Colorado State University Pueblo

2016-17 Catalog

www.csupueblo.edu/catalog

UNIVERSITY CALENDAR 2016-2017
Colorado State University-Pueblo

FALL AND SPRING SEMESTERS

Regular academic semesters consist of 15-week terms, including official holidays and the final examination period. Specific information about each academic semester is available prior to the beginning of each semester in the Semester Notes posted on our University web site at: http://www.csupueblo.edu/Records/SemesterNotes/Pages/default.aspx

ORIENTATION SCHEDULE

New first-year and new transfer students must attend orientation. Please view orientation sessions and dates at: http://www.csupueblo.edu/StudentLife/Orientation.

FALL   2016

Registration Begins	March 7
Classes Begin	Aug. 22
End Add Period (full-term courses)	Aug. 26
End Drop Period (full-term courses)	Sept. 5
Fall 2016 Graduation Contract Due	Sept. 16
End of Full-term Course Withdrawal Period	Oct. 21
Thanksgiving Break	Nov. 21 - 25
Classes End	Dec. 2
Final Exams	Dec. 5 - 9

SPRING   2017

Registration Begins	Oct. 17 (16)
Classes Begin	Jan. 16
End of Add Period (full-term courses)	Jan. 20
End Drop Period (full-term courses)	Jan. 30
Spring 2017 Graduation Contract Due	Feb. 10
End of Full-term Course Withdrawal Period	March 17
Spring Break	March 20 - 24
Classes End	April 28
Final Exams	May 1 - 5
Commencement	May 6

Short-term courses in Fall and Spring have shorter course drop and withdrawal dates. These appear on the student schedule.

SUMMER COLLEGE

Summer College consists of multiple sessions. Specific information about Summer College is available prior to the beginning of the first session in the Semester Notes posted on our University web site at: http://www.csupueblo.edu/Records/SemesterNotes/Pages/default.aspx

SUMMER   2017

Registration Begins	Oct. 17 (16)

First 4, 6 and 12-week Sessions

Classes Begin	May 15
Memorial Day (University Closed)	May 29 (M)
Summer 2017 Graduation Contract Due	June 2
Classes End	
(First 4-week)	June 8
(First 6-week)	June 22
(12-week)	Aug. 3

Second 4-week Session

Classes Begin	June 12
Independence Day Holiday Observed (University Closed)	July 4 (Tu)
Classes End	July 6

Second 6-week Session

Classes Begin	June 26
Independence Day Holiday Observed (University Closed)	July 4 (Tu)
Classes End	Aug. 3

Third 4-week Session

Classes Begin	July 10
Classes End	Aug. 3

All individual Summer course drop and withdrawal dates appear on the student schedule.

Note: These Calendars are planned in advance and are subject to change.

Colorado State University-Pueblo
2200 Bonforte Boulevard
Pueblo, Colorado 81001

Telephone: (719) 549-2100
Web site: www.csupueblo.edu

An Invitation

You are cordially invited to visit the Colorado State University-Pueblo campus, meet members of the faculty and administration, and inspect the facilities of the university. Escorted tours of the campus will be provided on request. The administrative offices are open from 8 a.m. to 5 p.m. Monday through Friday. Please call or write the Visitor Center in advance of your visit: (719) 549-2418.

Colorado State University PUEBLO™

PARKING SECTORS

NORTH: N-1, N-2, N-3, N-4, N-5, N-6, N-7, N-8

EAST: E-1, E-2, E-3, E-4, E-5, E-6, E-7, E-8 (north & south), E-9, E-10, E-11

SOUTH: S-1, S-2, S-3, S-4

WEST: W-1, W-2, W-3, W-4, W-5, and W-6 (north & south)
*Visitors with permit may park in visitors lot or white lines only.

