction and control of
housekeeping operations, personnel and facilities
management, problem solving techniques, and guest
security and safety. Three lecture.

HRM 225 (3)
Hospitality Accounting
A study of financial statement analysis, management of
assets, ratio analysis, analytical techniques, operating
budget and investment decision-making. Prerequisite:
ACC 101. Three lecture.

HRM 235 (3)
Hospitality Law
Differentiate legal issues and laws that impact the
hotel's general operations and relationships with its
employees and guest. Three lecture.

HRM 240 (3)
Commercial Food Production
Introduction to the basic services, operations, principles,
sanitation, and presentation techniques associated with
the commercial food services industry. Two lecture;
three lab.

HRM 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with
interest in pursuing an original topic in an instructional
area under faculty supervision. One to six variable
credit hours.
HUM—Humanities

HUM 205 (3)
Technology and Human Values
Explores the relationship between technological development and individual and social values in the Western World from ancient times through the present. Includes technologies connected with a variety of areas, such as medicine, printing, agricultural production, work, ethics, art and architecture. Pre or Co-requisite: ENG 102. Three lecture.

HUM 235 (3)
American Arts & Ideas
Cultural development of the arts, literature, and philosophical and religious movements within the United States from the colonial period through the present. Pre- or co-requisite: ENG 101. General Education: Arts and Humanities. Three lecture.

HUM 237 (3)
Mexican-American Arts & Ideas
Cultural development of the arts, literature, history, religion, ideas, identity, and political impact of the Mexican-American people and their contribution to life in the United States. Three lecture.

HUM 241 (3)
Humanities I
Cultural development of the western world from the ancient Greeks to the Renaissance as reflected in the literature, visual arts, architecture, and performing arts of the various periods. Pre- or co-requisite: ENG 102. General Education: Arts and Humanities. Special Requirements: Intensive Writing/Critical Inquiry. Three lecture.

HUM 242 (3)
Humanities II
Cultural development of the Western World from the Renaissance to the present as reflected in the literature, visual arts, architecture, and performing arts of the various periods. Pre- or co-requisite: ENG 102. General Education: Arts and Humanities. Special Requirements: Intensive Writing/Critical Inquiry, Contemporary Global/International Awareness or Historical Awareness. Three lecture.

HUM 261 (3)
Asian Ideas & Values
Examination of Asian literature, religion, and the arts for their humanistic ideas and values. Three lecture.

HUM 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

IEC—Independent Electrical Contractor Apprenticeship

IEC 101 (5)
Basic Electricity
Electrical and first aid safety. Introduction to electricity, trade math, wiring techniques. Introduction to the National Electrical Code. Four lecture; two lab.

IEC 102 (5)
Electrical Residential
Series-parallel circuits, governing bodies, residential wiring practices, Kirchhoff's Law, kitchen outlets, heating systems, low voltage systems, service entrance requirements and swimming pools. Prerequisite: IEC 101 or consent of instructor. Four lecture; two lab.

IEC 103 (5)
Electrical AC & DC
Trigonometric and vector math, alternating current theory, inductance and transformer theory. Three-phase generators and single and three phase motor theory. Prerequisite: IEC 102 or consent of instructor. Four lecture; two lab.

IEC 104 (5)
Wiring Motors & Transformers
Determine sizes of wire, conduit and boxes; referencing the National Electric Code, sizing service and feeders, sizing transformers and protection of transformers. Prerequisite: IEC 103 or consent of instructor. Four lecture; two lab.

IEC 105 (5)
Electric Blueprint Reading
Three-phase systems, transformers, and blueprint reading, construction process, plumbing, masonry and welding blueprints as well as mechanical systems: electrical blueprint and grounding. Prerequisite: IEC 104 or consent of instructor. Four lecture; two lab.

IEC 106 (5)
Electric Motor Controls
Motor Control system, alternating current (AC) and direct current (DC) contractors and magnetic motor starters; time delay circuits, reversing circuits, power distribution systems and hazardous locations, sign and fiber optics. Prerequisite: IEC 105 or consent of instructor. Four lecture; two lab.
IEC 107 (5)
Electronics & Controls
Electronic components, electromechanical and electronic relays. Photoelectric and proximity controls, logic-programmable controllers, reduced voltage starters, starting direct current motors, and interpretation of electronics components. Prerequisite: IEC 106 or consent of instructor. Four lecture; two lab.

IEC 108 (5)
Alarm Systems & Controls
Fire and signaling systems. Installation and start-up of fire alarms system, fire alarm maintenance and troubleshooting. Wiring methods and materials, circuits and equipment protection, motors and air conditioning circuits, transformers and generating. Dwelling occupancies, industrial and commercial location, hazardous locations, and leadership. Prerequisite: IEC 107 or consent of instructor. Four lecture; two lab.

INT—Internship

INT 210 (1–6)
Internship I
Designed for students who are looking for paid or voluntary, practical learning experiences that apply academic and occupational education to real-life, on-the-job situations. Credit hours will be negotiated based on fulfillment of a contract. Each credit hour requires the completion of a minimum 45 hours of on-the-job participation. Prior experience or course work in the field of interest is required. One to six variable credit hours. May be taken for S/U credits.

ITC—Industrial Technology: Construction

ITC 100 (3)
Contractor’s License
Overview of construction business practices and government requirements designed to help the student prepare for obtaining a contractor’s license. Three lecture. May be taken for S/U credit.

ITC 101 (3)
Construction Safety
This course will introduce the student to safety in the Construction Industry. Emphasis will be placed on safe operation of trade tools and equipment, job site safety and early hazard recognition. Topics covered include: early hazard recognition, safety plans, safe transport and handling of construction materials and equipment, scaffolding set-up techniques, trench shoring and safety, fall prevention planning and associated hazards. Three lecture.

ITC 110 (3)
Plumbing
This course will define the plumber’s responsibility and introduce the student to the plumbing trade. Topics include: plumbing plans, safety, plumbing materials and fittings, pipes joining techniques, drain-waste and vent systems, water supply systems, fixture installations and leak testing. Emphasis will be placed on safe operation of all trade tools and equipment and job site safety. Three lecture. May be taken for S/U credit.

ITC 111 (3)
Uniform Building Code
Safety principles of building construction under the Uniform Building Code, including structural requirements for wood, masonry, fire resistant materials and ratings, and occupancy requirements. Three lecture.

ITC 120 (3)
Building the Human Environment
Addresses architectural design and construction building practices, relating some of their psychological and environmental impacts. Historical, current and projected solutions to the human need for shelter and infrastructure is explored. Three lecture.

ITC 130 (3)
Introduction to the Carpentry Industry
Introduction to the carpentry trade as an apprentice carpenter and function and procedures of local apprenticeship. Hand and power tools, measurement and shop projects. Students will also receive state OSHA 510 certification, industry safety certification, CPR, and first aid certifications. Prerequisite: Registered Apprentice Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.

ITC 131 (5)
Carpentry Math Applications & Metrics
Basic math and mathematics for carpentry, SI metric system, Imperial weights and measure. The application, conversion formula and tables used in the construction industry. Prerequisite: Registered Apprentice Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.

ITC 132 (5)
Print Reading & Advanced Blueprints
Understanding working drawings and blue prints for construction projects. Interpretation of blueprints, architectural symbols and specifications in the construction industry. Understanding and use of the different types of drawing including: elevations, sections, details and framing plan. Building codes, zoning, permits and inspections. Prerequisite: Registered Apprenticeship Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.
Course Descriptions

ITC 133  (5)
Concrete Formwork
Concrete technology and the formwork used in the
collection of basic findings and walls to the complex
formwork of heavy and highway construction. Building
layout footing and stemwall designs, retaining walls and
wall form construction. Concrete technology and
concrete estimation of various form designs. Heavy
highway construction including wall form with pilaster,
beam and girder, deck forms, concrete stairs, bridge and
pier and culvert will be part of this course. Prerequisite:
Registered Apprentice Status or permission of the
Apprenticeship Coordinator. Three lecture; four lab.

ITC 135  (3)
Solar Home Design
Alternative passive solar building techniques such as
adobe, earth brick, rammed earth, sand bag, and earth
ship will be presented, along with environmental and
aesthetic design considerations. Three lecture. May be
taken for S/U credit.

ITC 136  (3)
Photovoltaics & Wind Power
This course will define the design and installation of
photovoltaic and wind power systems. Emphasis will be
placed on electrical safety and operation of trade tools
and equipment and job site safety. Topics covered:
photovoltaic and wind power system plans, safety,
electrical materials and fittings, solar cell panel and
wind generator wiring techniques, battery systems,
inverters and charge controllers. Three lecture.

ITC 140  (3)
Blueprint Reading & Estimating
Reading construction blueprint documents and
estimating the amount of building materials needed for
building projects. Reading and interpreting architectural
schedules, symbols, and specifications. Three lecture.

ITC 145  (5)
Sheet Metal I
History and background of the sheet metal apprentice.
Basics of drafting, layout and pattern development used in
the sheet metal trade. Prerequisite: Indentured
Apprentice with the Phoenix Sheet Metal Joint
Apprenticeship and Training Committee. Five lecture.

ITC 146  (5)
Sheet Metal II
The importance of time management. Layout and
pattern development. Use of power equipment and
common sheet metal materials, trade mathematics and
orientation to air flow movement. Prerequisite: ITC 145,
Indentured Apprentice with the Phoenix Sheet Metal
Joint Apprenticeship and Training Committee. Five
lecture.

ITC 147  (5)
Sheet Metal III
Safe use of hand tools. Also, seams and locks and types
of materials common to the sheet metal industry. Basic
mathematics and introduction to service work, and field
installation covered. Prerequisite: ITC 146, Indentured
Apprentice with the Phoenix Sheet Metal Joint
Apprenticeship and Training Committee. Five lecture.

ITC 148  (5)
Sheet Metal IV
Field installations emphasizing hanging duct, inserts,
equipment and housings. Includes roof and roof pitch,
blueprint reading and sheet metal drafting. Also,
residential heating and air conditioning, blowpipe,
plastics and fiberglass. Overview of food service
equipment. Prerequisite: ITC 147, Indentured
Apprentice with the Phoenix Sheet Metal Joint
Apprenticeship and Training Committee. Five lecture.

ITC 149  (5)
Sheet Metal V
Intermediate drafting skills with more complicated
pattern layout development. Operation and safety
methods for hand operated shop machines. Use of
special materials. Introduction to the use of formulas.
Prerequisite: ITC 148, Indentured Apprentice with the
Phoenix Sheet Metal Joint Apprenticeship and Training
Committee. Five lecture.

ITC 150  (3)
Electrical Wiring I
Introduction to DC theory using Ohm’s Law, voltage
drop, resistance, and current equations. The
identification and operation of series, parallel, and
series-parallel circuits are covered. Students will learn
the necessary precautions to take for various electrical
hazards found on the job. Basic OSHA lockout and
tagout procedures and requirements are included.
Correct selection, inspection, use and maintenance of
common electrical test equipment and an introduction to
symbols, specifications, and layout of a building
blueprint are covered. Three lecture. May be taken for
S/U credit.

ITC 151  (4)
Electrical Wiring II
Types and applications of raceways, wireways, and
ducts are introduced. Students learn how to cut, ream,
thread, hand bend, and connect conduit. Introduction to
electrical conductor types, sizes, and placement
procedures associated with National Electrical Code
(NEC) requirements, methods and procedures in wiring
residential, commercial, and industrial facilities.
Prerequisite: ITC 150. Four lecture. May be taken for
S/U credit.
ITC 160 (3)  
**Electrical Wiring III**  
Covers alternating current (AC) systems and the application of Ohm's Law. Introduction to AC and DC motors including the main parts, circuits, and connections. Grounding, bonding of electrical systems and transportation, storage, and set-up of cable reels will be explored. The inclusion of rigging and procedures for complete cable pulls in raceways and cable tray. Prerequisite: ITC 151. Three lecture. May be taken for S/U credit.

ITC 161 (4)  
**Electrical Wiring IV**  
Conduit bending up to 6 inches utilizing a variety of benders, NEC requirements for selecting correct sizes of outlet, pull, and junction boxes, conduit bodies, as well as various types of fittings. NEMA and NEC installation methods and modifications for cable and cable tray. Termination, splicing, and preparation of all sizes of conductors. Selection of single and three phase services, including metering equipment. Identification and application of fuses and breakers including short circuit calculations, description of various types of contactors and relays. The principles of illumination as it applies to residential, commercial and industrial installations are also covered. Prerequisite: ITC 160. Four lecture. May be taken for S/U credit.

ITC 170 (3)  
**Plane Surveying & Building Layout**  
Building layout and surveying to establish building location for excavation and for the accurate placement of the building foundation, including finish floor elevation. Three lecture.

ITC 171 (3)  
**Electrical Construction Wiring**  
Survey of electrical construction processes for residential and light commercial applications. Determining materials, installation processes, safety, and code requirements of electrical construction will be emphasized and applied. Two lecture; two lab.

ITC 175 (3)  
**Mechanical Systems**  
Addresses heating, ventilation, air conditioning systems and plumbing systems in residential structures. Emphasis is placed on system design and layout as well as installation practices. One lecture; four lab.

ITC 180 (3)  
**Building Construction Methods I**  
Floor foundations and interior and exterior framing, including various types and methods of building foundations and framing systems. Three lecture.

ITC 185 (3)  
**Building Construction Methods II**  
Methods, materials, and safe working practices as they relate to balloon, platform, and post and beam construction using wood or wood products. Floor, interior and exterior walls, ceilings, and a general introduction to roofs as they connect or relate to framing types. Three lecture.

ITC 210 (3)  
**Structural Design & Building Materials**  
Structural analysis in building design, basic relationships between structures and architectural form, principles, concepts, and procedures from statics and mechanics of materials, and analysis of reactions including shear, deflection, flexural, and shearing stresses. Prerequisite: MAT 121 or placement. Three lecture.

ITC 220 (5)  
**Framing Walls, Roofs & Decks**  
Rough frame, post and beam, heavy timber construction theory and construction methods. Basic framing tables, roof structures, rafter frame tables, span tables and the construction codes involved in most framing projects. Tools used in the framing industry, such as the framing square and nail gun. Stair building and the different types of lumber used and grading systems. Prerequisite: Registered Apprentice Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.

ITC 221 (5)  
**Carpentry Industry Technology**  
Carpentry industry technology used in the construction of building and other projects that define the professional carpenter. The use of scaffold, scaffold systems in various applications and the certification needed to meet the current OSHA regulations. The use of rigging tools and technology. The use of the builder's level, transit level and the application to building layout in construction. Prerequisite: Registered Apprentice Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.

ITC 222 (5)  
**Interior Systems**  
Materials, systems and the technology used in the interior construction of modern buildings. Metal stud construction, acoustical ceilings, pedestal floors, and clean room facilities, make up part of this growing industry. Tools, materials and the methods needed to construct interior systems used in commercial and industrial buildings. Prerequisite: Registered Apprentice Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.
ITC 223  (5)
Interior Finish
Door hanging, finish hardware, and window installation, interior stairs, cabinets, shelving, moldings, casings and plastic laminates are included in this course. Interior finish tools, materials and procedures needed to perform finish carpentry. Prerequisite: Registered Apprentice Status or permission of the Apprenticeship Coordinator. Three lecture; four lab.

ITC 224  (3)
Concrete & Concrete Form Systems
This course will provide instruction in structural and architectural applications of concrete. It will examine concrete chemistry, mix designs, placement and finishing methods, and forming systems. Two lecture; two lab.

ITC 230  (3)
Construction Supervision & Scheduling
Function of the construction site supervisor and the process used in scheduling, pre- and post-construction, communication techniques, and documentation of records and reports. Three lecture.

ITC 235  (3)
Innovative & Alternative Building Techniques
Innovative and alternative building techniques such as steel framing, SIP, Integra or Rastra block, adobe, earth brick, rammed earth, cast earth, sand bag, papercrete, straw bale and earth ship will be presented along with environmental and aesthetic design considerations. These concepts will be integrated with a "pattern language" and passive solar design approach for student design projects. Three lecture; one lab. May be taken for S/U credit.

ITC 245  (5)
Sheet Metal VI
Advanced layout and pattern development. Use of special sheet metal power equipment. Also, trigonometric functions as applicable to the sheet metal trade and basic principles of refrigeration and air conditioning, field installation procedures. Prerequisites: ITC 149, Indentured Apprentice with the Phoenix Sheet Metal Joint Apprenticeship and Training Committee.

ITC 246  (5)
Sheet Metal VII
Various types of formulas and functions. Moving heavy equipment and planning a duct job in the field. Requirements, types, seams, and locks for architectural sheet metal are covered. Also, blueprint reading, residential heating and air conditioning, and blowpipe systems. Prerequisites: ITC 245, Indentured Apprentice with the Phoenix Sheet Metal Joint Apprenticeship and Training Committee.

ITC 247  (5)
Sheet Metal VIII
Advanced blueprint and detailing including materials estimates. Solar heating principles and installation procedures. Also, use of plastics, installation of food service equipment and signage, rigid fibrous duct board, sound attenuation, testing and balancing. Prerequisites: ITC 246, Indentured Apprentice with the Phoenix Sheet Metal Joint Apprenticeship and Training Committee.

ITC 248  (5)
Sheet Metal IX
Principles of airflow within duct systems. Includes duct system components, types of duct materials and methods of duct construction. Introduction to welding plastics and metals. Safety stressed. Prerequisites: ITC 247, Indentured Apprentice with the Phoenix Sheet Metal Joint Apprenticeship and Training Committee.

ITC 249  (5)
Sheet Metal X
Components of blueprint plans to coordinate sheet metal work with other trades. Reading and interpreting specifications, mechanical plans, electrical plans, industrial plans and specialty plans. Basic principles of air-conditioning. Emphasizes air distribution, outlets, applied load estimating, commercial and residential load estimating, residential and commercial controls, and the metric system. Prerequisites: ITC 248, Indentured Apprentice with the Phoenix Sheet Metal Joint Apprenticeship and Training Committee.

ITC 250  (4)
Electrical Wiring V
Transformer types, construction connections, protection, one-line electrical drawings with symbols, capacitors, and rectifiers. The use of fuses for overcurrent protection in all types of electrical systems will be stressed. Types of conductors used in wiring systems including installation, current and fill capacities, and temperature ratings. In addition an in-depth look at receptacles, switches and other wiring devices will also be covered. Prerequisite: ITC 161. Four lecture. May be taken for S/U credit.