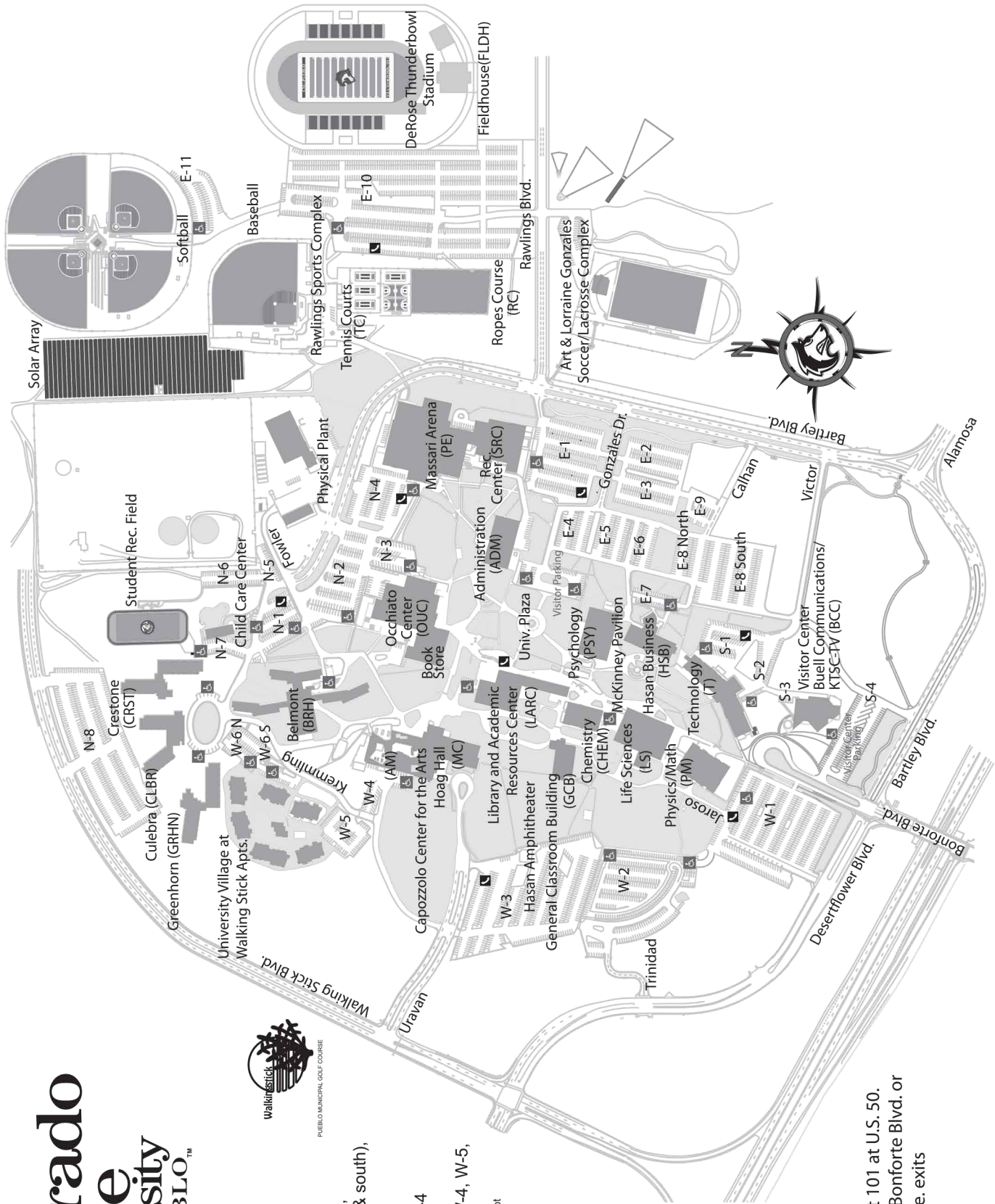Emergency Phones

Handicapped

WalkingStick
PUEBLO MUNICIPAL GOLF COURSE

I-25 Exit 101 at U.S. 50.
East to Bonforte Blvd. or Troy Ave. exits

2200 Bonforte Blvd. • 719-549-2100 • www.csupueblo.edu

Map labels

Solar Array

Softball
E-11
Baseball

Rawlings Sports Complex

Tennis Courts (TC)

Ropes Course (RC)

DeRose Thunderbowl Stadium

Fieldhouse (FLDH)

Rawlings Blvd.

E-10

Art & Lorraine Gonzales Soccer/Lacrosse Complex

Physical Plant

Student Rec. Field

Child Care Center

Massari Arena (PE)

Rec. Center (SRC)

Gonzales Dr.

E-1
E-2
E-3
E-4
E-5
E-6
E-7
E-8 North
E-8 South
E-9

Calhan

Victor

Alamosa

Bartley Blvd.