ITC 251  (4)
Electrical Wiring VI
Surveys the basic principals of refrigeration and air conditioning, NEC requirements, compressors, and HVAC control wiring and troubleshooting. Motor controls, single and multi-motor calculations, overcurrent protection, and overload protection are also covered as well as determining proper maintenance and troubleshooting applications. All classes of hazardous locations are covered including seals, components, and equipment approved for use in various locations. Prerequisite: ITC 250. Four lecture. May be taken for S/U credit.
ITC 260 (5)  Electrical Wiring VII
Survey of the NEC and cable manufacturer’s requirements for high voltage terminations and splices. Selection, calculation, assembly, and inspection of terminations and splices will be emphasized. Electrical calculations for service feeders, branch circuits, single and multi-motor circuits, conductor sizing, and overcurrent protection. Survey of basic electronic theory to form a basis for further study of electronic motor and HVAC controls and their related circuitry, cleaning, vibration testing, magnetic centering, testing and metering, power factor, testing running temperatures, and similar maintenance techniques. Operating principals of solid state controls are explained along with their practical applications. Motor braking, jogging, plugging, and safety inter locks are also covered. Prerequisite: ITC 251. Five lecture. May be taken for S/U credit.

ITC 261 (4)  Electrical Wiring VIII
The application for commercial, residential and manufacturing of signaling systems and electrical lighting for signs, highways, airports, and outlying areas. Calculate size and installation requirements for potential current, constant current, and shielded transformers. Survey of NEC installation requirements for electrical generators and storage batteries. Survey installation techniques of resistance heating elements, impedance heating, and skin effect heating. Prerequisite: ITC 260. Four lecture. May be taken for S/U credit.

ITC 298 (1–6)  Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an Instructional area under faculty supervision. One to six variable credit hours.

LDR 202 (2)  Leadership and Decision-Making
Exploration of goal-setting, decision-making, and time management as they relate to personal and organizational success. Pre- or co-requisite: LDR 201. One lecture; two lab. Fall, Spring.

LDR 203 (2)  Leadership and Communication
Development of communication skills, team-building strategies, and change management techniques. Pre-requisite: LDR 202. One lecture; two lab. Spring.

LDR 204 (2)  Leadership and Power
Exploration of the complexities inherent in ethical leadership, conflict resolution, the use of power, and the empowerment of others. Upon completion of LDR 204, students may request an Award of Completion. Pre- or co-requisite: LDR 203. Two lecture.

MAT—Mathematics

MAT 033 (1)  Math Workshop
Designed for students suffering from “math anxiety.” “Math anxiety” is defined, discussed and reduction techniques practiced. Study and test-taking skills. Co-requisite: Enrollment in a mathematics course. One lecture.

MAT 055 (3)  Arithmetic Review
Review of arithmetic skills, including fractions, decimals, percent, measurement, and geometry. Three lecture.

MAT 057 (3)  Mathematics for Health Occupations
Mathematics vocabulary, tools, and concepts needed in the health care workplace including fractions, metric, apothecary, and household measurements, ratios, proportions, and percents. Three lecture.

MAT 087 (4)  Beginning Algebra with Review
Basic algebraic concepts including operations with signed numbers, exponents and radicals, linear equations and inequalities, polynomials, and graphing. Prerequisite: MAT 055 or placement. Four lecture.

MAT 121 (4)  Intermediate Algebra with Review
Review of basic algebraic concepts, including exponents and radicals, systems of equations, polynomials, and graphing quadratic equations. Prerequisite: MAT 087, or placement. Four lecture.
MAT 124 (3)  
Technical Problem Solving  
Mathematics topics geared for technical degrees, including ratio, proportion, geometry, coordinate geometry, trigonometry and applications. Prerequisite: MAT 121 or placement. Three lecture.

MAT 130 (3)  
Mathematics for Elementary Teachers I  
Mathematical foundations of elementary school mathematics curriculum. Including problem solving, principles of whole numbers, integers, rational numbers, ratios, proportions and percentages. Emphasizes the use of models and manipulatives to increase understanding of the mathematical concepts. Pre- or co-requisite: MAT 142 or higher. Three lecture.

MAT 131 (3)  
Mathematics for Elementary Teachers II  
Mathematical foundations of the elementary school mathematics curriculum including measurement, geometry, probability and statistics. Emphasizes the use of models and manipulatives to increase understanding of the mathematical concepts. Prerequisite: MAT 130. Three lecture.

MAT 142 (3)  
Applications of College Algebra  
Designed to satisfy math requirements for most non-math and non-science majors. Students will examine social choice, management science, growth and symmetry, statistics, probability, and feasibility through the application of the algebra of functions, graphing, sequences and series, logarithms, and exponentials. Prerequisite: MAT 121 or placement. General Education: Mathematics. Three lecture.

MAT 151 (4)  
College Algebra  
College level algebra, including equations, functions, matrices, inequalities, sequences and series, and fundamental algebra theorems will be studied. Prerequisite: MAT 121 or placement. General Education: Mathematics. Four lecture.

MAT 160 (3)  
Introduction to Statistics  
Statistical tools and techniques used in research and general applications. Includes descriptive statistics, probability and probability distributions, point and interval estimates of population parameters, hypothesis testing, and correlation and regression. Prerequisite: MAT 142 or higher. General Education: Options. Three lecture.

MAT 172 (3)  
Finite Mathematics  
Various analytical methods used in business and social sciences, including algebraic review, functions and modeling, systems of linear equations, matrices, linear programming, mathematics of finance, probability, and combinations. Prerequisite: MAT 151 or placement. Three lecture.

MAT 187 (5)  
Pre-Calculus  
College level algebra and trigonometric topics to prepare for calculus. Functions, equations, and inequalities, matrices, trigonometry, and fundamental algebra theorems will be studied. Prerequisite: MAT 121 or placement. General Education: Mathematics. Five lecture.

MAT 212 (3)  
Business Calculus  
Integral and differential calculus with business and social science applications. Prerequisite: MAT 151 or higher, or placement. General Education: Mathematics. Three lecture.

MAT 220 (5)  
Calculus & Analytic Geometry I  
Limits, continuity, differential, and integral operations on algebraic and trigonometric functions and applications. Prerequisite: MAT 187 or placement. General Education: Mathematics. Five lecture.

MAT 230 (5)  
Calculus & Analytic Geometry II  

MAT 241 (4)  
Calculus & Analytic Geometry III  

MAT 262 (3)  
Differential Equations  
MAT 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

MCH—Machine Shop

MCH 110 (3)
Intro to Machine Shop
Overview of metal machine practices and shop safety designed to help the student have a better understanding of machine shop procedures. Two lecture; two lab. May be taken for S/U credit.

MCH 111 (3)
Level II Machining
Operation of machine shop tools including: engine lathe operation: set-up, cutting speeds and feed, threading tapers; milling operations: set-up, boring and gear cutting; CNC milling machine: programs in computer numerical control and set-ups. Two lecture; two lab. May be taken for S/U credit.

MIT—Manufacturing and Industrial Technology

MIT 140 (3)
Arc Welding I
Fundamentals of basic arc welding procedures, equipment, and safety techniques. Various arc welding tasks in the flat, horizontal, vertical-up, and overhead positions. Two lecture; two lab.

MIT 141 (3)
Arc Welding II
Advanced arc welding procedures, equipment, and safety techniques. Instruction in the selection of electrode, gas, cups, and filler rod for gas tungsten arc weld (GTAW) welding. Techniques and practice in welding butt-joint, t-joint, lap and corner joints in various positions and numerous cutting procedures. Prerequisite: MIT 140 or consent of instructor. Two lecture; two lab.

MIT 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

MSC—Military Science

MSC 101 (1)
Basic Military Science I
Studies the defense establishment and organization of the U.S. Army. Introduces military discipline, traditions, and historical perspectives. Studies the roles of the different branches of the U.S. Army in our nation’s defense. Includes training in marksmanship, field craft, rappelling, and first aid. One lecture.

MSC 102 (1)
Basic Leadership
This course is an introduction to problem solving, decision-making, leadership and helps students become more effective leaders and managers, whether they serve in the military or become leaders in civilian life. Topics addressed include problem solving and methods, critical thinking, leadership theory, followership, group cohesion, goal setting, and feedback mechanisms. One lecture.

MSC 130 (1)
Leadership Lab I
Studies military leadership through practical application and challenging outdoor activities. Includes training in troop-leading organizational procedures, how to prepare operation orders, how to perform basic tactical exercises, and how to prepare and give classes in an outdoor environment. This is in preparation for the Advanced Army ROTC Program and commissioning as an officer in the United States Army, Arizona National Guard, or United States Army Reserves. This course is offered in fall semester only. One lab.

MSC 131 (1)
Leadership Lab II
Studies military leadership through practical application and challenging outdoor activities. Includes training in troop leading organizational procedures, how to prepare operation orders, how to perform basic tactical exercises, and how to prepare and give classes in an outdoor environment. This is in preparation for the Advanced Army ROTC Program and commissioning as an officer in the United States Army, Arizona National Guard, or United States Army Reserves. This course is offered in spring semester only. One lab.

MSC 150 (1)
Army Physical Fitness I
Improves the physical fitness of students and develops a physical fitness program tailored to the student’s needs and abilities. The focus of the course is to develop personal knowledge of the components of a good fitness program, improve individual fitness levels through scheduled training, and gain an understanding of the U.S. Army physical fitness training (PT) and testing doctrine. The course is designed to train students to meet Army physical fitness standards. Includes training
MSC 204 (1)
Basic Military Skills
Studies the skills necessary to successfully navigate in diverse terrain with map and compass and to survive in the outdoors under various conditions with limited resource, taught through a combination of classroom instruction and practical exercises. Includes map reading and land navigation and wilderness survival and primitive living techniques. This course is offered in the spring semester only. One lecture.

MSC 230 (1)
Leadership Lab II
Studies military leadership through practical application and challenging outdoor activities. Includes training in troop leading organizational procedures, how to prepare operation orders, how to perform basic tactical exercises, and how to prepare and give classes in an outdoor environment. This is in preparation for the Advanced Army ROTC Program and commissioning as an officer in the United States Army, Arizona National Guard, or United States Army Reserves. This course is offered in fall semester only. One lab hour.

MSC 231 (1)
Leadership Lab II
Studies military leadership through practical application and challenging outdoor activities. Includes training in troop leading organizational procedures, how to prepare operation orders, how to perform basic tactical exercises, and how to prepare and give classes in an outdoor environment. This is in preparation for the Advanced Army ROTC Program and commissioning as an officer in the United States Army, Arizona National Guard, or United States Army Reserves. This course is offered in spring semester only. One lab hour.

MSC 250 (1)
Army Physical Fitness II
Improves the physical fitness of students and develops a physical fitness program tailored to the student’s needs and abilities. The focus of the course is to develop personal knowledge of the components of a good fitness program, improve individual fitness levels through scheduled training, and gain an understanding of the U.S. Army physical fitness training (PT) and testing doctrine. The course is designed to train students to meet Army physical fitness standards. Includes training in troop leading procedures in preparation for the Advanced Army ROTC Program and commissioning as an officer in the United States Army, Arizona National Guard, or United States Army Reserves. This course is offered in fall semester only. One lecture.
MSC 251 (1)
Army Physical Fitness II
Improves the physical fitness of students and develops a
duall fitness program tailored to the student's needs
and abilities. The focus of the course is to develop
personal knowledge of the components of a good fitness
program, improve individual fitness levels through
scheduled training, and gain an understanding of the
U.S. Army physical fitness training (PT) and testing
drill. The course is designed to train students to
meet Army physical fitness standards. Inclides training
in troop leading procedures in preparation for the
Advanced Army ROTC Program and commissioning as
an officer in the United States Army, Arizona National
Guard, or United States Army Reserves. This course is
offered in spring semester only. One lecture.

MUP—Music Performance

MUP 101 (2)
Piano for Non-Majors I
Basic techniques of piano playing, including some
literature. No prior piano experience required. One
lecture; two lab. May be taken for S/U credit.

MUP 102 (2)
Piano for Non-Majors II
Further instruction in beginning piano techniques.
Prerequisite: MUP 101 or consent of instructor. One
lecture; two lab. May be taken for S/U credit.

MUP 103 (2)
Piano for Non-Majors III
Advanced instruction in piano techniques. Prerequisite:
MUP 102 or consent of instructor. One lecture; two lab.
May be taken for S/U credit.

MUP 105 (1)
Voice Class I
Fundamentals of singing. Three lab. May be taken for
S/U credit.

MUP 107 (1)
Guitar I
Beginning instruction on guitar including open position
scales, arpeggios, modes, rhythm
accompanies, and the fundamentals of music theory,
ote-reading studies, and picking techniques. Instruction
in and exploration of basic classical and flamenco, folk,
country, blues, and rock styles. No guitars
provided. One lecture; one lab. May be taken for S/U
credit.

MUP 108 (2)
Guitar II
Second level instruction on guitar including moveable
position scales and arpeggios, moveable chord form,
melodic rhythm accompaniment, music theory, all major
keys, reading music and notation, picking variations.

Instruction in and exploration of more complex music
styles in classical and flamenco, folk, country, blues, and
rock. Prerequisite: MUP 107 or consent of instructor
(audition). One lecture; two lab. May be taken for S/U
credit.

MUP 110 (1)
Woodwind Ensemble
Rehearsal and public performance of standard ensemble
literature for woodwind instruments. Two lab. May be
taken for S/U credit.

MUP 111 (1)
Community Band
Performance group focusing on band music from the
popular literature of the Gay Nineties through the World
Wars, as well as music from Broadway and the theaters.
Two lab. May be taken for S/U credit.

MUP 113 (1)
Jazz Ensemble
Performance group focusing on jazz from 1900 to the
present. Works performed will depend on the
available instrumentation of the group and the choice of
the instructor. Two lab. May be taken for S/U credit.

MUP 117 (1)
Community Orchestra
Rehearsal and public performance of standard orchestral
literature. Two lab. May be taken for S/U credit.

MUP 120 (1)
String Ensemble
Rehearsal and public performance of standard ensemble
literature for string instruments. Two lab. May be taken
for S/U credit.

MUP 121 (1)
College Choir
Performance group with participation based on
auditions with the director. Attendance at all rehearsals
and participation in all public performances is required.
Two lab. May be taken for S/U credit.

MUP 125 (1)
Community Choir
Performance group focusing on choral music from the
popular literature of the Gay Nineties through the World
Wars, as well as music from Broadway and the theatres.
Two lab. May be taken for S/U credit.

MUP 128 (1)
Jazz Improvisation I
Basic jazz scales, chords, and rhythms, and jazz pieces
exemplifying these basics. Two lab. May be taken for
S/U credit.
**MUP 199 (0.5–6)**
**Music Performance Workshop**
Designed to provide workshop courses based on student and faculty interest in pursuing or presenting an original topic. Workshops may be developed to enhance existing curriculum or to give students experience that is not covered by existing curriculum. One-half to six variable credit hours.

**MUP 207 (2)**
**Guitar III**
Third level of instruction on guitar. Emphasis on playing techniques which combine scales, arpeggios, chords, rhythm and lead guitar patterns; control over rhythm patterns including triplet and sixteenth note exercises, syncopation, and constant base coordination. More intricate techniques applied to classical and flamenco, folk, country, blues, and rock styles of music. No guitars provided. Prerequisite: MUP 108 or consent of instructor (audition). One lecture; two lab. May be taken for S/U credit.

**MUP 209 (2)**
**Blues Guitar**
Introduction to a variety of blues guitar styles and techniques. Course will include blues rhythm and lead guitar techniques, finger picking and beginning slide guitar. Delta, Texas, Chicago styles, and others will be covered. No guitars provided. Prerequisite: MUP 108 or consent of instructor (audition). One lecture; two lab. May be taken for S/U credit.

**MUP 298 (1–6)**
**Special Topics**
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

**MUS—Music**

**MUS 090X (2)**
**Introduction to Music Theory**
Introduction and review of the fundamentals of music: reading, notation, rhythm, scales, intervals, triads, sight singing, and dictation. Four lab. May be taken for S/U credit.

**MUS 100 (3)**
**Music Appreciation**
Development of understanding and enjoyment of various musical forms and styles. Including an introduction to musical history. Relates concepts of music style and technique to those of other arts. General Education: Arts and Humanities. Three lecture.

**MUS 101 (1)**
**Private Music I**
Individual, self-paced instruction in piano, organ, voice, guitar, band, or orchestra instruments. One 30-minute lesson each week. Two lab.

**MUS 104 (1)**
**Class Piano I**
Piano techniques and music reading for music majors or intermediate-level piano students. Prerequisite: MUP 103 or consent of instructor. One lecture; one lab.

**MUS 120 (3)**
**Theory Preparation**
Review of the fundamentals of music: reading, notation, rhythm, scales, intervals, triads, sight singing, and dictation. Three lecture. May be taken for S/U credit.

**MUS 121 (2)**
**Harmony I**
Review of the fundamentals of music followed by study of diatonic melodies, chords, progression, inversion, voicing, voice leading, cadences, and non-chord tones. Prerequisite: MUS 120 or consent of instructor. Four lab. May be taken for S/U credit.

**MUS 130 (3)**
**Fundamentals of Music**
Basic elements of music including study of the staff, clefs, signatures, notes, rhythms, definitions, ear training, sight singing, and dictation. Three lecture.

**MUS 131 (3)**
**Sight Singing & Dictation I**
Introductory course in conceptualizing written diatonic melodies before hearing them (sight singing) and transcribing them into musical notation after hearing them (dictation). Prerequisite: MUS 120 or consent of instructor. Four lab. May be taken for S/U credit.

**MUS 145 (3)**
**Jazz History & Literature**
History and development of jazz music from its origin to the present day. General Education: Arts and Humanities. Three lecture.

**MUS 199 (0.5–6)**
**Music Workshop**
Designed to provide workshop courses based on student and faculty interest in pursuing or presenting an original topic. Workshops may be developed to enhance existing curriculum or to give students experience that is not covered by existing curriculum. One-half to six variable credit hours.
MUS 201 (3)  
Music History & Literature I  
Survey of music from the ancient world to the middle of the 18th century. Presents the growth of music through the contrapuntal schools, culminating in the works of J.S. Bach. The development of opera and oratorio and the rise of homophonic music are studied. Three lecture.

MUS 202 (3)  
Music History & Literature II  
Survey of music from the 18th century to the present. Study is devoted to the art of song, the nationalist schools, the principal composers of the classical, romantic, and modern periods, and to masterpieces of music of these periods. Three lecture.

MUS 207 (3)  
Music in America  
Develops listening skills and an understanding of how American geography, history, politics, and economics relate to the development of selected musical styles. Three lecture.

MUS 210 (3)  
Introduction to the Music Industry  
A detailed introduction to the business of the music industry. Includes the legal, marketing and other business aspects of the music and entertainment industry. Three lecture. May be taken for S/U credit.

MUS 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

NTR—Nutrition

NTR 135 (3)  
Human Nutrition  
Principles of nutrition in critical periods throughout the life cycle, diet in disease, and the essentials for the nutritional care of people suffering from various diseases. Prerequisites: CHM 090, CHM 130 or CHM 151. Three lecture.

NTR 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

NUR—Nursing

NAV 202 (4)  
Intermediate Navajo II  
Further development of speaking and writing communication skills with emphasis on compositions and readings of the Diné language. Taught in Navajo. Prerequisite: NAV 201 or consent of instructor. Four lecture.

NAV 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

NUR 110 (4)  
Nursing Assistant I  
Basic concepts common to all members of the health team in acute and long-term care settings. Basic principles of communication, nutrition, emergency care, medical terminology, environmental safety and comfort, and how ethical and legal aspects of health care apply. Basic nursing skills based upon fundamental nursing concepts in giving individualized client care. Students wishing to become a Certified Nursing Assistant must pass NUR 110 with a B or better and then complete NUR 111. Prerequisite: Appropriate reading placement score Three lecture; One lab.

NUR 111 (1)  
Nursing Assistant Clinical  
To provide students with the necessary clinical time required for application for state certification as a Certified Nursing Assistant. Students will practice basic concepts common to all members of the health team in acute and long-term care settings which include basic principles of communication, nutrition, emergency care, medical terminology, environmental safety and comfort, ethical/legal aspects of health care, basic nursing skills
based upon fundamental nursing concepts in giving individualized client care. Pre- or co-requisite: NUR 110 with a grade of B or better. Prerequisites: Current American Heart Association Health Care Provider CPR certificate; health requirements including evidence of TB testing within the past year, measles, mumps, and rubella immunization or titers. One lab. May be taken for S/U credit.

NUR 114 (3) Nursing Pharmacology
This course examines the use of the nursing process in the safe administration of medication. Basic principles of pharmacotherapeutics, pharmokinetics, and pharmacodynamics will be addressed. Includes nursing implications of selected peri-operative medications. Prerequisite: Admission to the nursing program. Pre or Co-requisites: BIO 201, PSY 101. Co-requisites: NUR 116. 75 Lecture, 75 Lab, Fall

NUR 116 (8) Foundations of Nursing
This introductory nursing course focuses on the core components of nursing practice and emphasizes caring as the essence of nursing. Content includes professional roles of the nurse, nursing process, critical thinking, assessment, communication, and nursing skills. Prerequisites: Admission to the nursing program. Pre or Co-requisites: BIO 201, PSY 101. Co-requisites: NUR 114, Four lecture; Twelve lab. Fall.

NUR 122 (9) Adult Nursing
This course focuses on the utilization of the nursing process and critical thinking in the care of clients with common alterations in basic needs. Continuing emphasis is placed on the core components of nursing practice. Clinical experiences will provide the student with opportunities to care for clients with common alterations in basic needs. Prerequisites: NUR 114, NUR 116, BIO 201, PSY 101. Pre or Co-requisites: BIO 202, PSY 240. Five lecture; twelve lab. Spring.

NUR 125 (3) Transition to Practical Nursing
This course focuses on the role and scope of practice of the practical nurse. Includes nursing care of childbearing clients, children and families, and clients with alterations in mental health. Prerequisite: NUR 114, NUR 116, NUR 122, BIO 201, BIO 202, PSY 101, PSY 240. Two Lecture; Three Lab. Summer.

NUR 130 (3) Transition to Professional Nursing
This course is designed for Licensed Practical Nurses admitted to the nursing program with advanced placement. The course focuses on scope of practice issues for registered nurses and the core components of professional nursing practice. Includes nursing care of clients with common alterations in basic needs. Prerequisite: Admission to the nursing program; current licensure as a Licensed Practical Nurse; BIO 201, BIO 202, PSY 101, PSY 240. Pre or Co-requisites: ENG 101. Two Lecture; Three Lab. Summer.

NUR 210 (3) Mental Health Nursing
This course focuses on the client and family with alterations in mental health. Continuing emphasis on the core components of nursing practice. Clinical experiences will provide opportunities for students to care for clients and families experiencing alterations in mental health. Pre-requisites: NUR 114, NUR 116, and NUR 122, or NUR 130, and completion of all first year general education courses. Pre or Co-requisites: BIO 205, ENG 102. Co-requisites: NUR 212. NUR 214. 1.5 lecture; 4.5 lab. Fall.

NUR 212 (3) Nursing the Childbearing Family
This course focuses on the nursing care of the childbearing family. Continuing emphasis on the core components of nursing practice. Clinical experiences provide opportunities for students to care for childbearing clients, neonates, and families. Prerequisites: NUR 114, NUR 116, and NUR 122, or NUR 130, and completion of all first year general education courses. Pre or Co-requisites: BIO 205, ENG 102. Co-requisites: NUR 210, NUR 214. 1.5 Lecture; 4.5 Lab. Fall.

NUR 214 (3) Nursing of Children
This course focuses on the nursing care of the child from birth to adolescence. Continuing emphasis on the core components of nursing practice. Clinical experiences will provide opportunities for students to care for children and families. Prerequisites: NUR 114, NUR 116, and NUR 122, or NUR 130, and completion of all first year general education courses. Pre or Co-requisites: ENG 102, BIO 205. Co-requisites: NUR 210, NUR 212. 1.5 Lecture; 4.5 Lab. Fall.

NUR 220 (7) Advanced Nursing
This course focuses on the utilization of the nursing process and critical thinking in clinical decision-making in the care of the client with complex, multi-system alterations in basic needs. Clinical experiences will provide opportunities for students to care for clients with complex, multi-system alterations in basic needs. Prerequisites: NUR 210, NUR 212, NUR 214. Pre or Co-requisites: 6 credit hours of humanities. Co-requisite: NUR 224. Four lecture; Nine lab. Spring.
NUR 224 (4)  
Nursing Management  
This is the culminating course in the associate degree nursing program and emphasis is placed on synthesis and application of clinical decision-making in the management of a group of clients. Includes concepts related to management, leadership, and entry into practice. Students will participate in a capstone clinical experience with a clinical preceptor. Prerequisites: NUR 210, NUR 212, NUR 214. Pre or Co-requisites: 6 credit hours of Humanities. Co-requisite: NUR 220. One lecture; Nine lab. Spring.

NUR 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

OIS—Office Information Systems

OIS 100 (1)  
Keyboarding  
Touch-method skills while keyboarding on a ten-key or computer keyboard. One lecture; one lab.

OIS 110 (3)  
Keyboarding Review & Speed  
Keyboarding skills with specific word processing and general computer application skills. Review touch method skills. Elementary keyboarding skills recommended. Three lecture. May be taken for S/U credit.

OIS 130 (3)  
Machine Transcription  
Transcribing business correspondence and documents from machine dictation with speed and accuracy. Emphasizes improving business grammar and proofreading techniques. Prerequisites: OIS 110 or consent of instructor, and CIS 122 or CIS 120. Three lecture.

OIS 200 (3)  
Professional Office Skills  
Standard office procedures including specific practical skills needed in technical and computer knowledge, office support activities, communication, decision-making, and career employment and advancement. Prerequisite: OIS 110 or consent of instructor. Three lecture.

OIS 210 (3)  
Keyboarding with Applications  
Emphasis on keyboarding, specific word processing, and formatting skills needed for personal and workplace communications. Speed and accuracy is required in all document production activities. Prerequisite: OIS 110 or consent of instructor. Three lecture. May be taken for S/U credit.

OIS 230 (3)  
Medical Transcription  
Terminology used in a medical office with emphasis on preparing medical documents accurately and developing transcription skills using transcription machines. Prerequisites: OIS 130 or consent of instructor, and AHS 131. Three lecture. May be taken for S/U credit.

OIS 240 (3)  
Legal Transcription  
Terminology used in a legal office with emphasis on preparing legal documents accurately and developing transcription skills using transcription machines. Prerequisite: OIS 130 or consent of instructor. Three lecture. May be taken for S/U credit.

OIS 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

PAR—Paralegal Studies

PAR 100 (3)  
Introduction to Paralegal Studies  
Introduction and definition of the role of the paralegal in today’s legal system. This will include federal, state and tribal legal systems, ethics, professional regulation and responsibilities. In-depth legal analysis and basic legal concepts are included. Three lecture.

PAR 104 (3)  
Wills, Trusts & Probate  
Issues, roles, legal requirements and research recourses in estate planning administration and adjudication. Prerequisites: ENG 101 and PAR 100 or consent of department chair. Three lecture.

PAR 105 (2)  
Legal Computer Applications  
Introduction to legal computer applications including billing, document assembly, litigation support, and research. Prerequisite: ENG 101 and PAR 100 or consent of department chair, and CIS 122 or equivalent. Two Lecture.

PAR 203 (3)  
Family Law  
Legal aspects of domestic matters and family relationships. Emphasis on dissolution of marriage, community property, adoption, and child custody. Prerequisites: ENG 101 and PAR 100 or consent of department chair. Three lecture.
PAR 209 (2)  Administrative Law
Laws and procedures relating to powers and controls of agencies, which administer governmental services. Agency purposes, procedures, enabling acts, and rights of private parties. Prerequisites: ENG 101 and PAR 100 or consent of department chair. Two lecture.

PAR 210 (2)  Bankruptcy Procedures
Procedures for individual and business bankruptcy proceedings. Preparation of basic bankruptcy documents and review of creditor and debtor remedies under the bankruptcy laws. Prerequisites: ENG 101 and PAR 100 or consent of department chair. Two lecture.

PAR 215 (3)  Legal Research Writing I
Principles and techniques for conducting legal research. Emphasis placed on the sources of law, utilization of both primary as well as secondary sources. Extensive practice in writing research documents. Three lecture.

PAR 216 (3)  Legal Research Writing II
Application of research and writing skills preparing complex legal documents including summary judgment motion and appellate brief preparation. Prerequisites: PAR 215. Three lecture.

PAR 220 (3)  Civil Tort Litigation I
Principles and procedures of civil litigation. Jurisdiction and venue, parties to action, and pleadings. Introduction to drafting of documents from inception of civil action through the pleading stage, up to trial. Co-requisite: PAR 215. Three lecture.

PAR 221 (3)  Civil Tort Litigation II
Study of the civil litigation process. Includes trial preparation, trial, evidence, and appeal. Prerequisite PAR 220. Three lecture.

PHE—Physical Education

PHE 220 (2)  Water Safety Instructor
Water safety techniques leading to certification by the American Red Cross. Two lecture.

PHE 229 (2)  First Aid & CPR
Procedures and techniques in first aid, leading to the acquisition of the American Red Cross Emergency Response Certificate and the CPR for the Professional Rescuer Certificate. Two lecture. May be taken for S/U credit.

PHE 298 (1–6)  Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

PHI—Philosophy

PHI 101 (3)  Introduction to Philosophy
Philosophical readings, discussion, and analysis on topics including metaphysics, truth, knowledge, and ethics. General Education: Arts and Humanities. Special Requirements: Contemporary Global/International Awareness or Historical Awareness. Three lecture.

PHI 103 (3)  Introduction to Logic
The systematic study, with emphasis on analysis and evaluation, of arguments. Topics will include both classical and current arguments from various disciplines of study. Three lecture.

PHI 105 (3)  Introduction to Ethics

PHI 235 (3)  Introduction to Feminist Theory
Exploration of feminist theories and feminist worldviews. Special emphasis on gender images and roles in traditional philosophical texts, historical overview of the development of feminist theory, and conflicts within contemporary feminist theory. Three lecture.
PHI 245 (3)
Introduction to Eastern Philosophy
This course is an examination of the historical
development of fundamental theories in Eastern
thought. Focusing on Indian, Chinese, and Japanese
epistemology, ethics, metaphysics; includes comparison
of eastern and western philosophies and thinkers.
Prerequisite: ENG 101 or consent of instructor. Three
lecture; three lab.

PHI 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with
interest in pursuing an original topic in an instructional
area under faculty supervision. One to six variable credit
hours.

PHY—Physics

PHY 111 (4)
College Physics I
Algebra-based study of motion, static and dynamic
mechanics, waves and sound. Prerequisites: MAT 187.
General Education: Physical and Biological Sciences.
Three lecture; three lab.

PHY 112 (4)
College Physics II
Algebra-based study of electricity and magnetism, light,
optics, and atomic structure. Prerequisite: PHY 111.
General Education: Physical and Biological Sciences.
Three lecture; three lab.

PHY 161 (4)
University Physics I
First semester calculus-based physics course designed
for pre-engineering and pre-science majors. Mechanics,
motion, statics and dynamics, work, power and energy,
impulse, and momentum will be studied. Prerequisites:
MAT 220. General Education: Physical and Biological
Sciences. Three lecture; three lab.

PHY 180 (4)
Introduction to Astronomy
Motion and structure of the sun, planets, constellations,
comets, asteroids, and meteors. Cosmic explosions,
quasars, and stellar evolution including white dwarfs,
eutron stars and black holes. Lab component requires
numerous night observations. General Education:
Physical and Biological Sciences. Three lecture; three lab.

PHY 253 (4)
Archaeoastronomy
Examination of how pre-historical societies used
celestial movements to anticipate ceremonial and
survival activities. Concentrates on motions of the sky,
research methodologies and cultural interpretation of
sites. Field trips. Co-requisite: MAT 151 or consent of
instructor. General Education: Physical and Biological
Sciences. Special Requirements: Ethnic/Race/Gender
Awareness, Contemporary Global/International
Awareness or Historical Awareness. Three lecture;
three lab.

PHY 262 (4)
University Physics II
Second semester calculus-based physics course. Topics
include electrostatic phenomena, conductors, electric
and magnetic fields, resistance, capacitance, and other
basic circuit components and analysis, and magnetic
forces and currents. Prerequisite: PHY 161. Pre- or co-
requisite: MAT 230. General Education: Physical and
Biological Sciences. Three lecture; three lab.

PHY 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with
interest in pursuing an original topic in an instructional
area under faculty supervision. One to six variable credit
hours.

POS—Political Science

POS 101 (3)
Introduction to Politics
Issues in contemporary political analysis, human values,
and political goals; how governments differ and change;
relationship between individuals and government; how
nation-states influence one another. General Education:
Social and Behavioral Sciences. Special Requirements:
Ethnic/Race/Gender Awareness. Three lecture.

POS 110 (3)
American National Government
Introduction to the American national government;
constitutional and philosophical foundations,
federalism, structure and evolution of the federal
government, and recent trends and issues in the federal
government. General Education: Social and Behavioral
Sciences. Three lecture.

POS 120 (3)
Introduction to World Politics
Introduction to the international system, its actors and
their capabilities; international political economy; ends
and means of foreign policy; international cooperation,
tension, and conflict. General Education: Social and
Behavioral Sciences. Special Requirements:
Contemporary Global/International Awareness or
Historical Awareness. Three lecture.

POS 140 (3)
Introduction to Public Administration
Political context of American public administration,
alternative frameworks for the analysis of the policy
process in government agencies, the budgetary process,
accountability and responsibility in government,
bureaucratic politics, and administrative reform and
reorganization. Three lecture.
POS 201  (3)
Introduction to Political Ideologies
Political ideas and belief systems, including liberalism, conservatism, Marxism, fascism, and feminism: the functions of ideology for the individual and society. Three lecture.

POS 220  (3)
Arizona & National Constitution

POS 221  (1)
Arizona Constitution & Government
Arizona Government and Constitution designed to meet the requirements for Arizona state teaching certification. One lecture.

POS 222  (2)
National Constitution & Government
United States Government and Constitution designed to meet the requirements for Arizona state teaching certification. Two lecture.

POS 233  (3)
Global Environmental Politics
International environmental policies, issues and concerns involving environmental ethics, resource use, global environmental divisions, ecological degradation, biodiversity and other global changes. General Education: Social and Behavioral Sciences. Special Requirements: Contemporary Global/International Awareness OR Historical Awareness. Three lecture.

POS 298  (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

PSY—Psychology

PSY 102  (3)
Personal Growth & Development
Adjustment problems such as marriage, work, anxiety, and prejudice. Contemporary sources of stress such as alcohol and drug abuse, violence against women, sexual dysfunction, aging, job hunting, career decisions, and other issues. Three lecture.

PSY 205  (3)
Introduction to Abnormal Psychology
Distinguishes between normal behavior and psychological disorders. Subjects may include stress disorders, problems with anxiety and depression, unusual and abnormal sexual behavior, schizophrenia and addictive behaviors. Causes and treatments of psychological problems and disorders are discussed. Prerequisite: PSY 101. Three lecture.

PSY 227  (3)
Personality Development
Survey and comparison of different personality theories, including the dynamics that underlie personality development, assessment, and research. Prerequisite: PSY 101. General Education: Social and Behavioral Sciences. Three lecture.

PSY 230  (3)
Introduction to Statistics
Basic concepts in descriptive and inferential statistics, emphasizing application to the behavioral sciences. Includes methods of data collection, sampling techniques, central tendency, standard scores, correlation and regression, and hypothesis testing. Student’s t test, non-parametric analysis, and analysis of variance. Prerequisite: MAT 142 or higher, or placement. Three lecture.

PSY 234  (3)
Child Development
Genetic, prenatal, and postnatal influences on the development of the child, emphasizing motivation, learning and perception. Prerequisite: PSY 101 or consent of instructor. Three lecture.

PSY 236  (3)
Psychology of Women
Cross-cultural study of the definition, trends, and issues of the psychological status of women by examining and evaluating theories of psychology, as well as operative forces behind women’s role in society. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture.

PSY 240  (3)
Developmental Psychology
Life span development, including the scientific study of normal physiological, emotional, cognitive, and social development and the factors that influence this development, from conception until death. Prerequisite: PSY 101. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture.
PSY 241 (3)
Substance Abuse
Physical, social, and psychological effects of substance abuse. Three lecture.

PSY 250 (3)
Social Psychology
Introduction to the study of social psychological processes including those of persuasion and conformity, leadership and dominance, aggression and altruism, attraction and friendship formation, attitude formation and change, intercultural encounters and nonverbal behavior. Prerequisite: PSY 101. Pre- or co-requisite: ENG 102. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness; Contemporary Global/International Awareness or Historical Awareness; Intensive Writing/Critical Inquiry. Three lecture.

PSY 280 (3)
Introduction to Health Psychology
A survey of the contributions of psychology to health promotion and maintenance, illness prevention and treatment, and related health issues. Prerequisite: PSY 101. Three lecture.

PSY 290 (4)
Research Methods in Psychology
Introduction to the scientific methodologies employed in the study of psychology. This course will require student involvement in the reviewing and analyzing of scientific literature, designing and conducting experiments, collecting and analyzing data, interpreting results, and reporting experimental findings using APA format. Prerequisites: PSY 101 and PSY 230. Co-requisite: ENG 102. Three lecture; three lab.

PSY 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

REL 202 (3)
New Testament

REL 203 (3)
Old Testament (Hebrew Bible)
An examination of the Old Testament canon, which formulates the Hebrew Bible, together with a study of ancient Near Eastern backgrounds. Three lecture.

REL 241 (3)
Asian Religions
An examination of Hinduism, Buddhism, Jainism, Sikhism, Confucianism, Taoism, and Shintoism, including their respected myths, symbols, rituals, doctrines, moral codes and artistic expressions. Three lecture.

REL 298 (1-6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

RES—Real Estate

RES 101 (3)
Real Estate Principles
National and Arizona real estate requirements, real estate business, real estate law, agency, contracts, ownership, legal descriptions, title, finance, listing, and leases. Three lecture.