N-8
N-7
N-6
N-5
N-4
N-3
N-2
N-1

Fowler

Occhiato Center (OUC)

Administration (ADM)

Univ. Plaza

Visitor Parking

Psychology (PSY)

McKinney Pavilion

Hasan Business (HSB)

Technology (T)

S-1
S-2
S-3
S-4

Visitor Center
Buell Communications/
KTSC-TV (BCC)

Crestone (CRST)

Culebra (CLBR)

Greenhorn (GRHN)

University Village at Walking Stick Apts.

Book Store

Belmont (BRH)

W-6 N
W-6 S

Kremmling

W-4
W-5

Hoag Hall

Capozzolo Center for the Arts

Library and Academic Resources Center (LARC)

Hasan Amphitheater

General Classroom Building (GCB)

Chemistry (CHEM)

Life Sciences (LS)

Physics/Math (PM)

Jaroso

E-8 South

W-1
W-2
W-3

Trinidad

Uravan

Walking Stick Blvd.

Visitor Center Parking

Desertflower Blvd.

Bonforte Blvd.

Bartley Blvd.

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DIRECTORY

NOTE: 549- IS THE PREFIX FOR ALL NUMBERS

Any exceptions to the 549 prefix will be noted.

INFORMATION (GENERAL) 2100

FREQUENTLY CALLED OFFICE LISTINGS

A

DEGREE PROGRAMS

The following is a list of majors and degrees available at Colorado State University-Pueblo. Many of these majors include special emphases and many departments also offer minor programs of study. For more specific information please refer to the college and department sections of this catalog.

COLLEGE OF EDUCATION, ENGINEERING, AND PROFESSIONAL STUDIES

Athletic Training .... BS
Automotive Industry Management.. BS
Civil Engineering Technology..BSCET
Construction Management .... BS
Education ....M.Ed.
Engineering ....MS
Engineering with a Specialization in Mechatronics...BSE
Exercise Science, Health Promotion, and Recreation .... BS
Industrial Engineering...BSIE
Industrial and Systems Engineering ....MS
Liberal Studies .... BS
Nursing.. BSN, MS

Teacher Education Program

The Teacher Education Program collaborates with other academic units to offer program leading to Colorado teacher licensure in the following endorsement areas:

Art (K-12)
Elementary Education (K-6)
English (7-12)
Foreign Languages (Spanish 7-12)
Mathematics (7-12)
Music (K-12)

Physical Education (K-12
Science (7-12)
The following require an initial teaching license:
  Instructional Technology
  Linguistically Diverse
  Special Education

COLLEGE OF HUMANITIES AND SOCIAL SCIENCES

Art... BA, BFA
English ....BA, M.A.
Foreign Language-Spanish .... BA
History .... BA, BS, M.A.
Mass Communications .... BA, BS
Music .... BA
Political Science .... BA, BS
Psychology.. BA, BS
Social Science (offered through Extended Studies only)... BA, BS
Social Work ....BSW
Sociology... BA, BS

COLLEGE OF SCIENCE AND MATH

Biochemistry...MS
    3+2 Joint Degree Program ....BS + MS
Biology ....BS, MS
    3+2 Joint Degree Program ....BS + MS
Chemistry ....BS, MS
    3+2 Joint Degree Program ....BS + MS
Mathematics.. BA, BS
Physics.. BS

HASAN SCHOOL OF BUSINESS

GRADUATE MAJORS/EMPHASIS AREAS

The following is an alphabetical list of graduate majors and their emphasis areas that are available at Colorado State University-Pueblo. This list is subject to change.

UNDERGRADUATE MAJORS/EMPHASIS AREAS

The following is an alphabetical list of undergraduate majors and their emphasis areas that are available at Colorado State University-Pueblo. This list is subject to change.

MINORS

The following is a list of approved minors available at Colorado State University-Pueblo. This list is subject to change.

Minor   **Page**

CERTIFICATE PROGRAMS

Some departments offer certificates upon completion of certain programs. The University does not transcript certificates, so all records of the program completion and the issuance of the actual certificates are administered by the issuing department. The following is a list of approved certificates available at Colorado State University-Pueblo. This list does not contain any certificates given through Extended Studies. This list is subject to change.

HISTORY

Since its incorporation in 1933 as Southern Colorado Junior College to its current designation as a regional, comprehensive university, CSU-Pueblo has served the changing educational, economic development, and cultural needs of the citizens of Colorado.