RES 102 (3)
Real Estate Practices
National and Arizona real estate requirements, property management, appraisals, land use, fair housing, real estate investment, closings, and real estate mathematics. Three lecture.

RES 105 (3)
Real Estate Law
Legal concepts of real estate land description, real estate property rights, estates in land, contracts, conveyances, encumbrances, foreclosures, recording procedures, and evidence of title. Three lecture.

RES 106 (3)
Real Estate Appraisal
Purpose and function of an appraisal, determinants of value, and appraisal case studies. Emphasizes cost, market data, and income approaches to value estimates including correlation and report writing. Prerequisite: BUS 100 or consent of instructor. Three lecture.
RES 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

SOC—Sociology

SOC 101 (3)
Introduction to Sociology

SOC 125 (3)
Domestic Violence

SOC 130 (3)
Human Sexuality
Sociological, biological, psychological, and cultural factors which influence human sexuality, including ethics, gender roles, and changing values in contemporary society. Three lecture.

SOC 132 (3)
Social Problems

SOC 140 (3)
Marriage & the Family
Helps prepare students to improve the quality of individual and family life. Includes parent-child relationships, parenting roles, marital violence, and aspects of divorce. Three lecture.

SOC 142 (3)
Race & Ethnic Relations
Sociological perspectives and theories on race and ethnic relations including: contemporary and historical racial and ethnic intergroup relations, cultural origins, developments, and problems experienced by minority groups. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness. Three lecture.

SOC 200 (3)
Women & Health
Designed to empower women by enabling them to make accurate decisions regarding their health. Aspects of health and health-related topics germane to political, cultural, and socio-economical issues as they relate to women. Three lecture.

SOC 210 (3)
Sociology of Gender
Overview of theories of gender development; examination of social, cultural, political, and economic conditions affecting the experience of gender; and exploration of issues involved in the different roles and expectations placed on women and men in various cultures at different periods in history, with particular emphasis on contemporary American culture. General Education: Social and Behavioral Sciences. Special Requirements: Ethnic/Race/Gender Awareness; Intensive Writing and Critical Inquiry. Pre- or co- requisite: ENG 102. Three lecture.

SOC 220 (3)
Introduction to Social Work
An introduction to the fields within the area of social work through a study of the disciplines of social case work, social group work, and community organization and opportunities to experience the various techniques of practice within each discipline. Prerequisite: ENG 101. Three lecture.

SOC 236 (3)
Crime & Delinquency
Deviance in American society, emphasizing the extent of crime, crime trends, types of crime and criminals, theories and factors in crime causation, the impact of crime on society and the individual, and the relationship between social variables and crime. Three lecture.

SOC 285 (3)
Health Care Systems
Predominant health care systems in the U.S. including Medicare and Medicaid. Examines the availability and utilization of various resources, as well as ethics and quality of care. Three lecture.

SOC 296 (3)
Internship
Opportunity to gain experience in applying knowledge and skills in an appropriate setting. Three lecture; three lab.

SOC 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.
SPC — Speech

SPC 100 (3)
Fundamentals of Speech Communication

SPC 298 (1–6)
Special Topics
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.

THR — Theatre

THR 101 (3)
Introduction to Theatre
A survey of theatre, introducing basic elements and principles of production, styles and/or historical perspectives of theatre, dramatic literature and criticism. General Education: Arts and Humanities. Three lecture. May be taken for S/U credit.

THR 110 (3)
Acting I
The fundamental techniques of acting are explored through physical and vocal expression, improvisation and scene work with an emphasis on the performer’s approach to characterization. Three lecture. May be taken for S/U credit.
THR 120 (3)  
Oral Interpretation of Literature  
Through movement and voice, students will interpret, and perform, the characters, situations, and magic of poetry, prose, and plays found in the texts of fine authors. This course is suitable for actors, writers, teachers and others who appreciate reading and performing by this art form. Three lecture. May be taken for S/U credit.

THR 130 (3)  
Children's Theater  
This course introduces the student to children's theater by providing a hands-on performance opportunity through improvisation and acting. This course is suitable for teachers, actors, writers, and others who enjoy working with children. Three lecture. May be taken for S/U credit.

THR 199 (0.5–6)  
Theater Workshop  
Designed to provide workshop courses based on student and faculty interest in pursuing or presenting an original topic. Workshops may be developed to enhance existing curriculum or to give students experience that is not covered by existing curriculum. One-half to six variable credit hours. May be taken for S/U credit.

THR 210 (3)  
Acting II  
The fundamental techniques of acting are further explored through script analysis, rehearsal and in-class performance of scenes with emphasis on various styles. Prerequisite: THR 110 or consent of instructor. Three lecture. May be taken for S/U credit.

THR 220 (3)  
Actors Workshop  
Advanced acting techniques are explored through script analysis, character development and rehearsal with theater professionals culminating in public theatrical performance. Prerequisite: Successful audition. One lecture; five lab. May be taken for S/U credit.

THR 298 (1–6)  
Special Topics  
Designed to meet the needs of an individual(s) with interest in pursuing an original topic in an instructional area under faculty supervision. One to six variable credit hours.
**Course Descriptions**

Quick Reference to Course Prefixes

The following prefixes are used in course descriptions at CCC and are listed in alphabetical order.

<table>
<thead>
<tr>
<th>ACC</th>
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<td>AFB</td>
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Admission and Registration

Admission Information

Admission Requirements
Coconino Community College is open to any person for either regular or special admission if that person satisfies one of the following categories established by the State Board of Directors for the Community Colleges of Arizona (R7-1-301):

Eligible for “Regular Student” Admission (501.1)
• A graduate of a high school which is accredited by a regional accrediting association as defined by the United States Office of Education or approved by a state board of education or other appropriate state educational agency, or
• A person who has completed a GED certificate of high school equivalency, or
• A transfer student in good standing from another college or university, or
• A mature person who is 18 years of age or older and demonstrates evidence of potential to succeed at CCC. (A student admitted in this category who is not a high school graduate or a GED completor will be encouraged to attain a GED prior to completion of 15 hours at CCC.) Mature student applicants may be required to complete testing and other assessment activities designed to help the College determine their ability to benefit from college-level instruction. They are restricted to enrollment of 12 credit hours or fewer each semester with advisor approval required.

Eligible for “Special Student” Admission (501.2)
• A student not meeting any of the provisions for “Regular Student” Admission (listed above) may be admitted on an individual basis with the approval of College officials and, as appropriate, the consent of parents and recommendation of the student’s school. This includes, but is not limited to, students under 18 and those still enrolled in high school. For students still enrolled in high school, completion of the 10th grade is a requirement for admission as a special student.
• A special student must meet the established requirements of the course(s) for which he/she chooses to enroll, and college officials must determine that admission is in the best interest of the student. For example, a special student seeking admission to attend an algebra class must be qualified to enter a mathematics course at that level; qualification in this case would be determined by a placement examination, or ACT/SAT scores and high school grades.

• A student who is under age 18 and scores a composite of 22 or higher on the American College Test (ACT), or a composite (verbal and mathematics) of 930 or more on the Scholastic Aptitude Test (SAT) may be admitted. A student who shows evidence of such test scores shall not be denied admission because of age, lack of a high school diploma or high school certificate or equivalency (GED), grade in school, lack of permission of school officials, or lack of concurrent enrollment in public or private school. However the College requires parental permission for those under the age of 18. A student admitted in this category is not guaranteed admission to a specific degree program or to all courses offered by the College and may enroll for a maximum of 6-8 credit hours unless special arrangements have been made and approved prior to the registration period.
• All special student applicants should contact Admissions and Records for more information and required forms.
• Applicants with status “SP” are limited to 6-8 credit hours or two classes; advisor approval is required.

Admission Procedures
International Students (501.3)
At present, Coconino Community College is not approved as a study site for students who are not United States citizens except persons lawfully admitted to the United States as immigrants. CCC is not authorized to issue I-20 documents nor will full-time attendance at CCC by a non-citizen satisfy F-1 student status. International students with a visa status other than F-1, as well as those F-1 visa students attending and in status at Northern Arizona University, may be eligible for limited study at CCC. A minimum TOEFL score of 450 is required. Contact Admissions and Records for further information.

Residency Requirements (501.2)
Coconino Community College determines a student’s residency status for tuition purposes based upon information supplied on college applications, affidavits, and additional information provided by the student. CCC notifies a student of his/her residency status upon admission. Appeals or questions regarding residency status should be directed to Admissions and Records or the College Registrar.

Residency Procedures (501.2.1)
The following guidelines concerning the determination of residency for tuition purposes are the result of existing Arizona law and regulations of the State Board of Directors for Community Colleges of Arizona, which are subject to Arizona Statutes. Students having difficulty in determining their residency should contact Admissions and Records for further explanation.
• Each applicant shall have the question of legal residence determined at the time of admission. Registration and payment of fees will be in accordance with the residency assigned at the time of official admission. The admission letter mailed to the student's last known address shall be considered official notice of the student's residency for tuition purposes.

• The Registrar/Director for Admissions is responsible for making the initial domicile classification. The College may consider all evidence, written or oral, presented by the student and any other relevant information received from any source. The College may request written or sworn statements or sworn testimony of the student.

• An appeal of the initial classification may be made to the Registrar/Director for Admissions. The appeal must be in writing, signed by the student, and accompanied by a sworn statement of all relevant facts. The appeal must be filed with Admissions and Records within ten days of notification of residency classification. Failure to properly file a request for review within the prescribed time limit constitutes a waiver of review for the current enrollment period.

Definition of Terms (501.2.2)
Armed Forces of the United States
The Army, the Navy, the Air Force, the Marine Corps, the Coast Guard, the commissioned corps of the United States Public Health Service and the National Oceanographic and Atmospheric Association.

Continuous Attendance
Enrollment at an Arizona educational institution for a normal academic year since the beginning of the period for which continuous attendance is claimed is continuous attendance. Enrollment in summer sessions or other such intersessions beyond the normal academic year is not required in order to maintain continuous attendance.

Domicile
A person's true, fixed and permanent home and place of habitation. It is the place where one intends to remain and to which one expects to return when one leaves without intending to establish a new domicile elsewhere.

Emancipated Person
A person who is neither under a legal duty of service to parents, nor entitled to the support of such parents under laws of the state.

Parent
Father or mother, custodial parent, or legal guardian of an emancipated person. Circumstances must not indicate that guardianship was created primarily for the purpose of conferring the status of an instate student on the emancipated person.

In-State Student Status (501.2.3)
• Except as otherwise provided in this article, no person having a domicile elsewhere than in this state is eligible for classification as an instate student for tuition purposes.

• A person is not entitled to classification as an instate student until domiciled in this state for one year (previous twelve months) unless he/she meets one of the following requirements:

• His/her parent's domicile is in this state and that parent is entitled to claim him/her as an exemption for state and federal tax purposes.

• He/she is an employee or spouse of an employee transferred to this state for employment purposes.

• The domicile of an emancipated person is that of his/her parent.

• An emancipated person, while in continuous attendance toward the degree for which currently enrolled, does not lose instate classification if his/her parent moves from this state.

• A person who is a member of the armed forces of the United States stationed in the state pursuant to military orders or his/her the spouse or dependent child (as defined in Section 43-1001) is entitled to classification as an instate student. The student, while in continuous attendance toward the degree for which currently enrolled, does not lose instate student classification.

• A person who is a member of an Indian tribe recognized by the United States Department of the Interior whose reservation land lies in the state and extends into another state and who is a resident of the reservation is entitled to classification as an instate student.

Alien In-State Student Status (501.2.4)
An alien resident is entitled to classification as an instate refugee student if such person has been granted refugee status in accordance with all applicable laws of the United States and has met all other requirements for domicile.

Presumptions Relating to Student Status (501.2.5)
Unless the contrary appears to the satisfaction of the registering authority of the community college at which a student is registering, it shall be presumed that:

• No emancipated person has established a domicile in the state while attending any educational institution in this state as a full time student, as such status is defined by the State Board of Directors for Community Colleges.

• Once established, a domicile is not lost by mere absence unaccompanied by intention to establish a new domicile.

• A person who has been domiciled in this state immediately prior to becoming a member of the Armed Forces of the United States shall not lose instate status by reason of his/her presence in any other state or country while a member of the Armed Forces of the United States.
Western Undergraduate Exchange (WUE) Program
WUE is the Western Undergraduate Exchange, a program coordinated by the Western Interstate Commission for Higher Education (WICHE). Through WUE, students in western states may enroll in many two-year and four-year college programs at a reduced tuition level: 150 percent of the institution's regular in-state resident tuition. In all cases, WUE tuition is considerably less than nonresident tuition.

If the student is a legal resident of Alaska, Colorado, Hawaii, Idaho, Montana, Nevada, New Mexico, North Dakota, Oregon, South Dakota, Utah, Washington, or Wyoming then they are qualified for this program. Mark the appropriate residence code on the application for admission form to be declared a WUE student.

Registration Information (501.3)
Students should register for classes in accordance with calendars and procedures published in the appropriate Schedule of Classes. To participate in registration, new students must have completed an application for admission. Students in the following categories are admitted conditionally pending receipt of documents verifying or clarifying their status (see also Admission Information). Categories include: high school graduates; GED completion; transfer students; mature students (without high school diploma or GED); students on academic probation at a previous college; students on academic suspension at a previous college; and “special” students especially those taking classes while still enrolled in high school. Students in the foregoing categories who do not provide required documents may be barred from participation in future registrations.

Academic Load (501.3)
Semester
The normal full-time academic load is defined as 12 credit hours per semester. A student may take no more than 18 credit hours in a single fall or spring semester without prior approval. A student with a grade point average of 3.00 or better for 12 or more credit hours during one semester or summer session is eligible to petition to the Registrar/Director for Admissions to carry in excess of the 18 hour maximum. Exceptions to this procedure may be considered on a case-by-case basis.

Summer
Summer classes are intensive; therefore, the recommended maximum academic load for the entire summer is 12-credit hours. A student with a grade point average of 3.00 or better for 12 or more credit hours during one semester or summer session is eligible to petition to the Registrar/Director for Admissions to carry in excess of the 18 hour maximum. Exceptions to this procedure may be considered on a case-by-case basis.

Add/Drop Procedures (501.3)
Fall and Spring Semester
In accordance with calendars and procedures in the appropriate Schedule of Classes, students may make adjustments in their registered schedules by dropping and/or adding classes. Students may drop without a “W” (withdrawal) being recorded on their transcript prior to, and including, the 45th calendar day. On the 46th calendar day, and thereafter, a student drop will be recorded on the transcript as a “W” (withdrawal). A student may initiate a withdrawal prior only to the last two weeks of instruction of the semester. Written petitions for exception to this procedure may be presented to the Registrar/Director for Admissions for action. The instructor may drop or withdraw students for nonattendance at the first class session or for unexcused absences. See Academic Procedures: Attendance, for more information.

Summer Session
In accordance with calendars and procedures in the appropriate Schedule of Classes, students may make adjustments in their registered schedules by dropping and/or adding classes. Students may drop without a “W” (withdrawal) being recorded on their transcript no later than the 7th calendar day after the beginning of the session. On the 8th calendar day and thereafter, a student drop will be recorded on the transcript as “W” (withdrawal). A student may initiate a withdrawal prior only to the last two weeks of instruction of the summer session. Written petitions for exception to this procedure may be presented to the Registrar/Director for Admissions or designee for action. The instructor may drop or withdraw students for nonattendance at the first class session or for unexcused absences. See Academic Procedures: Attendance, for more information.

Short Courses
Registration for short courses (those meeting less than a full semester in fall or spring, less than a full summer session, or pre- and post-sessions) will be accepted prior to the first class meeting. Short courses may be added, with the approval of the instructor, prior to the second class meeting. If a short course is dropped once the class has begun, a “W” (withdrawal) will be recorded on the student transcript. A student may initiate a withdrawal prior only to the last one-third of the class meeting dates. Written petitions for exception to this procedure may be presented to the Registrar/Director for Admissions or designee for action. The instructor may withdraw students for nonattendance at the first class session or for unexcused absences. See Academic Procedures: Attendance, for more information.
Withdrawal from Class (501.3)
The terms “withdrawal” and “drop” refer to actions which terminate the student’s class enrollment. If a drop occurs prior to, or on, the 45th calendar day of a regular full semester, no record will appear on the student’s transcript. However, a student who drops a class on the 46th calendar day of a regular full semester or later will be assigned a “W” (withdrawal) on the student transcript. A student may also be dropped (assigned a “W”) by the instructor for nonattendance.

If a short course is dropped once the class has begun, a “W” (withdrawal) will be recorded on the student transcript. Written petitions for exception to this procedure may be presented to the Registrar/Director for Admissions or designee for action.

A student who withdraws or is withdrawn from all classes is required to process the withdrawal through Financial Aid Services and Admissions and Records.

Audit (501.3)
A student wishing exposure to a class may elect to audit the course. The decision to audit, or to change from an audit to A–F (letter grade) or S/U status, must be made no later than the last day to add classes (as published in the Schedule of Classes). Regular attendance at all class meetings is the responsibility of the student, but writing assignments and examinations are not mandatory. Courses audited carry no credit toward the grade point average, toward graduation, or toward meeting professional requirements. An audited course will not satisfy the prerequisite for a course in which the student wants a letter grade. Audited credit hours do not count toward determining eligibility for Financial Aid purposes. Audited classes may be repeated for credit. Once a student registers for and completes a class as an auditor, the audit on the permanent record may not be changed to a credit-earning grade.

Credit Free Courses Procedure (303.8)
The College offers credit free courses periodically. A credit free course or credit free workshop carries its own fee, and the class time invested cannot, under any circumstances, be converted to credit. For information concerning credit free courses or workshop offerings, refer to the Schedule of Classes.

Catalog Choice (501.5)
A student may choose to be governed by the degree/certificate requirements outlined in any one CCC catalog in effect during his/her enrollment for credit at the College, with the following exceptions:

- No student may choose to be governed by the requirements of a catalog issued more than five years prior to the year in which catalog choice is made.

A student must choose only one catalog and will not be allowed to choose a combination of requirements from differing catalogs. A student may petition for waiver or substitution of certain catalog requirements. The academic advisor and/or other college officials may initiate course substitutions for program requirements. These substitutions must be approved by the Division Dean for the Flagstaff Campus or Campus Dean for the Page Campus, for the specific degree and/or certificate.

Note: Students planning to transfer to an Arizona public university who are completing a transfer degree from a catalog prior to the 1999–2000 catalog may choose to replace the TGECC (Transfer General Education Core Curriculum) with an AGBC (Arizona General Education Curriculum). Since the TGECC is 41 credits and the AGBC is 35 credits, students replacing the TGECC with the AGBC may be required to complete additional degree core requirements and/or transferable elective credits to complete the degree.

Student Classification and Standing (501.6)

Freshman
A student who has earned fewer than 30 credit hours.

Sophomore
A student who has earned 30 or more credit hours, but has not earned a degree.

Full-Time Student
Enrolled for
12 or more credit hours
6 or more credit hours
4 or more credit hours
During a session of
10 or more weeks
5 weeks to less than 10 weeks
less than 5 weeks

Part-Time Student
Enrolled for
1–11 credit hours
5 or fewer credit hours
3 or fewer credit hours
During a session of
10 or more weeks
5 weeks to less than 10 weeks
less than 5 weeks
Transfer and Credit by Exam
Transferring Credit to CCC

Basic Guidelines (501.7.1)
Course work completed at accredited institutions with a grade of “C” or its equivalent, or better will be evaluated for transfer credit, with the following exceptions: above 200-level courses and coursework not equivalent to a CCC course will not be transferred. Admissions and Records must receive an official transcript directly from the college or university where credit was earned. Upon a student's written request (in the form of a Transcript Evaluation Request), Admissions and Records staff will evaluate official transcripts for credit by the College. Using the following system of prioritization, up to 45 credit hours will be accepted for transfer, which may include up to 30 hours of credit for prior learning:
- General education classes equivalent to CCC general education courses.
- Other coursework evaluated as equivalent to a CCC course and included in a degree or certificate program, up to the 45 credit limit.
- Courses will only be counted once. Additional occurrences (repeats) of courses will be coded “NT” (Not Transferred).
- Once the limit has been met, courses will be coded “NT” (Not Transferred), regardless of equivalency to a CCC course.

An academic advisor will review credit for applicability toward the student's program objective at CCC. Transfer grades are not calculated in the student's CCC grade point average.

Transfer Procedure (501.7.2)
Students who desire to transfer previous college or university credit to Coconino Community College must formally request a transcript evaluation. Forms are available through Admissions and Records. Following are helpful guidelines for students considering transfer of credit to CCC:
- Transcripts will be officially evaluated only when CCC has received official copies of all transcripts. An official copy is one that has been mailed directly from the student's previous school to CCC. Students must request transcripts by contacting their previous colleges and universities.
- Transcripts from all previous colleges or universities attended, regardless of how long ago courses were taken and regardless of the grades earned, must be submitted to the College. Credits earned more than five years ago may be subject to special evaluation. The official transcript evaluation requires that students certify they are declaring all previous credits.
- The transcript evaluation procedure includes a review process during which the student can request clarification. If a student is refused transfer credit for a class, or if credit is not granted in an area the student feels is appropriate, the student may request a review with a transcript evaluator to discuss his/her concerns. It is the student's responsibility to provide the transcript evaluator with previous school catalogs or other information which will assist in clarifying the classes in question.

Transfer of General Education Courses and Arizona General Education Curriculum (AGEC) Courses from Other Arizona Community Colleges or Universities to CCC (501.7.3)
If a course is in the General Education Core Curriculum (GECC) of the transferring institution, CCC will accept the credits as a CCC GECC course using the following procedures:
- The course will be transferred as an equivalent course if the equivalency is determined by:
  a. a review of transfer course description in comparison to CCC course description, or
  b. a comparison of Course Equivalency Guide (CEG) equivalencies between the transferring institution and the universities with CEG equivalencies between CCC and the universities. For example, per the CEG, the transferring institution's MAT 130, College Algebra, has the following university equivalencies: at NAU, MAT 110; at ASU, MAT 117; at U of A, MATH 117. CCC's MAT 151, College Algebra, has the same university equivalencies; therefore, the transferring institution's MAT 130 is equivalent to CCC's MAT 151.

The Transcript Evaluator will record these equivalencies on the Course Articulation form.
- If CCC does not have an equivalent course, the course will be transferred as a specified number of credits satisfying requirements of the appropriate General Education area (Arts/Humanities, Social/Behavioral Sciences, Physical/Biological Sciences, or Options) and/or Arizona General Education Curriculum (AGEC) Special Requirements area(s) (Intensive Writing/Critical Inquiry, Ethnic/Race/Gender Awareness, and/or Contemporary/Global or International Awareness). The student requesting the transfer evaluation must provide documentation that the course is part of the GECC at the transferring institution. A Request for Substitution form must be initiated by the student, completed by an advisor, and approved by the appropriate Division Chair for the Flagstaff Campus or Campus Dean for the Page Campus.
A student may apply a maximum of 12 hours of Tech Prep credit earned in high school toward any applicable CCC degree or certificate. Tech Prep credit awarded by CCC may not transfer to other colleges or universities.

Dual Enrollment

Dual enrollment course offerings meet CCC’s curricular requirements and competencies. The participating instructors meet qualifications established CCC and students meet college prerequisite/placement requirements. Instead of being offered at the college campus, these classes are part of the student’s regular high school schedule at the high school campus.

Credit for Prior Learning (501.7.5)

Students enrolled at CCC may be awarded a total of 30 credit hours for prior learning completed through the College Level Examination Program (CLEP), Defense Activity for Non-Traditional Support Examination Program (DANTES), Advanced Placement Examinations (AP), and/or military training. Credit awarded for prior learning does not count as hours in residence for graduation requirements. Credit granted by CCC may not transfer to other colleges or universities.

Official test scores for CLEP, DANTES, and AP must be sent directly by the testing agency to Admissions and Records. A written request for an evaluation of test scores must be filed by the student with Admissions and Records. Students seeking an evaluation for military training should consult the Registrar/Director for Admissions or designee regarding proper documentation.

CLEP offers general examinations in Social Science/History, Natural Sciences, Humanities, English, Mathematics and additional examinations in specific subject areas. CCC may grant credit for general examinations with a minimum score of 500 and credit in applicable subject areas with a minimum score of 50. CCC may grant credit for DANTES examinations with a minimum score of 50.

The Advanced Placement Program recognizes that some students are able to complete college-level courses while attending high school. Students who have taken an Advanced Placement course in their secondary school and who scored 3, 4 or 5 on the AP may receive college credit. The awarding of credit varies by discipline. Official scores must be sent directly from the testing agency to CCC for evaluation. A written request for an evaluation of test scores must be filed by the student with Admissions and Records.
Credit by Exam (501.7.6)
1. Acceptance of credit by examination is based on the belief that some students may have previously acquired the knowledge and/or competencies required to complete a particular class and that instruction in this area would be repetitive.

2. Credit by exam, achieved by completing a CCC developed departmental examination is subject to the following restrictions:

- Credit through college developed exams will be granted only to students with a declared major in a degree or certificate program.

- A student cannot receive credit by examination for a course that is equivalent to or lower than that in which they are currently enrolled, or for which they already have received credit, nor for a prerequisite for a course already completed.

- Before a student may take an exam, she/he must have signed approval from the appropriate area coordinator and division chair.

- The charge for credit by exam is equivalent to the current tuition rate per credit hour.

- Fees paid by the student to take examinations must be paid in advance and are nonrefundable.

- In order to receive credit for the challenged course, the student must meet or exceed the defined level of competency for the exam.

- The student will be permitted not more than one retest per course. The retest must occur within the semester during which the first test was taken.

- Notification by Testing Services of credit award or non-award will be sent to the Admissions and Records Office, advising, and the student.

- Transcripts will reflect only that credit by examination has been granted. Satisfactory performance on the exam will be indicated by a "CE" for pass on the student's transcripts. No record is made of failing scores.

- The exam grade will not be calculated into the student's cumulative grade point average.

- Credit by exam may be used to satisfy CCC AGEC course requirements.

- Credits earned by exam are not considered as part of the total credits that must be earned at CCC toward a degree or certificate.
Evaluation of the credit by examination for transfer will be determined by each college and/or university. It is the responsibility of the student to work with the college or university of choice on transferability.

Credit by exam is not available for all courses. Availability is determined by the area coordinator for each discipline.

Approved tests will be kept on file in Testing Services.

Transferring Credit from CCC
The Coconino County Community College District is one of ten state community college districts approved by the State Board of Directors for Community Colleges of Arizona. The academic policies and the operation of CCC are governed by the local CCC District Governing Board and by the State Board. CCC adheres to the Arizona General Education Curriculum approved by the Arizona Board of Regents (governing board for state universities) and by the State Board of Directors for Community Colleges of Arizona. CCC is accredited by the North Central Association of Colleges and Schools, the regional accrediting body. CCC classes follow curriculum approved by the State Board, and courses numbered 100-299 may be eligible for transfer to other colleges and universities. The procedure for determining the transferability of a particular CCC course is as follows:

For CCC courses taught Fall semester 1991 or Spring semester 1992, one of Arizona's accredited community colleges (Yavapai College) permitted CCC to use its course prefix and number system and its course outlines to facilitate the transfer process during CCC's initial two semesters of operation. Students or institutions wishing to determine the transferability of a particular CCC course taught either Fall semester 1991 or Spring semester 1992 should consult the Yavapai College section of the 1991-92 Course Equivalency Guide published by the Arizona Commission for Postsecondary Education.

For CCC courses taught summer session 1992 forward, students or institutions should consult the CCC section of the appropriate Course Equivalency Guide published by the Arizona Commission for Postsecondary Education.

Transferring to Arizona Public Universities (501.7.8)
Arizona public community colleges and universities (Northern Arizona University, University of Arizona, Arizona State University) have agreed upon a common structure for a transfer general education curriculum. This curriculum provides students attending any Arizona state community college with the opportunity to build a general education curriculum that is transferable upon completion without loss of credit to another Arizona state community college or university. This common agreement is called the Arizona General Education Curriculum (AGEC).
Completion of the AGEC will fulfill lower division general education requirements at all Arizona state community colleges and universities and will be fully applicable to the baccalaureate degree, but may not apply to degrees articulated with the Transfer Guide Pathway (TG-XR). Students completing the AGEC will still be required to fulfill lower division major requirements and prerequisites within their college and major/minor area of study. Some majors have significant prerequisites and/or program requirements that must be completed before a student may be admitted to upper division course work. Community college students who are undecided about which of the Arizona public universities they plan to attend or what program of study they intend to pursue are advised to explore educational options while they complete the AGEC.

If a student does not complete all 35 credits of the AGEC, lower division general education is not fulfilled at all Arizona public universities. When the AGEC is not completed, the general education credits will be evaluated by the university on a course-by-course basis using the Course Equivalency Guide and applied depending on the degree and college. For more information regarding the AGEC, see Quick Reference for Programs and General Education Requirements in this catalog.

Students intending to transfer to an Arizona public university are strongly encouraged to meet regularly with an advisor to understand students' rights and responsibilities related to the transfer and applicability toward a degree of program core curriculum, courses and credits.

Transfer Ombudsperson (TSO) (501.7.9)
Each Arizona state university and community college has appointed a TSO to resolve problems by transfer students as reported by students, advisors, faculty members and college officials. The TSO has the responsibility to ensure compliance with the transfer and articulation agreements and resolve problems concerning the transfer and applicability of community college credit to university programs. Students may file complaints with the university TSO or report complaints to the TSO at the community college where the transfer course work was completed.

Coconino Community College Transfer Ombudsperson (TSO) (501.7.10)
Students wishing to report a problem in transferring CCC credit to a university should provide a written request to the CCC TSO including:
- the name of the university
- the declared major at university
- a comprehensive statement regarding the problem or complaint related to transfer of credit or core curriculum
- a summary of the action taken by the student prior to submitting the complaint
- copies of any documentation provided to the student from university officials
Financial Information

Class Fees
Certain classes charge fees in addition to tuition. Refer to the Schedule of Classes published each semester and summer session for class fee information. The Schedule of Classes is subject to change without notice.

Estimated Educational Expenses
Coconino Community College's charges for educational fees are approved annually by the CCC District Governing Board and the State Board of Directors for Community Colleges of Arizona and are subject to modification by these Boards. The following is intended to provide prospective students with information regarding approximate expenses. It is not to be interpreted as limiting the College’s need to adjust charges in response to rising costs.
• An Arizona resident who registers as a full-time student should expect to pay approximately $834 per semester for educational fees and books.
• A part-time student who registers for 6 credit hours should expect to pay approximately $417 per semester for educational fees and books.
• A part-time student who registers for 1 to 3 credit hours should expect to pay approximately $302 per semester for educational fees and books.
• The student should consult the most recent Schedule of Classes for current and complete information concerning expenses.

Tax Credit for Tuition and Fees
(the Hope Scholarship)
(Based on tax laws in effect for tax year 2002, IRS Form 8863.)
The Taxpayer Relief Act of 1997, signed by President Clinton on August 5, 1997 includes provisions that will benefit Coconino Community College students and/or parents. Attending CCC for two years can provide you with a $1,500 per year tax credit under the Hope Scholarship. This is a dollar-for-dollar tax credit for the first two years of college against actual federal income taxes owed.

Taxpayers may claim 100% of up to the first $1,000 spent in “out-of-pocket” tuition and fees (not books), and 50% of up to the second $1,000 in tuition and fees, for a total of up to $1,500.

Example
Student Pays $2,500  $2,000  $1,500  $1,000  $750
Tax Credit $1,500  $1,500  $1,250  $1,000  $750
This is a per student credit. Families with two children in college would be eligible to claim up to two $1,500 credits. Or, if a husband and wife are both attending a community college, each can claim up to a $1,500 credit.

Students must be enrolled at least half-time for a portion of the taxable year. The credit phases out for single taxpayers with adjusted gross income between $40,000 and $50,000, and for joint filers with adjusted gross incomes between $80,000 and $100,000. Married couples must file jointly to qualify for credit. For more information, contact the Financial Aid Services.

Non-Payment of Fees
A student who fails to meet financial obligations to CCC may be dropped from classes and will be barred from future enrollment until debts are settled.

Out-of-County Fees
No student is required to pay additional out-of-county fees or tuition; however, residents of Arizona counties which do not have established community college districts are required to complete an Out-of-County Affidavit. The counties are Apache, Gila, Greenlee, and Santa Cruz. Affidavits are available from Admissions and Records.

Returned Checks
Any check returned by the bank will result in the assessment of a $25 processing fee to the student’s account. A student who pays for registration or any other college obligation with a returned check may be subject to legal action and/or the cancellation of registration. The College reserves the right to refuse credit cards or checks for any transaction. Paying for the use of other college services by personal checks may be disallowed for any individual who has a check returned by the bank. If any payment tendered is unauthorized, incomplete, or received after the due date, registration fees will be considered as unpaid and the student will be dropped from all classes.

Tuition and Payment
Tuition costs are summarized in the appropriate Schedule of Classes. Tuition does not include additional charges for class fees, books or supplies. To complete advance registration, tuition must be paid (or financial aid arrangements completed) by the payment deadline for advance registrants. To register for classes at any other registration period, payment or financial aid arrangements must be made at the time of registration.

Withholding Student Records
Coconino Community College may deny enrollment, official transcripts, degrees, and/or certificates to students with outstanding obligations to the College relating to fees, college equipment or materials, or any other obligation. Failure to respond to notifications regarding outstanding obligations may result in the withholding of student records and involuntary withdrawal from the College.
Canceled Classes
In the event a class is canceled by the College, a 100% refund of tuition and fees will be issued. The refund due the student will be processed after the add/drop period and will be mailed to the student's last known address unless prior arrangements have been made with the Business Office.

Refund Policy
A refund of tuition is made only to students who follow official withdrawal procedures. A withdrawal is not official until cleared through Financial Aid Services and processed by Admissions and Records. Note that the refund information below differs for full semester classes and shorter classes.

Semester
Tuition paid will be refunded to students officially withdrawn from full semester classes on or prior to the 15th business day of the semester based on the following schedule:

- 100% of tuition and fees through the 10th business day of the semester.
- 50% of tuition and fees from the 11th through the 15th business day of the semester.
- No refund on or after the 16th business day of the semester.

Note: Business days are defined as Monday through Friday, excepting official holidays. See the semester calendar in the Schedule of Classes for actual published dates. The date used to calculate the refund is the date of official withdrawal.

Summer Session
Tuition will be refunded to students officially withdrawn from summer session classes based on the following schedule:

- 100% of tuition and fees through the 5th business day of the session.
- No refund on or after the 6th business day of the session.

Short Courses
Tuition will be refunded to students officially withdrawn from short courses (those meeting less than a full semester) based on the following schedule:

- 100% of tuition and fees up to and including the 1st class session. To be eligible for a 100% refund, the withdrawal must be initiated no later than the 1st business day following the 1st class session.
- No refund on or after the 2nd business day following the first class session.

This restricted refund schedule for short courses is necessary due to the limited period of class time.

Processing of Refunds
Note: Refund processing will not begin until after the add/drop period.

All refunds that may be due a student will first be applied to debts owed the College. Refunds will be mailed to the student’s last known address unless prior arrangements have been made with the Business Office. It is the student’s responsibility to notify the College of any change in address by completing a Change of Address form and submitting it to Admissions and Records.

Note: If paid by credit card, refund will be credited to the credit card originally used for payment.

Exceptions to Refund Policy
In the event the following circumstances arise, the student enrolled in the course may request a refund by submitting a completed Refund Request Form to the cashier.

- Refunds for Serious Illness
  A pro rata refund will be made to a student suffering from a serious illness that necessitates a withdrawal from class(es), as long as the request is made prior to the end of the semester in which the illness occurs. The student must produce a verifiable doctor’s statement certifying that the illness prevents the student from attending class(es).

- Refunds for Death of Student or Student’s Spouse, Parent, or Child
  A 100% refund will be made to the student or the student’s estate, in the event of death of the student or student’s spouse, parent, or child that results in a withdrawal from class(es). The Refund Request must be made prior to the end of the semester in which the death occurs. The student must provide a death certificate or newspaper obituary notice with proof of relationship (i.e., birth certificate, marriage license, etc.). In the event of a student death, the estate must produce a death certificate.

- Refunds for Military Service
  A student belonging to the Armed Forces or the Arizona National Guard who is called to active duty and assigned to a duty station will be allowed to withdraw and receive a 100% refund of tuition and fees, provided the course has not been completed. The student must provide a copy of the military orders within six months of the student’s withdrawal.

Refund Requests will be determined by the Controller. The Controller may determine that the Refund Request does not meet the criteria above and deny the Request. The student may process a Petition for Exception to Refund Procedures upon denial by the Controller.
Petition for Exception to Refund Procedures
A student may submit a written petition to the Controller requesting an exception to the refund procedures for circumstances not included in the Refund Policy. The written request must include the following information:

- Date
- Student Name
- Address
- Phone Number
- Student ID Number
- Term
- Course Number(s), Title(s), and Sequence Number(s)
- Reason for refund request; supporting documentation may be attached
- Student Signature

Petitions for Exception to Refund Procedures must be submitted to the Controller within the term for which the refund is being requested.

The Refund Review Committee is established to provide equitable and consistent determinations on Petitions for Exception to Refund Procedures not covered by the Refund Request Procedures. The Refund Review Committee membership will include the Controller, a Student Affairs representative, and a full-time faculty representative. The Refund Review Committee will determine refunds requested through the petition process. Petitions will be reviewed within ten business days following submission by the student. The Controller will notify the student in writing of the Committee’s determination within five business days of the decision. The written notification will include the reason, if denied.