1933-37   Southern Colorado Junior College
1937-63   Pueblo Junior College
1963-75   Southern Colorado State College
1975-2003   University of Southern Colorado
2003–Present   Colorado State University-Pueblo

MISSION

Colorado State University-Pueblo was established by state law:

There is hereby established a University at Pueblo, to be known as Colorado State University-Pueblo, which shall be a regional, comprehensive university with moderately selective admissions standards. The University shall offer a broad array of baccalaureate programs with a strong professional focus and a firm grounding in the liberal arts and sciences. The University shall also offer a limited number of graduate programs. (Colorado Statutes 23-31.5-101)

In April, 2005 the Board of Governors of the Colorado State University System adopted a complementary, focused mission statement for the University that stresses its distinctiveness and central commitments.

Colorado State University-Pueblo is committed to excellence, setting the standard for regional comprehensive universities in teaching, research and service by providing leadership and access for its region while maintaining its commitment to diversity.

In January 2016, the University also adopted a new vision statement. This statement further articulates the campus mission and strategic goals.

Colorado State University-Pueblo will enhance its reputation as a premier comprehensive regional university that offers a wide range of undergraduate degrees as well as specialized graduate degrees. As a federally designated Hispanic Serving Institution, CSU-Pueblo is committed to maintaining university accessibility which reflects southern Colorado's culturally and ethnically diverse student body, including first generation students. We will do so by offering excellent academics, affordable education, transformative opportunities, and supportive student life.

CSU-Pueblo will be distinguished by the integration of the liberal arts and sciences with professional preparations as well as an emphasis on experiential education that reflects skills and competencies needed in a global society.

CSU-Pueblo offers a wide array of undergraduate degree programs in the humanities, social sciences, sciences and math, education, engineering, nursing, business, and other professional areas. The University's educational focus is grounded in the traditional liberal arts and sciences, and addresses students' immediate and long-term educational needs. Students graduate with the knowledge necessary to enter their professions and with the problem solving, critical thinking, research, and communication skills required to keep current in those professions in the future.

Characteristic of regional comprehensive universities nationwide, CSU-Pueblo also offers selected master's degrees that meet regional and broad societal needs, including business, nursing, engineering, education, history and the sciences (biology, biochemistry, and chemistry).

As sister institutions, CSU-Pueblo and CSU in Fort Collins share many important values and commitments, even while they pursue different missions—CSU in Fort Collins as a large research, doctoral degree granting university and CSU-Pueblo as a small comprehensive, master's degree granting university. Both universities are committed to excellence and strive to set the quality standards for their types of institutions. Both have excellent undergraduate and graduate programs that serve the citizens of Colorado through teaching, research, and service. Both universities promote civic engagement, freedom of expression, innovation, environmental sustainability, inclusiveness and diversity, integrity and mutual respect, and both are committed to employing a student-centered focus, providing opportunity and access, and being accountable.

High-quality teaching and learning are Colorado State University-Pueblo's highest priorities. In recent years, program offerings have been expanded, new teaching and learning methods—especially those involving active, applied learning and technology—have been incorporated into all programs, faculty have strengthened their scholarly activities to stay current in their fields of expertise, and effective student academic support services (e.g., advising, learning centers, career planning) are readily available. As a result, CSU-Pueblo offers comprehensive and effective learning experiences that meet the many needs of our students.

The University is similarly committed to expanding access to higher education, especially for Colorado citizens. It has expanded its recruitment, admissions and financial aid

resources, as well as its evening and extended studies offerings, to provide high quality educational opportunities for a broader student population. It also works closely with other public institutions in the state to smooth the transfer process for incoming, outgoing, and dual enrollment students.

CSU-Pueblo's success in fulfilling its mission to be an educational resource for the state's diverse population is documented by the characteristics of our student body. We have a diverse student body including traditional and non-traditional students, campus-based and community-based students, students from Colorado and from foreign countries, first-year and transfer students, students fresh out of high school, students who are working professionals with families to support, and students of many different ethnicities and cultures. The University is strongly committed to providing access to members of all minority groups, particularly the Hispanic populations within its service area, emphasizing and fostering cultural pluralism, enhancing the traditions of culture and language, encouraging the development of economic opportunities, providing appropriate academic support programs, and ensuring equal opportunity for all persons who are, or may become, members of the university community. Indeed, because more than 25 percent of our students are Hispanic (31 percent in Fall 2015), the Federal Government has designated CSU-Pueblo as an Hispanic Serving Institution.