Appeal Procedures
A student may appeal the action of the Refund Review Committee by submitting a written request to the Vice President for Student Affairs or designee within five business days following notice of the Refund Review Committee’s decision. The statement of appeal must include a copy of the:

- student’s petition,
- the finding by the Review Committee,
- the reason for the appeal.

The Vice President for Student Affairs may consult with appropriate personnel when necessary. The Vice President will inform the student of his/her determination concerning the appeal, in writing, within five business days of receiving the appeal. The decision of the Vice President is final.

Refund and Repayment Policy for Financial Aid Recipients (520.1.17)
The Higher Education Amendments of 1998 require that if a recipient of federal financial aid withdraws from a school during a semester in which the recipient began attendance, the school must calculate the amount of federal financial aid the recipient did not earn and those funds must be returned.

Withdrawal Date
The withdrawal date is:

- The date the student began the withdrawal process as defined by the school;
- The date the student otherwise provided official notification to the school of the intent to withdraw; or
- If the student did not begin the withdrawal process or otherwise notify the school of the intent to withdraw, the midpoint of the semester for which federal financial aid was disbursed or a later date documented by the school.

Calculation of Federal Financial Aid Earned (520.1.18)
The percentage of the semester completed is the total number of calendar days in the semester divided by the number of days completed by the student as the withdrawal date. The student has earned 100% of the federal financial aid received if the withdrawal date occurs after 60% of the semester has been completed. If the student’s withdrawal date occurs before 60% of the semester has been completed, the percentage of federal financial aid earned is equal to the percentage of the semester completed as of the withdrawal date.

Return of Unearned Federal Financial Aid Funds (520.1.19)
If the student receives more federal financial aid funds than the amount earned, the school, the student, or both must return the unearned funds as required, and in the order specified below.

The school must return the less of:

- The total amount of unearned aid; or
- The amount of institutional charges incurred for the semester multiplied by the percentage of unearned aid.

- The student must return 50% of the remaining grant funds.

Method of Return of Unearned Funds by the Student
Repayment of grant funds will be due to the school within 45 days of repayment notification. Grant funds not repaid after 45 days will be referred to the Department of Education for collection.
Order of Return of Federal Financial Aid Funds
1. Federal Pell Grant
2. Federal SEOG
3. LEAP

Samples of Title IV Funds Repayment
1. A student completes 40 days of a 111-day semester. He has received a total of $2,150 in federal financial aid as follows: $1,650 Federal Pell Grant, $500 Federal SEOG. His total school charges are $396.
   a. % of earned federal aid = 40/111 = 36%
   b. % of unearned federal aid = 100% - 36% = 64%
   c. Total amount of unearned federal aid = 64% X $2,150 = $1,376
   d. Amount of unearned federal aid attributed to school charges = 64% X $396 = $253. The school must return $253 to the Federal Pell Grant.

   e. Amount of unearned federal aid attributed to non-school charges = $1,376 - $253 = $1,123 is allocated to the Federal Pell Grant. Federal regulation only requires that the student pay 50 percent of this amount. This means that the student must pay $561.50 back to the Federal Pell program. The school will bill the student.

   f. The student owes $253 for school charges and $561.50 for non-school charges for a total of $814.50.

2. A student completes 69 days of a 111-day semester. She has received a total of $2,075 in federal financial aid as follows: $1,575 Federal Pell Grant, $500 LEAP. Her total school charges are $401.
   a. % of earned federal aid = 69/111 = 62%
   b. The student has earned 100% of the federal financial aid received because the student completed over 60% of the semester.
Financial Aid (520.1)
Cocorine Community College offers a variety of financial aid to full- and part-time students. The types of financial support available include the Federal Pell Grant, Federal Supplemental Educational Opportunity Grant (FSEOG), Federal Work Study (FWS), and Leveraging Educational Assistance Partnership (LEAP), campus employment, and scholarships. The College uses the Free Application for Federal Student Aid (FAFSA) as its application for all federal financial aid programs. A separate application is required for scholarships. Complete information concerning these programs and necessary applications for scholarships and grants is available through the office of Student Financial Assistance.

General Eligibility Requirements for Federal Financial Aid (520.1.3)
To be eligible for federal financial assistance, a student must:
- Have a high school diploma or its equivalent (GED). A copy of the diploma must be on file with Admissions and Records.
- Be enrolled in and pursuing a degree or certificate program. Transfer students must have official academic transcripts on file and evaluated with Admissions and Records. Financial aid will not be awarded until this is completed.
- Demonstrate financial need. Need is the difference between the cost of education and what the parent(s) and/or student are expected to contribute.
- Be making satisfactory academic progress. For more information, see the Satisfactory Academic Progress policy.
- Meet one of the following citizenship requirements:
  - U.S. citizen;
  - U.S. national;
  - U.S. permanent resident who has an Alien Registration Receipt Card (I-151 or I-551).
If you are not in one of the above categories, you must have one of the following documents from the U.S. Immigration and Naturalization Service:
- An I-94 with one of the following endorsements: "refugee," "asylum granted," "indefinite or humanitarian parole," or "Cuban-Haitian entrant."
- A temporary residency card (I-668).
Students from the Marshall Islands, the Republic of Palau, and the Federated States of Micronesia should consult with Financial Aid Services concerning their eligibility for federal student aid.

Students attending school only on an F1 or F2 student visa, a J1 or J2 exchange visitor visa or a G series visa are not eligible for federal financial aid.
- Have a social security number.
- Be registered with Selective Service, if required.

Financial Aid Application Process (520.1.4)
Federal regulations require the submission of a number of documents by students applying for financial aid. In most instances, the documents listed below will constitute a complete file; however, any additional documentation requested by Financial Aid Services must be submitted before a file will be considered complete.

Free Application for Federal Student Aid (FAFSA) (520.1.5)
This no-cost need-analysis form provides the information necessary for any federal financial aid award.

There are four different ways to complete this form:
- Electronic Application Process
  Schedule an appointment with the OSFA. Before your appointment, you need to obtain a FAFSA, a Verification Worksheet, and a Post-secondary History form. At your appointment, you will need to provide the following documents:
  - Signed and completed FAFSA.
  - Signed copies of the previous year’s federal tax return for you, your parent(s), and/or your spouse, if applicable.
  - Copies of previous year’s W-2’s for you, your parent(s), and/or your spouse, if applicable.
  - Signed Verification Worksheet.
- Paper Application Process
  Obtain a FAFSA, complete, and mail to the Federal Processor. CCC’s institutional ID number is 031004. This process can take as long as six to eight weeks and possibly longer if information changes during the process. The information provided on the FAFSA is sent to CCC electronically; you will receive the results at approximately the same time. If required additional documents will be requested by Financial Aid Services when the electronic data is received.
- Renewal Application
  Dependent upon when you applied you applied for federal financial aid in the previous academic year, you will receive a Renewal Application in the mail or by e-mail. Update the Renewal Application with current financial information and mail to the Federal Processor or process through FAFSA on the Web. The paper renewal process can take as long as the Paper Application Process. The FAFSA on the WEB process can take up to two weeks. The information provided on both types of Renewal Application is sent to CCC electronically. If you processed your application
through the mail you will receive the results at approximately the same time. If you processed your application through FAFSA on the WEB, CCC will receive your information usually within two weeks. Additional documents may be requested from you by Financial Aid Services when the electronic data is received.

- **Internet Application Process**
  You may complete the FAFSA on the World Wide Web at www.fafsa.ed.gov. You will need a computer that has access to the internet and that is attached to a printer. For additional information or technical assistance about the FAFSA on the web, contact FAFSA’s customer service at (800) 801-0576.

In addition to completing the FAFSA in one of the four ways mentioned above, all students will need to submit the following documents to Financial Aid Services to have a complete file:

**Post-secondary History Form/Statement of Educational Purpose**
This form requests the student to list all post secondary schools previously attended. The Statement of Educational Purpose is a statement that all aid applicants must sign: affirming that the student will use his/her financial assistance for educational purposes; is not in default on any Title IV loan or owes a refund on any Title IV grant; and authorizes the College to use his/her Federal Pell Grant and any other financial assistance to pay tuition and fees and any other College charges.

**Verification (520.1.6)**
If the student is selected for verification by the Federal Processor or files electronically, the student will be required to submit the following in addition to the documents listed above:
- Verification Worksheet with required signatures (if the student is dependent, one parents signature is required; student signature is also required)
- Copies of signed federal tax returns of the student, spouse (if applicable), and if the student is dependent, signed copies of the parents’ tax returns
- Copies of W-2’s will be requested for student, spouse (if applicable), and if the student is dependent copies of W-2’s for parents.
- Other documents requested by Financial Aid Services to resolve conflicting or questionable information.

**Financial Aid Student Rights and Responsibilities (520.1.7)**

**Student Rights**
The student has a right to:
- Know which financial aid programs are available at the College.
- Know the deadlines for submitting applications for each of the programs available.
- Know how financial need is determined. This includes cost for tuition, room and board, travel, books and supplies, and personal and miscellaneous expenses considered in your budget.
- Know how the refund and repayment policies of the College work.
- Know how Financial Aid Services monitors satisfactory academic progress and the consequences of failing to maintain satisfactory academic progress.

**Student Responsibilities**
The student has the responsibility to:
- Keep his/her address current with Admissions and Records and Financial Aid Services.
- Complete all applications accurately and submit them on time to the right place.
- Provide correct information. In most instances, misreporting information on financial aid application forms is a felony offense under federal law.
- Submit all additional documentation, verification, corrections, and information requested by the College.
- Read, understand, and keep a copy of all forms that the student signs.
- Accept responsibility for all agreements that the student signs.
- Make satisfactory academic progress toward a degree.
- Notify Financial Aid Services of any changes in his/her financial situation, the number of family members attending college, or household size.

**Satisfactory Progress Policy for Financial Aid Recipients (520.1.8)**
It is the student’s responsibility to meet and maintain satisfactory progress while earning a degree or certificate. This policy applies to students receiving federal and state financial aid and should not be confused with the College’s Academic Progress policy. The Satisfactory Progress policy includes three elements:
1. Minimum grade point average (GPA);
2. Maximum number of credit hours after which a degree/certificate must be granted;
3. Minimum number of credit hours completed per semester or academic year.
These three standards measure both qualitative and quantitative progress. Students will be ineligible for federal and state financial aid if these standards are not met. Student progress will be reviewed each semester to determine eligibility for federal and state financial aid for the upcoming semester, academic year, and/or summer session. The academic year begins with Fall semester and continues through spring. Students who have completed a sufficient number of credit hours within the academic year are eligible to receive federal and state financial aid for the summer session. Students who have not completed the required number of credit hours for which they were funded will be placed on probation for the next semester. Students who receive Title IV funds on a probationary basis must meet the stated probation requirements or their eligibility will be suspended.

Qualitative Standards (520.1.9)
Students receiving Title IV funds must maintain a cumulative grade point average of 2.00 or higher.

Foundation Courses (520.1.10)
A maximum of 30 credit hours of foundation classes may be counted towards a student’s “Minimum Credit Hour per Academic Year” requirement; however, the credit hours for foundation classes will not be charged against the total maximum credit hours allowed. The exact number of allowable foundation credit hours will be determined by the student’s academic skill assessment results.

Continuance of Eligibility (520.1.11)
Student records are reviewed at the end of each semester for compliance with the three Satisfactory Progress elements: minimum cumulative GPA, maximum number of credit hours earned, and minimum number of credit hours completed per academic year. Students who meet all three of these standards are eligible for further federal and state financial aid consideration for the following academic year.

Students receiving Title IV funds who have 40 or more credit hours (both transfer and CCC) will be required to submit a Student Education Plan (SEP), prepared with the help of an academic advisor, to Financial Aid Services. The student will receive funding for only those courses required to complete degree requirements and as outlined in the SEP.

Quantitative Standards (520.1.12)
Maximum Number of Credit Hours
The maximum time frame for completion of a degree or certificate is measured by the total number of credit hours a student earns. This includes transfer hours and all semesters of enrollment (including summer session) and applies to each degree or certificate pursued whether or not financial aid was received. Once the maximum number of hours is completed, the federal financial aid eligibility ends.

Program  Maximum credit hours
Intermediate Certificate (1-24) 30 credit hours
Advanced Certificate (1-45) 48 credit hours
Associate of Arts (60-65) 80 credit hours
Associate of Applied Science (60-65) 80 credit hours
Associate of Science (60-65) 80 credit hours
Associate of General Studies (60) 80 credit hours

Minimum Number of Credit Hours per Academic Year
Students receiving Title IV funds are expected to complete at least 80% of the semester credit hours enrolled as outlined in the following chart:

Credit hours load 80% Minimum completion each semester
Full time based on 12 credit hours 10 credit hours
3/4 time based on 9 credit hours 7 credit hours
1/2 time based on 6 credit hours 5 credit hours

Students enrolled for five or fewer hours must complete the number of hours funded (i.e., if a student is funded for one credit hour, the student must complete the 1 credit hour).

The following grades do not count toward the “Minimum Credit Hours per Academic Year” requirement: W, I, AU, U and NCR. Repeated courses and “IP” grades will be treated in accordance with established College policy.

Failure to Maintain Satisfactory Progress (520.1.13)
- Students who fail to meet the minimum cumulative GPA must use their own financial resources (unless an appeal is approved for a probationary semester) and attend one semester or summer session earning at least six credit hours at CCC to raise their cumulative GPA. Transfer grades are not calculated into the GPA.
- Students who fail to complete the required minimum number of credit hours for which they were funded will be placed on probation the following semester.
- Students who have exceeded the established maximum credit hours will be required to submit an appeal and have eligibility status determined on an individual basis. Until a determination is made on the appeal, the student will be ineligible to receive federal financial aid funds.
- Students who have been placed on financial aid probation must meet the conditions of the appeal or attain academic good standing by the end of the semester or eligibility will be suspended. Suspended students will not be eligible to receive funds until such time as academic good standing is attained.
Students in this category will be required to appeal in order to be reevaluated to have eligibility reinstated.

- Students who are placed on academic probation will automatically be placed on financial aid probation.
- Students who are placed on academic suspension will automatically be placed on financial aid suspension.

Right to Appeal (520.1.14)
In order to receive funds during the probationary period, students must submit a Satisfactory Academic Progress Appeal Form with supporting documentation to Financial Aid Services. Satisfactory progress appeals may fall into one of three categories:

- Withdrawal/Waiver of a Semester
  Students who have not completed the necessary number of credit hours for federal funding because the student withdrew from the semester may appeal to have the semester waived under circumstances such as illness, death in the family, serious personal problems, etc. The following supporting documentation is required: letter from attending physician, counselor, medicine man/woman, hand trembler/shakers, etc., addressing the specific problem, dates student was unable to attend school, and a comment on their current condition and ability to complete course work in the future.

- Probation Extension (one semester only)
  Students who have failed to earn the minimum number of credit hours during a probationary semester for which the student was funded may appeal to receive federal funding for the following semester if extenuating circumstances have prevented completion of the minimum number of credit hours. The following supporting documentation is required: letter from attending physician, counselor, medicine man/woman, hand trembler/shakers, etc., addressing the specific problem, dates student was unable to attend school, and a comment on the student’s current condition and ability to complete course work in the future.

- Maximum Credit Hour Extension
  Students may appeal for an extension of the maximum hour limit if extenuating circumstances have prevented completion of a degree in a timely fashion: transfer hours that did not apply to their CCC major, change in major, dual major, extenuating circumstances have interfered with the completion of course work, etc. The following supporting documentation is required: letter from advisor supporting student’s circumstance and Student Education Plan (SEP). Students must provide Financial Aid Services with a copy of the proposed schedule of classes each subsequent semester before their financial aid will be processed. Students will receive funding only for those classes listed on the SEP.

Appeals that fall outside the scope of these three categories will be evaluated on an individual basis by the Director for Student Support Services and Financial Assistance.

Students who have conditions set forth in the appeal approval and do not meet these conditions will be suspended from financial aid and must complete a minimum of half-time status using their own resources to regain eligibility or may submit a new appeal.

Satisfactory Academic Progress (SAP) Appeals Committee (520.1.15)
A student may appeal the decision of the Director for Student Support Services and Financial Assistance by submitting a written request to have his/her appeal forwarded to the SAP Appeals Committee. The composition of the SAP Appeals Committee will be the following: Registrar/Director for Admissions, one advisor, one Faculty, and one Student Affairs representative; the Director for Student Support Services and Financial Assistance will serve in an ex-officio capacity. In this written request, the student must attach any additional documentation to support his/her appeal.

Financial Aid Services staff will schedule a SAP Appeals Committee meeting to review any appeals submitted. The student will have the option of being in attendance and will be scheduled for a specific time if he/she chooses to be in attendance. The Committee may either uphold, reverse, or modify the decision of the Director for Student Support Services and Financial Assistance. The decision of the Committee will be final, and Financial Aid Services will notify the student in writing within ten days of the Committee’s decision.

Effects of Consortium Credits on Satisfactory Progress (520.1.16)
If a student has a consortium agreement between CCC and another institution in which CCC is the parent institution, credits earned at the non-parent institution will count as though they were earned at CCC and will count towards Satisfactory Academic Progress requirements.
Veterans’ Services

Veterans’ Educational Benefits (520.1.20)
Coconino Community College is approved to train students under government educational programs for veterans and eligible dependents of deceased or disabled veterans. Eligible students and those who wish to determine their future eligibility should apply through Financial Aid Services.

It is recommended for Veterans making an initial application for their benefits to submit a certified copy of their DD 214 (member four copy). Eligible dependents making an initial application under Chapter 35 must provide their parent’s or spouse’s VA claim number.

Students planning to attend the College under the VA vocational rehabilitation program should contact their vocational rehabilitation specialists before registration. This contact may be made through Financial Aid Services. Additional services to be offered by Financial Aid Services include application for all VA benefits, professional educational counseling, tutorial assistance, and referral services.

Veterans’ Admission (520.1.21)
By Arizona statute, no failing grades received by a veteran at an Arizona university or community college prior to military service may be considered when determining admissibility. This exception applies only to veterans who were honorably discharged, have served in the U.S. Armed Forces for a minimum of two years, and have previously enrolled at a university or community college in Arizona.

All veterans must declare a major and list their educational goal as degree/certificate (DC) or degree to transfer out (DT). They must also submit Official Academic Transcripts from all previous schools attended by the end of their first semester of attendance. They must also request those transcripts to be evaluated by Admission and Records.

Proper advising and course planning are strongly encouraged. Veterans and their dependents are not allowed to enroll in course repeats, course audits, or independent study courses without prior approval by Financial Aid Services.

Students admitted or readmitted to the College under this statute are subject to academic standards, graduation, and other academic regulations in this catalog.

Veterans’ Retention (520.1.22)
All veterans and dependents of veterans must successfully complete 60% of their coursework with the individual grades and cumulative grade point average required by the College to continue toward graduation. If less than 60% of the coursework is completed, or if the grade point average falls below that required by the academic probation, suspension, or dismissal policy, veterans or veterans’ dependents will be placed on probation the following semester. If individual grades and the cumulative grade point average are not maintained during that semester, the veteran or veterans’ dependents will be suspended or terminated from their educational allowances effective the ending date of the semester, and notice will be sent to the VA regional office within thirty days following.

When the progress or status of a veteran is changed, a notice will be sent by the College to the VA regional office, within thirty days following the date of the change or the last day of attendance.

Veterans’ Attendance (520.1.23)
Veterans and veterans’ dependents are paid to attend and complete coursework. Attendance records are maintained by all faculty. If at any time Financial Aid Services is notified that a veteran’s attendance is inconsistent with College standards, benefits may be reduced accordingly and the VA regional office notified. In some cases, the veteran may be dropped for nonattendance. See Academic Procedures for more information.
Academic Standards and Procedures
Academic Integrity (303.11)

Honesty (303.11.1)
Honesty in academic work is a central element of the learning environment. The presentation of another individual’s work as one’s own or the act of seeking unfair academic advantage through cheating are violations of the College’s Student Code of Conduct. The general descriptions below emphasize those boundaries of academic conduct that are essential to the learning environment. The following acts of academic dishonesty are among those that may lead to college disciplinary action or possible dismissal:

Plagiarism (303.11.2)
Plagiarism is defined as submitting assignments, examinations, or other academic work which is not entirely the work of the student. This can include, but is not limited to such practices as: quoting without giving proper credit to a source, expanding someone else’s work without giving proper credit, adopting as one’s own an actual document (including the copying of computer or other electronic media), directly using someone else’s ideas rather than words without giving proper credit.

Cheating (303.11.3)
Cheating is defined as submitting assignments, examinations or other work that is based upon sources or activities forbidden by the instructor. Cheating includes the furnishing of materials to another person for purposes of aiding that person to cheat. When an unfair academic advantage is gained by a person through deception or other means, that action is defined as cheating.

Violation of Copyright (303.11.4)
The unauthorized copying of copyrighted material, whether print or computer media, is unacceptable and is considered an act of academic dishonesty. Moreover, such practice is illegal and makes the violator subject to legal penalty.

Penalties (303.11.5)
The following penalties may be applied in instances of academic dishonesty:
- A student caught in an act of academic dishonesty on an assignment may or will, at the discretion of the instructor, be assigned a grade of “F” for that assignment or for the entire course, regardless of the length of time the student has been in attendance.
- A student found to have committed an act of academic dishonesty may be dismissed from CCC. The length or time period of the dismissal will depend upon the nature of the offense and may be permanent.

Academic Progress (303.12)

Notification (303.12.1)
Students affected by the procedures in this section will be notified of academic probation and/or suspension on the semester grade reports, which are sent to the student’s last known address.

Students receiving financial aid are subject to Satisfactory Academic Procedures. For more information, see Satisfactory Progress Policy for Financial Aid Recipients. Refer to CCC policy (520.18) as stated in this catalog.

Probation (303.12.2)
A student will be placed on academic probation if the cumulative grade point average is less than 2.00. Students should be aware that graduation requires a minimum cumulative grade point average of 2.00.

Students on academic probation may not take more than 12 credit hours per fall or spring semester (4 credit hours per summer session). Advisor approval is required prior to registration. A student placed on probation status has two regular (Fall and Spring) semesters to raise the cumulative grade point average to 2.00. If the minimum cumulative grade point average is not met at the end of two cumulative semesters, the student is placed on academic suspension.

Suspension (303.12.3)
A student on academic probation for two regular (Fall/Spring) semesters who fails to raise the cumulative grade point average to the required minimum will be placed on academic suspension and barred from registration for the period of one regular (Fall/Spring) semester.

Re-Admission (303.12.4)
An academically suspended student may apply for re-admission by submitting a petition for re-admission at least one month prior to the beginning of the semester or summer session for which the student seeks enrollment. The petition will be reviewed by the Registrar/Director for Admissions or designee.

The Registrar/Director for Admissions or designee may elect to approve the petition as submitted, to approve the petition with conditions (e.g. limited coursework, specific classes allowed, other classes denied, etc.), to uphold suspension, or to take other action which is deemed in the best interest of the student. Re-admission may include a change in major, removal of grades, adjustment of cumulative grade point average, etc. If the student is readmitted, he/she will automatically be placed on academic probation.
Appeals (303.12.5)

Students who desire to appeal a probation, suspension, or denial of re-admission decision must submit a letter detailing the basis of the appeal to the Registrar/Director for Admissions within four months. The Student Academic Appeals Committee will review the student's case and make a decision that is considered final. The Registrar/Director for Admissions will communicate this decision to the student.

Attendance (303.2)

Because attendance is essential to academic success, CCC students are expected to attend regularly and punctually all classes in which they are enrolled. Attendance requirements must be published in the course syllabus distributed to students.

First Class Session Requirement
All students are required to attend the first class session of each course in which they are enrolled. Failure to attend the first class session or to notify the instructor prior to the class session of an inability to attend may result in the student being dropped from the class by the instructor.

Absences
- Instructors may drop a student whose unexcused absences exceed the equivalent of one week of class of a regular full semester.
- Instructors should drop a student whose unexcused absences exceed the equivalent of two weeks of class of a regular full semester.
- Instructors must drop a student whose unexcused absences exceed the equivalent of three weeks of class of a regular full semester.
- Absences will be counted regardless of when they occur during the semester or session, when the absences take place before the deadline for student-initiated withdrawal.
- Instructors may grant excused absences at their discretion.

Lateness
- At the instructor's option, late arrivals or tardiness may accumulate as unexcused absences with each tardy counting not more than one class hour.

Other
- Instructors may establish a more stringent attendance policy.
- Instructors are under no obligation to make special arrangements for students who have missed class assignments due to unexcused absences.

• Students are responsible for notifying their instructors in advance of any planned absences and for completing all class assignments as required.
• Instructors have the discretion to excuse absences for illness, optional activities related to other classes, or personal emergencies.
• Absences due to the student representing the College in some official capacity or due to participation in a required field trip in another class will be excused upon presentation of verifying evidence by an authorized college official.

Grade of Withdrawal

Regular Semester
After the 45th day of the instructional period, instructors may drop a student for excessive absences with a "W" grade (withdrawal). Students may drop a class until the deadline published in the appropriate academic calendar and in the Schedule of Classes. After the deadline, students who prefer to be dropped with a "W" grade (withdrawal) rather than receiving the grade earned must request this from the instructor. Otherwise, they may receive a grade of "F" for the course. No student may drop a class during the last two weeks of a regular full semester.

Short Course
If a short course is dropped once the class has begun, a "W" grade (withdrawal) will be recorded on the student transcript. Written petitions for exception to procedure may be presented to the Registrar/Director for Admissions or designee for action.

Absences after Student-Initiated Withdrawal
If an absence, which would otherwise result in a student being dropped, occurs after the deadline for student-initiated withdrawal, faculty may either drop the student by indicating a "W" grade (withdrawal) on the grade roster or retain him/her on the class roster and award the grade warranted by the student's performance. All drops must conform to the college policy.

Class Cancellation Due To Inclement Weather
Should CCC need to cancel classes due to inclement weather, the media will be so informed. Please listen to local radio and television stations for announcements. If the public schools cancel classes due to inclement weather, CCC classes held at those schools will not meet. If CCC cancels classes and NAU does not, CCC classes scheduled to meet at NAU will meet as scheduled. The cancellation of CCC classes will only affect those areas receiving the inclement weather and areas affected will be identified in the media announcements.
Class Orientation (303.3)

At the beginning of each credit course, instructors will give each student a written course syllabus which includes attendance requirements, an assignment schedule, a formal evaluation plan, a semester calendar, grading criteria for the course, and other pertinent information. A formal evaluation plan may not be required in a credit-free course.

Final Examinations (303.4)

Final examinations or suitable evaluations are required in all credit classes. Under no circumstances should a student make employment, travel or personal plans, that conflict with examination periods. In extenuating circumstances, a student may be excused from a final examination or take a final examination at an unscheduled time with written permission from the instructor.

Grades and Grade Appeals Grading (303.5)

<table>
<thead>
<tr>
<th>Letters</th>
<th>Grades</th>
<th>Grade Points/ Credit Hour</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>Excellent</td>
<td>4</td>
</tr>
<tr>
<td>B</td>
<td>Good</td>
<td>3</td>
</tr>
<tr>
<td>C</td>
<td>Average</td>
<td>2</td>
</tr>
<tr>
<td>D</td>
<td>Unsatisfactory</td>
<td>1</td>
</tr>
<tr>
<td>F</td>
<td>Failure</td>
<td>0</td>
</tr>
<tr>
<td>I</td>
<td>Incomplete</td>
<td>Not computed in GPA</td>
</tr>
<tr>
<td>W</td>
<td>Withdrawal</td>
<td>Not computed in GPA</td>
</tr>
<tr>
<td>Au</td>
<td>Audit (no credit)</td>
<td>Not computed in GPA</td>
</tr>
<tr>
<td>S</td>
<td>Satisfactory</td>
<td>Not computed in GPA</td>
</tr>
<tr>
<td>U</td>
<td>Unsatisfactory</td>
<td>Not computed in GPA</td>
</tr>
<tr>
<td>IP</td>
<td>In Progress Grade</td>
<td>Not computed in GPA</td>
</tr>
</tbody>
</table>

1 These grades are used for approved courses only.

To calculate your GPA:
1. Multiply the number of credit hours earned in each class by the points assigned to the letter grade
2. Add the points of all classes
3. Divide by the total number of credits

Example

<table>
<thead>
<tr>
<th>Course Number</th>
<th>Course Title</th>
<th>Grade</th>
<th>Credit</th>
<th>Grade Points/ Letter</th>
<th>Total Grade Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>ENG 101</td>
<td>College Composition I</td>
<td>A</td>
<td>3</td>
<td>x 4</td>
<td>12</td>
</tr>
<tr>
<td>FRE 101</td>
<td>Beginning French I</td>
<td>B</td>
<td>4</td>
<td>x 3</td>
<td>12</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>24 grade points</td>
</tr>
</tbody>
</table>

Your GPA = Grade Points/Credits = 24/7 = 3.4 GPA

Continuing Education Units (303.7)

Continuing Education Units (CEUs) may be awarded for participation in individual and professional development courses, workshops and seminars. One CEU typically represents ten contact hours of participation in an organized continuing education experience under responsible sponsorship, capable direction and qualified instruction as approved by the Vice President for Academic Affairs. CEUs provide students with a standard of measurement to quantify their education experience. CEUs also provide recognition of one’s efforts to broaden his or her knowledge, skills and experiences by establishing a permanent record of educational history.

Incomplete Grades (303.5.3/303.5.4)

A grade of ‘I’ may be requested by a student only at the end of a semester in which the student has done the following:
• Averaged a grade of "C" or better in at least 80% of the work required for the course
• Presented a case documenting circumstances which prevent completion of the course requirements by the end of that semester
• Entered into the Contract for Incomplete Grade.

Instructors can obtain the appropriate form from the registration office.

All contracts must be reviewed and approved by the Extension Site Coordinator, Division Chair, or appropriate Dean. It is the exclusive responsibility of the student receiving a grade of "I" to contact the instructor and complete the course. A Contract for Incomplete Grade will not exceed one regular semester following its approval. "I" grades issued during a summer session must be completed by the end of the following fall semester. Upon completion of course work outlined in the contract, the instructor will initiate a Change of Grade form. If the instructor is no longer available, the student should contact the Extension Site Coordinator, Division Chair, or appropriate Dean. If the work required is not completed the semester following the approval of the contract, the grade specified on the contract will be posted to the student’s permanent record.

In-Progress Grade (303.5.5)

In cases where circumstances warrant, the instructor may assign an "IP" grade. An "IP" grade is not to be used in place of an "I" grade. The "IP" grade is used where it is known at the time of registration that class completion will require work in excess of a single semester or session. An "IP" Grade Contract, available at the registration office or from a faculty secretary, should be completed by the instructor and the student. The contract must have definite starting and ending times. The "IP" Contract must be approved in advance by the Extension Site Coordinator, Division Chair, or
appropriate Dean. Once the contract is successfully completed, the "IP" grade will be changed to a letter grade assigned by the supervising faculty.

Satisfactory/Unsatisfactory Grades (303.5.6)

If a course description in the College Catalog indicates a course may be taken for an "S/U" grade, the student may elect the S/U option. A S/U Grade contract, available at the registration office, must be completed, with the consent of the instructor, no later than the deadline to add classes as published in the appropriate Schedule of Classes. The deadline to add classes is also the deadline to change from an S/U to A-F or Audit status. Students electing the S/U option should be aware that:

- Once awarded, the "S" or "U" grade may not be changed to a letter grade.
- The "S" grade may carry credit toward graduation or toward meeting professional requirements.
- The "S" grade shows on the transcripts as credit hours earned for the semester and will be used toward meeting the credit hours required of a full-time student and toward determining Financial Aid eligibility. Refer to CCC policy (303.13.8) as stated in this catalog.
- The "U" grade shows on the transcript but not as credits earned for the semester; therefore, the "U" grade does not count toward meeting the hours required of a full-time student or toward determining Financial Aid eligibility.
- Courses taken for S/U credit for which a grade of "S" is earned will satisfy prerequisites.

Grade Appeals and Other Course Requirement Decisions (303.6)

Students may appeal a grade or other decision pertaining to completion of course requirements through administrative procedures. These procedures will be determined by the College President after consultation with faculty and administrators.

Students may appeal a grade or other decision affecting completion of course requirements as follows:

- Students must represent themselves in the appeal process, i.e. third parties will not be permitted to represent students
- Potential intervention by third parties or examination of educational records is subject to the Family Educational Rights and Privacy Act of 1974 as amended. Questions or clarification regarding educational records should be directed to Admissions and Records.
- Students must first appeal through informal procedures as noted in the Student Handbook before initiating formal procedures. Formal procedures may be initiated only for final course grades. Refer to CCC policy (308.6.4.C) as stated in this catalog.

Timelines for Appeal (303.6.3)

Students who fail to initiate an appeal within the timelines defined below forfeit their right to appeal:

- Non-final grades and other decisions within twenty business days from the date the grade was assigned or other decision made, or twenty business days from the date the student learned of the assigned grade or decision.
- Final course grades within four months following course completion.

Methods for Appeal (303.6.4)

Appeal customarily begins (and often ends) with a discussion between the student and the instructor, leading to a mutually satisfactory understanding. If such understanding is not reached, the student may then appeal to the responsible Extension Site Coordinator, Department Chair or appropriate Dean.

The responsible Extension Site Coordinator, Department Chair, or appropriate dean will meet with the student and the instructor and make a reasonable attempt to mediate a mutually satisfactory understanding.

If such understanding is not reached, the student may then contact the Registrar's office within 20 business days and begin the formal process for appeal to the Student Academic Appeals Committee.

The Registrar will be responsible to contact the members of the Student Academic Appeals Committee and set up a hearing.

The membership of the Student Academic Appeals Committee will consist of 3 students, 3 faculty and 3 non-academic college staff, including the Registrar. Their goal will be to determine the most appropriate action to be taken when students appeal a grade. In order to best accomplish this, the committee will adhere to the following guidelines:

- No member of the Student Academic Appeals Committee who has a personal interest in the particular case will be permitted to sit in judgment during the proceedings.
- The Student Academic Appeals Committee shall allow an initial presentation by the student and then by the instructor involved (if necessary), after which it may call such other witnesses, as it deems necessary.
- The student and instructor will be given every reasonable opportunity to present their case.
- Both the student and the instructor shall have the right to be present during the presentation of any testimony before the Student Academic Appeals Committee.
- Student Academic Appeals Committee hearings shall be closed to all but the parties involved.
Academic Standards and Procedures

- The burden of proof shall be on the student.
- The Student Academic Appeals Committee’s final decision in any particular case must be based solely upon testimony and other evidence given to the Student Academic Appeals Committee in that case.

Student Responsibility (303.6.5)
The Student can obtain a Grade Appeal Form from the Registrar’s Office for the purpose of the hearing, the student must provide written information regarding:

- The nature of the appeal, specifying the grade, relevant conditions about the issue, and any descriptive evidence of major significance.
- The reasons for the appeal, including any evidence which supports the student’s belief that the grade was unfairly or incorrectly assigned, unsubstantiated by evidence, inaccurate, or otherwise unreasonable.
- A solution acceptable to the student.
- A completed Grade Appeal Form, attached to the documentation.

The Registrar will inform the student of the hearing with reasonable notice.

After the hearing, the Student Academic Appeals Committee will render a decision, which may confirm or alter the final course grade. The decision of the Student Academic Appeals Committee is considered final. The Registrar will communicate the decision to the student and the instructor in writing via certified mail within 20 days of the decision. All pertinent documentation shall become part of the student’s permanent file.

Graduation Procedures (303.13)

Application for Graduation (303.13.1)
Students who believe they will be eligible to graduate with a CCC degree or certificate at the close of Fall semester must consult their Academic advisor and submit an application for graduation no later than the first Monday of October. Summer and spring semester applications for graduation must be completed no later than the first Monday of March. A choice of catalog must be declared at the time of application, refer to Catalog Choice Procedures (501.5) in this catalog. All required documents, including official transcripts, must be submitted to the Admissions and Records Office by the stated deadline for each session. A nonrefundable fee of $15 for each certificate and $25 for each degree is required to initiate a graduation check. The graduation application initiates the graduation check procedure, completed by the Admissions and Records Office, to ensure that all requirements are met by the graduation semester.

College Reading Requirement (303.13.2)
Students applying for graduation in an Associate Degree program must have demonstrated successful completion of the College Reading requirement by one of the following:
- College assessment
- Successful completion of English 141—Critical Reading
- “C” or above in a reading intensive course as identified in the College’s General Education Core Curriculum (GECC) and/or Arizona General Education Curriculum (AGEC).

Commencement Ceremonies (303.13.3)
Procedures for participation in commencement ceremonies will be announced the semester prior to the ceremony. Spring commencement will include students who have been awarded degrees the prior summer and fall semesters and candidates for spring degrees. Students requiring 6 or fewer credits to be eligible for graduation and will complete those credits during the summer session following the annual commencement ceremony may apply for graduation and participate in the commencement ceremony. Upon final degree clearance, an official College diploma or certificate will be issued either by mail or the student may pick up their degree or certificate at the registration office. Refer to the Application for Graduation.

Courses Numbered Below 100 (303.13.4)
Only students graduating with an Associate of General Studies Degree may count courses numbered below 100 toward graduation. A maximum of 12 credits may be completed in courses numbered below 100.

Graduation Requirements (303.13.5)
The requirements to earn each CCC degree and certificate are detailed in the Degrees and Certificates section of this catalog. Requirements are also summarized below. Degree and certificate-seeking students are advised to work closely with their academic advisor to ensure that they are making appropriate progress toward fulfilling graduation requirements.