The high level of diversity in our learning community coupled with excellent academic and student life programs prepare our graduates well for the complex professional and personal lives that define modern society. Our graduates have proven their ability to transcend society's socioeconomic, educational, and cultural barriers by successfully entering professional occupations and graduate programs as highly informed and engaged members of their communities.

As a regional comprehensive university, CSU-Pueblo takes a leadership role in enhancing the overall quality of life and economic growth in southeastern Colorado. Faculty, staff, and students provide and benefit from a wide array of community services including cultural and educational events and programs, clinical and health resources, student internships, workshops, consultations, and research on community and business problems. In partnership with other community organizations, the University has committed its time and talents especially to initiatives aimed at enhancing economic development, pre-kindergarten through high school educational opportunities, and a variety of cultural activities.

In summary, the University's statutory and focused mission statements guide the development of its comprehensive curriculum and degree programs, the implementation of its high academic standards, the broad

accessibility that students have to its resources, and its active involvement in service to the regional community. Directed by its clear mission-based commitments and energized by its fine faculty, staff, and students, Colorado State University-Pueblo strives for excellence in all of its activities.

THE CAMPUS

CSU-Pueblo spans more than 275 acres on the northeast edge of Pueblo, a culturally diverse city of nearly 110,000 in the colorful Pikes Peak region of southern Colorado. Located on the Front Range of the Rocky Mountains, the University enjoys an average of 320 days of sunshine each year. From sailing on Lake Pueblo, mountain biking on the miles of nearby trails, whitewater rafting on the Arkansas River or skiing and snowboarding in the nearby mountains, the University's 4,200+ students enjoy a wide range of outdoor activities. The Student Recreation Complex (2007) houses the Outdoor Pursuits Program, which provides outdoor gear such as mountain bikes, kayaks, tents, backpacks and other camping and climbing gear to students at nominal prices, as well as classes on how to use that equipment, and frequent trips to provide opportunities to test those skills.

With an emphasis on student life, our Occhiato University Center houses the Office of Student Engagement and Leadership, the Associated Students' Government, and dozens of other student clubs and organizations to serve every interest. Concerts, movies, speakers, comedians and stage plays and musical performances are a regular feature at the many venues on campus and an artificial turf student recreation field hosts intramural and pickup games of flag football, soccer, lacrosse and more.

We offer a wide variety of housing options to serve student needs and interests. We have both traditional residential facilities and town house living accommodations for our upper classmen and have the ability to house close to 1500 students. Our housing programs offer vibrant activities, programs with services that enhance the students' undergraduate experience. Support services such as tutoring, advising, referrals, study services and a multitude of engagement opportunities enable our residents to have a safe and fulfilling collegiate experience and make it easier to achieve success in their educational programs. It is common to see faculty lead programs and interactions with residents, while others take advantage of lounges, exercise facilities, computer labs, basketball courts, a bistro and other amenities that make their residential experience a home away from home.

The campus landscape has changed dramatically in the last decade with renovations to its athletic and academic facility (Massari Arena) and a $25 million makeover to the University Library as well as construction of a Student Recreation Center, Student Recreation Field, the Neta and

Eddie DeRose ThunderBowl football and track stadium, a three-part residence hall complex, an enhanced soccer/lacrosse complex, and a $16 million General Classroom Building. Construction is in progress on a $35 million major renovation and expansion to the Occhiato University Center.

The Neta and Eddie DeRose ThunderBowl (2008) houses intercollegiate programs in football, men's and women's cross country and track and field. Basketball, volleyball, and wrestling programs compete in Massari Arena, while the baseball and softball programs reside in the Rawlings Sports Complex. The Art and Lorraine Gonzales Stadium for soccer and lacrosse officially opened in Spring of 2016.

GOVERNANCE

CSU-Pueblo is governed by the Board of Governors of the Colorado State University System, which also governs Colorado State University in Fort Collins and CSU-Global. The Colorado Department of Higher Education, the central policy and coordinating board for all public institutions, establishes policy on legislative, academic, and fiscal matters.

On matters delegated to the University, CSU-Pueblo is committed to a system of shared governance in which faculty, staff and students are engaged in setting the agenda for the University and in making decisions about how best to reach our goals and fulfill our mission. The President is assisted by a University Leadership Team which consists of the Provost, the Vice President for Finance and Administration, Deans, and representatives from the Classified Staff, Administrative Professional Council, and Faculty Senate, among others.

ACCREDITATION

Colorado State University-Pueblo is accredited by the Higher Learning Commission, a Commission of the North Central Association of Colleges and Schools, 30 N. LaSalle St., Suite 2400, Chicago, IL, 60602-2501, Phone (800) 621-7440.

Individual programs approved by specialized accreditation agencies include: athletic training, the Commission on Accreditation of Athletic Training Education (CAATE); chemistry, the American Chemical Society; civil engineering technology, the Technology Accreditation Commission of ABET; industrial engineering, the Engineering Accreditation Commission of ABET;

engineering, the Engineering Accreditation Commission of ABET; education, the Colorado State Board of Education and the Teacher Education Accreditation Council; music, the National Association of the Schools of Music; nursing, Accreditation Commission for Education in Nursing (ACEN); and social work, the Council of Social Work Education (CSWE). The Hasan School of Business is accredited by the Association to Advance Collegiate Schools of Business (AACSB) International.

CLOSURE

In the case of extreme weather conditions, energy resource reductions, or situations impacting normal operating conditions, it may be necessary to curtail or shut down university operations. Decisions regarding campus closures will be made as early as possible. Closure decisions impacting on-campus and off-campus evening classes (i.e., Tower and Ft. Carson locations) will be made by 3 p.m. Even if conditions improve, a closure decision remains in effect for the time period specified. Announcements of class cancellations beyond an overall campus closure are the responsibility of individual instructors.

The Executive Director of External Affairs is responsible for notifying local and regional radio and television stations of campus closures through the Flashnet Media Service. Students and staff may access closure messages for the University and other area entities by logging on to http://www.flashnews.net/rocky.html and clicking on *View Current Info* or signing up to receive text message notification.

To receive text message notifications, students can simply sign on to their PAWS Student Services account and register in the "Emergency Text" tab. Students will be prompted to verify or update their information to the service when they log onto PAWS Student Services to register for classes each term. Faculty and staff can simply sign on to the Employee Portal account and register in the "Emergency Text" tab. Faculty and staff can also fill out the *Emergency Text Messaging* form and send it to Human Resources. Faculty and staff should update their information with Human Resources as it changes.

The following scenarios are pre-approved by University officials for immediate text notification:

- Dangerous Situation
- Hazardous Materials Warning
- Severe Thunderstorm Warning
- Tornado Warning
- Blizzard Warning

If the University is closed, a message also will be posted on the University's home page at: http://www.csupueblo.edu. Closure notification also will

include the Pueblo Transportation Company and any appropriate non-law enforcement organizations.

CAMPUS EMAIL POLICY

CSU-Pueblo uses its campus email system for official communication. Consequently, all students, staff and faculty are required to utilize their assigned campus email account in accordance with the university electronic communications policy. Students are expected to read and respond to messages in a timely, consistent fashion. If you need assistance accessing your email, contact the CSU-Pueblo Help Desk at 549-2002.

THE CLERY REPORT

University public safety is provided by the Pueblo County Sheriff's Office. The Jeanne Clery Disclosure of Campus Security and Campus Crime Statistics Act is the landmark federal law that requires colleges and universities to disclose information on security policies and timely, annual information about crime on and around campus. The CSU-Pueblo Security and Fire Safety Report can be found at http://www.csupueblo.edu/campussafety/Pages/Default.aspx. The report is compiled by the Campus Safety Team, which is comprised of members from the following offices: Pueblo County Sheriff's Office at CSU-Pueblo, Facilities Department, Student Affairs, External Affairs, and CSU System Deputy General Counsel.

EQUAL OPPORTUNITY/AFFIRMATIVE ACTION COMMITMENT

Colorado State University-Pueblo is a higher education provider and employer that offer equal access and opportunity in employment, admissions and educational programs and activities. The University does not discriminate on the basis of race, color, religion, national origin, citizenship, gender/sex (including pregnancy, childbirth, and related medical conditions), age (40 and older), disability (physical/mental), genetic information, veteran status, sexual orientation (including perceived sexual orientation), transgender status, or marital status in its employment practices or in the admissions and treatment of students. Recognizing that sexual harassment constitutes discrimination on the basis of gender/sex and violates this policy statement, the University will not tolerate such conduct. The University shall promote equal opportunity and treatment in employment through a positive and continuing affirmative action program for minorities, women, individuals with disabilities, and veterans.