Minimum CCC Hours (303.13.6)
To graduate from CCC, a student must complete a minimum number of credit hours at CCC with a “C” or better.
- To earn an Associate of Arts, Associate of Business, Associate of Science, Associate of Applied Science, or Associate of General Studies degree the student must successfully complete at least 15 credit hours of CCC coursework applicable to the degree.
- To earn a certificate, the student must successfully complete at least one-third of the required credit hours in CCC coursework applicable to the certificate. Refer to Transfer Procedure (501.7.2) in this catalog.
Minimum Grade Point Average (303.13.7)
No student may graduate with a cumulative CCC grade point average of less than 2.00. Students completing a transfer degree (Associate of Arts, Associate of Business, or Associate of Science degree) must complete all courses with a grade of "C" or better.

S/U Grades (303.13.8)
A maximum of 12 credits may be completed with a grade of "S" in applicable associate degree programs. No more than 3 credit hours of "S" may count for the certificate if the program allows. Refer to Grading Procedures (303.5.6) in this catalog.

Special Topics Courses: 298 (303.13.9)
A limited number of credits earned in Special Topics (298) courses may count toward meeting graduation requirements, depending on the degree. Students should consult with their academic advisor prior to arranging for Special Topics courses. Refer to Special Topics (303.10) in this catalog.

Waiver or Substitution of Program Requirements (303.13.10)
Students may request a substitution of graduation course requirements. Program substitution requests will be evaluated on a case-by-case basis as recommended by the academic advisor or other College officials, and approved by the appropriate Division Dean for the Flagstaff Campus or Campus Dean for the Page Campus.

Graduation with Honors (303.13.11)
Students graduating with a degree who complete at least 30 credits at CCC, and whose grades qualify will be granted the following designations:
- Cum Laude 3.40 to 3.69 Cumulative CCC GPA
- Magna Cum Laude 3.70 to 3.89 Cumulative CCC GPA
- Summa Cum Laude 3.90 to 4.00 Cumulative CCC GPA

Students graduating with a certificate who complete at least 15 credits at CCC, and whose grades qualify will be granted the following designations:
- Honors 3.50 to 3.89 Cumulative GPA
- High Honors 3.90 to 4.00 Cumulative GPA

These designations will be shown on the student’s diploma and on official transcripts.

Scholastic Honors (303.13.12)
Students who complete at least 6 credits during a semester and whose grades qualify will be granted the following designations:
- Vice Presidents' List 6 or more credits per semester 3.50 to 3.99 Semester GPA
- President's List 6 or more credits per semester 4.00 Semester GPA

Placement and Prerequisites (501.4)
Belief and Purpose (501.4.1)
Coconino Community College believes academic achievement is directly related to the course placement students receive prior to their enrollment. We are committed to providing our students with opportunities for a successful academic experience.

The purpose of the course placement policy is to enhance student success by requiring placement in English, mathematics, Spanish and reading. Placement is designed to help students determine their current skills and knowledge levels, and to direct them to the appropriate classes.

Requirements (501.4.2)
Students will be required to complete placement assessments under the following conditions:
- The student is taking his/her first college credit in English or mathematics, with the exception of MAT 055.
- English and mathematics placement testing and the reading assessment should be completed prior to the first semester of enrollment. The English, mathematics, and reading requirements should be pursued in each subsequent semester until those requirements are fulfilled. See Graduation Procedures for more information.
- The student is degree seeking and does not have previous college credit in English, reading, or mathematics. (Degree-seeking students will not be allowed to enroll in classes after completion of 18 hours if they have not taken appropriate placement tests and completed the reading assessment.)
- Transfer students who completed prerequisite courses more than five years prior to the semester in which prerequisite proof is required must take CCC Mathematics and English placement tests.
- The student is enrolling in a first semester Spanish class.

Exemptions (501.4.3)
Students may be exempt from the placement test if at least one of the following conditions applies:
- The student has already earned at least an Associate’s degree.
- The student has earned transferable college credits in English, mathematics and/or reading, with a grade of "C" or better within the five years previous to date of enrollment.
- The student has earned transferable college credits in Spanish with a grade of "C" or better within the 2 years previous to the date of enrollment.
- The student has a record of previous placement assessment at CCC.
- The student has provided SAT or ACT scores.
Course Placement (501.4.4)
A student’s score on a CCC’s placement test, the SAT, or ACT, determines his/her placement in a specific course. This placement should be discussed with an advisor who is skilled in assessing the student’s need in the context of factors that affect student success.

CCC course placement in mathematics and English based on ACT or SAT scores:

<table>
<thead>
<tr>
<th>Subject</th>
<th>ACT</th>
<th>SAT</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Scores</td>
<td>Scores</td>
</tr>
<tr>
<td></td>
<td>≤ 14</td>
<td>≤ 320</td>
</tr>
<tr>
<td>Mathematics</td>
<td>15–16</td>
<td>330–400</td>
</tr>
<tr>
<td></td>
<td>17–20</td>
<td>410–520</td>
</tr>
<tr>
<td></td>
<td>21–24</td>
<td>530–600</td>
</tr>
<tr>
<td></td>
<td>25–26</td>
<td>610–640</td>
</tr>
<tr>
<td></td>
<td>≥ 27</td>
<td>≥ 650</td>
</tr>
<tr>
<td>English</td>
<td>20+</td>
<td>420+</td>
</tr>
</tbody>
</table>

Appeal (501.4.5)
The final decision for student success rests with the student. Therefore, if the student wishes to appeal the placement decision, the student must see an advisor and must complete a Register Against Advisement form. The waiver is subject to approval by an advisor. If approved, the Waiver will be kept in the student’s official academic record in Admissions and Records.

Implementation of Policy (501.4.6)
To ensure consistency of student placement within the Coconino Community College District in the implementation of this policy, the following will apply:
• All sites shall use the same assessment instruments or their equivalents
• All sites shall adhere to the same cut-off scores
• Placement scores will be valid for two years from the date of the original assessment
• The student will be permitted no more than one re-test per discipline each semester
• Copies of placement test results will be kept on file in the Registrar’s Office

Proficiency Tests (501.4.7)
Proficiency Tests are designed to help students determine their preparedness for taking specific courses. Check the Schedule of Classes or the Testing Services web site at www.coco.cc.az.us/~lec/testing/default.htm for test dates and times.

1. Business English
All students who wish to enroll in the BUS 204 (Business Communications) course must have completed ENG 101 (College Composition I) and either BUS 111 (Business English) or satisfy appropriate placement on the Business English Proficiency Test. This test is an option for students who do not wish to take BUS 111.

2. Emergency Medical Services
The Department of Health Services requires the following prior to registration for EMS 131:
• 18 years of age or older (picture ID required)
• Current “Health Care Provider” CPR Certification
• Passing score on the CCC administered reading placement test for EMS
• Evidence of MMR vaccination
• TB test within six months of the start of class

Students taking courses at the Page campus and performing clinicals at the Page hospital will also require to provide the following:
• Current Hepatitis-B vaccination
• Proof of current health insurance

Course Prerequisites
Prerequisites are listed below the class in the Schedule of Classes, as well as in the Course Descriptions in this catalog. A prerequisite may be an appropriate placement test score, a class or classes that precede the class in question; skills; or consent of instructor. A course taken to satisfy a prerequisite must be completed with a grade of 'C' or better. A student will not be allowed to enroll in a course, that requires a prerequisite unless he/she has presented evidence of having satisfied that prerequisite. Evidence includes CCC mathematics or English placement test scores, appropriate ACT/SAT scores, a copy of transcripts or a grade report showing completion of an appropriate prerequisite course, or consent of instructor. Students seeking to prove prerequisites with evidence such as transcripts, grade reports, or score reports, must submit their evidence in person or with their mail-in registration. An audited course will not satisfy the prerequisite for a course in which the student wants a letter grade. The College reserves the right to require official transcripts or other documents if the evidence presented by the student does not clearly prove that course prerequisites have been met. Students who completed prerequisite classes or tests more than five years prior to the semester in which prerequisite proof is required must take CCC mathematics and English placement tests.

Repeating Courses (303.9)
Credit bearing courses at CCC will only be counted once toward fulfilling the credit requirements for any degree or certificate.

Students may repeat up to four times:
• Courses for credit in the case of music and dance performance, art studio, physical health and wellness, creative writing, and foundation courses needed to raise skill levels necessary for success in college-level work.
Students may repeat a course as necessary:
- in order to acquire certification
- in order to update knowledge and/or skills due to periodic content changes (e.g. Tax Preparation)
- for retraining in or upgrading of job-related skills

Students may repeat, but not receive duplicate credit for:
- a course one time in order to improve a grade of C or better
- a course two times for which the previous grade(s) received was "F," "D," or "U"

Only the higher grade(s) will be used in computing the grade point average. All grades will be posted on the permanent record and transcript.

A student may be allowed to repeat a course beyond the limit with recommendation from the appropriate Extension Site Coordinator, Department Chair, or appropriate Dean, and approval of the Vice President of Academic Affairs.

Repeating In Violation of Policy
A student found to be repeating a course in violation of this policy will have registration for the course canceled, without refund of tuition and fees. Such cancellation may occur at the time of registration or whenever a college official becomes aware of the violation. Refer to Repeating Courses Procedures (303.9) in this catalog.

Second Degree Policy
Upon completion of an Associate of Arts, Associate of Business, Associate of Science, Associate of Applied Science, or Associate of General Studies degree from CCC, a student who wishes to pursue an additional degree other than Associate of General Studies must meet the following criteria:
- Students must meet the requirements of that degree as outlined in the Catalog in effect at the time of initial enrollment in the new degree program.
- Students must complete a minimum of 24 credits beyond those previously earned in the awarded degree.
- Credits applied to the new degree must have been completed with grades of "C" or better.
- The Associate of General Studies will not be awarded as a second degree.

Special Topics Courses: 298 (303.10)

Basic Guidelines (303.10.1)
Special Topics courses are intended to:
- Allow students opportunities for academic learning beyond what the College provides in its regular curriculum.
- Allow students to design a special academic course to meet a special need that the College does not otherwise meet. Usually this study will be more advanced or specialized than the regular 2-year college curriculum, and can be taken only after a student has completed the introductory courses in the discipline of interest.

Special Topics courses are not intended for: (303.10.2)
- Transfer to a university, 4-year, or 2-year college, although they "may" be accepted elsewhere.
- Credit for prior experience or learning.
- Developmental studies or non-college credit activities.
- Cooperative job placements, work study, internships or similar activities if the course activity is part of routine job responsibilities and the work is not directly supervised by a faculty member.
- Individualized study of a course in the college catalog. Special Topics courses are studies outside our catalog offering. (Independent Study allows students in special cases to take a course from our college catalog individually.)

Rules/Limits/Deadlines (303.10.3)
- A student may register for up to six credit hours of Special Topics courses each semester or summer session.
- A limited number of credits earned in Special Topics courses may count toward meeting graduation requirements. See Graduation Procedures for more information.

Enrolling in a Special Topics Course (303.10.4)
To enroll in a Special Topics course, the student must:
- Decide on a Special Topic.
- See an advisor.
- Complete a proposal for Special Topics courses. See Student Proposal Guidelines for more information.
- Identify a faculty member who has knowledge/expertise in the area to be studied. The student must complete the contract form and send it with the faculty signature, along with the proposal, to the Division Chair or appropriate Dean for approval.

Student Proposal Guidelines (303.10.5)
The proposal provided to faculty members should include a detailed description of the project and the following information:
- Area of subject the student intends to study.
- Method of study the student proposes to use.
- Explanation of why the student is interested in proposing this course.
- Description of the course objectives (e.g. What does the student hope to learn by taking this course?)
- Timeline for the completion of the course.
Student Rights and Responsibilities (503.1)

To obtain a full text copy of the Student Code of Conduct, contact the Vice President for Student Services or go to the College’s web site at www.coconino.edu.

All students at Coconino Community College are considered to be responsible adults. Therefore, they are accountable for their own personal behavior. The College expects all students to obey local, state, and federal laws and conform to the College’s standards of conduct.

Students enrolled at Coconino Community College are responsible for abiding by the laws governing the College and are expected to observe standards of conduct set by the College. The College receives its authority to set conduct standards under the policies of the State Board of Directors for Community Colleges of Arizona. These policies, in turn, are guided by laws enacted by the Arizona State Legislature.

Administrative procedures relating to student conduct, disciplinary action, and involuntary withdrawal will be determined by the President in consultation with appropriate administrative staff, faculty and students. Procedures will be followed to ensure due process should a student violate a college rule or regulation not directly involving academic performance and achievement. The College President is expressly authorized to enforce the rules set forth under the “Student Code of Conduct.”

Assuming Self-Responsibility (503.1.1)

Self-responsibility entails respect for student rights, eliminating blame, acknowledging mistakes, working toward constructive change, and challenging injustice and unethical acts of others. As a member of the campus community, students are expected to be responsible for themselves, to assist others in accepting their responsibilities, and to help make the college community a better place.

Statement of Commitment to Students (503.1.2)

The mission of Coconino Community College is to promote student success through comprehensive learning opportunities for its community.

Student Code of Conduct (503.1.3)

Coconino Community College offers its students the opportunity to learn in an environment where individual rights are respected. As in any group situation, respect for individual rights is best achieved when each group member acts in ways that are reasonable and responsible. Conduct is expected to be consistent with the learning environment and is subject to standards set by the College.

The Student Code of Conduct is designed for the promotion and protection of such an environment at the College and to balance the rights and needs of the individual with the responsibility of the individual to the college community.

Listed below are the behaviors that may lead to college disciplinary actions or possible dismissal:

- Conviction of a crime or continued misconduct of any type that is an infraction of the established laws of the city, county, state or nation.
- Possession, use, solicitation, or distribution of intoxicating liquors, narcotics, controlled substances or illegal drugs on college-owned or controlled property.
- Theft or conversion of college-owned or personal property, possession of stolen property, or unauthorized entry into college-owned or controlled property.
- Malicious destruction of college or personal property.
- Endangering or threatening the life or physical safety of others or self, including detention or physical abuse of any person.
- Failure to meet financial obligations to the College.
- Falsification, misuse, or forgery of college records or documents including the Student ID card.
- Knowingly furnishing false or incomplete information to the College or to a college representative or official in response to an authorized request, including a legitimate request by an identified college official, that a person identify him/herself.
- Possession or use of firearms, explosives, dangerous chemicals, or other dangerous weapons or instruments on college-owned or controlled property except as expressly authorized by the law or by institutional regulation.
- Behavior that interferes with the orderly functioning of the College, interferes with an individual’s pursuit of an education, or disrupts the learning environment on college-owned or controlled property or during an authorized college class, field trip, seminar, or other meeting, or college-related activity on or off college property.
Directory of College Personnel
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## Associate Faculty

Coconino Community college employees part-time associate faculty who contribute to the riches and breadth of the instructional program. Because of the large number of associate faculty employed, the faculty listed below are those who taught in the previous academic year. Information regarding associate faculty may be obtained from the Human Resources Department.

<table>
<thead>
<tr>
<th>Name</th>
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<tbody>
<tr>
<td>Aaron N Saxton</td>
<td>Claudia L Platt</td>
<td>Elizabeth Scroggs</td>
<td>Janell L Hibbs</td>
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<td>Aaron P Groenewold</td>
<td>Colleen R Stewart</td>
<td>Elizabeth M Kidd</td>
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<td>Abbie L Martin</td>
<td>Craig Ingraham</td>
<td>Elena C Gonzales</td>
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<td>Alan Kelso</td>
<td>Cynthia A Bruner</td>
<td>Emily J McRobbie</td>
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<td>Alan Spiegler</td>
<td>Daniel McMillan</td>
<td>Enriqueta Claudia Serrano</td>
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<td>Daniel R Serpas</td>
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<td>Allyn L Watson</td>
<td>Danny Lawler</td>
<td>Ester S O Fearghail</td>
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<td>Amy S McBroom</td>
<td>Danny K Blackgoat</td>
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<td>Amy T Dohm</td>
<td>Darcy Lynn Falk</td>
<td>Eva P Ross</td>
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<td>Ana M Novak</td>
<td>David Delmar</td>
<td>Felicia Hendricks</td>
<td>Jill M Divine</td>
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<td>Andrea L Stalker</td>
<td>David A Gaspar</td>
<td>Fleur L Darby</td>
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<td>Ann M Pertuit</td>
<td>David E Manning</td>
<td>Flor M Lozano</td>
<td>JoAnn Mosier</td>
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<td>Anne E Minard</td>
<td>David M Purkiss</td>
<td>Frank A Chavez</td>
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<td>Anne Marie Mackler</td>
<td>David R Johnston</td>
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<td>Art E Stendel</td>
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<td>Ashley A Johnson</td>
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<td>Bernard Gazdzik</td>
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<td>Bernice Austin-Begay</td>
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<td>Betty Lou Cummings</td>
<td>Deborah Aurelia Martin—</td>
<td>Georgiannne Y Farness</td>
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<td>Bonnie J Dent</td>
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<td>Breanna Rogers</td>
<td>Debra Sue Roundtree</td>
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<td>Denise J Thornley</td>
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<td>Carol Ann Gallegos</td>
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<td>Marilyn Loree Maszk</td>
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<td>Mark D Sherry</td>
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Professional and Classified Staff

Academic Affairs
Keith Becker, Evening College Assistant
William Branch, CISCO Coordinator
Barbara Cotherman, Administrative Specialist
Geraldine Finch, Tech Prep Administrative Specialist
Ted Fournier, Curriculum and Articulation Services Coordinator
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Theresa Naseyowma, Division Secretary (Arts/Science)
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Glenda O'Yates, Functional Systems Analyst
Ann Black, Tech Prep Coordinator
Patty Tuttle, Fourth Street Campus Coordinator
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Sandra Cruz, Office Specialist
Betty Leforce, Nursing Secretary

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Nanette Wolf, Office Assistant

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Jana Kelly, Office Assistant
Richard Martinez, Security Officer
Al Nichols, Security Officer
Thomas Snyder, Maintenance Technician
Larry Meyer, Maintenance Technician
Paul Wilkes, Lead Security Officer
Jeremy Lester, Security Officer

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George West, Office Automation Specialist
Brian White, Financial Aid Specialist

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Bess Goh, Human Resources Assistant
Betty LeForce, Human Resources Aid

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Keith Becker, Academic Computing Technician
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Juan Diego, Network Analyst
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Herb Klaus, Functional Systems Analyst
Matt Goodwin, PC Technician

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Susan Stokes, Functional Systems Analyst
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Rebecca Warfield, Functional Systems Analyst
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Carlos Begay, Modern Languages Learning Assistant
Chris Black, Math/Science/Accounting Learning Specialist
Holly Oakleaf, Math/Science/Accounting Learning Assistant II
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Kevin Elston, Computer Lab Learning Assistant
Joe Pino, Information Resource Center Learning Assistant
Patty Gibbs, Receptionist
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Naomi Phillips, Purchasing Assistant
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Gary Sager, Retention and Advising Services Coordinator
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