The University compiles with Title VI and Title VII of the Civil Rights Act of 1964, as amended; related Executive Orders 11246 and 11375; the Civil Rights Act of 1991; Title IX of the Education Amendments Act of 1972, Sections 503 and 504 of the Rehabilitation Act of 1973;

Americans with Disabilities Act of 1990; American with Disabilities Act Amendment Act of 2008; Section 4212 of the Vietnam Era Veterans' Readjustment Assistance Act of 1974, as amended; The Pregnancy Discrimination Act of 1978; the Equal Pay Act of 1963; the Age Discrimination Act of 1972; the Genetic Information Act of 2008; and all federal, state, and local laws pertaining to access and equity. Colorado State University-Pueblo avows its belief in equal access and opportunity for all students, employees and guests of the institution. The Director of Equal Opportunity/Affirmative Action and Title IX Coordinator has been designated by the President as the person with overall responsibility for the implementation and maintenance of such programs. For any concerns regarding unlawful discrimination/ harassment or further information, please contact the Office of Equal Opportunity/Affirmative Action at (719) 549-2210/2223, Administration Building/ Room 304. For disability resources/accommodation matters or other related concerns, please contact Justin Hiniker, Disability Resource Office at (719) 549-2648 (for students) Email: justin.hiniker@csupueblo.edu, Library and Resource Center (LARC) Room 169. For employment-related disability matters, please contact Ralph Jacobs, Human Resources Office at (719) 549-2246 (for employees), Email: ralph.jacobs@csupueblo.edu, Administration Building/Room 306.

Please visit www.csupueblo.edu/AffirmativeAction and http://www.csupueblo.edu/Disability/Pages/default.aspx for more information.

CSU-PUEBLO NOTICE OF NON-DISCRIMINATION AND COMPLIANCE WITH TITLE IX

Title IX of the Education Amendments of 1972 is a federal law that prohibits discrimination on the basis of sex in all education programs or activities that receive federal financial assistance. Title IX states that, "No person in the United States shall, on the basis of sex be excluded from participation in, be denied benefits of, or be subjected to discrimination under any education program or activity receiving federal financial assistance." Title IX's prohibition of sex discrimination includes prohibition of **sexual harassment** and **sexual violence**. Sexual harassment is any unsolicited or unwelcomed conduct of a sexual nature that creates an intimidating, hostile, or offensive educational or work environment for an individual.

Additionally, actions/behaviors that are considered stalking, dating violence and domestic violence may also be relevant, and therefore prohibited. CSU-Pueblo has zero tolerance for any of the above mentioned behaviors and will take swift and appropriate actions to stop the behavior, prevent its recurrence, and remedy the effects.

For additional information/resources or concerns regarding this matter, you may contact the University Title IX

Coordinator at the following address: Colorado State University-Pueblo, Administration Building/Room 304, 2200 Bonforte Boulevard, Pueblo Colorado, 81001-4901; Phone (719) 549-2210/2223.

For more information, please visit: http://www.csupueblo.edu/CounselingCenter/Pages/Sexual-Assault.aspx.

BOARD OF GOVERNORS NON-DISCRIMINATION POLICY

The Board of Governors is committed to a policy of non-discrimination for the institutions it governs in accordance with all applicable anti-discrimination and civil rights laws. Accordingly, the Board of Governors does not discriminate on the basis of race, age, color, religion, national origin, gender, disability, veteran's status, genetic information, or sexual orientation including gender identity and gender expression.

COLORADO STATE UNIVERSITY SYSTEM

JOINT PROCLAMATION AGAINST SEXUAL MISCONDUCT

On April 27, 2011, the CSU System along with the University issued its: Joint Proclamation against Sexual Misconduct. This proclamation provides:

The Colorado State University System and its institutions, have zero tolerance for sexual misconduct among members of our University communities.

All members of the University community, and their guests, have the right to be free from unwanted sexual contact, coercion, abuse, violence, threat of violence, and harassment and are expected to conduct themselves in a manner that does not infringe upon the rights of others. When an allegation of sexual misconduct is brought forward, the University will investigate the matter and take appropriate action. Anyone found to have committed sexual misconduct will face immediate and appropriate disciplinary action, up to and including expulsion from the University.

We will bring this message to all corners of our University, and nurture the core value that fosters a safe and healthy environment for members of our community. Further, we emphasize that sexual assault survivors deserve our support and assistance.

We strive to build healthy relationships within the university community free from sexual violence. To that end, the Colorado State University System is committed to raising the awareness of sexual misconduct actions; providing preventative training courses and promoting a healthy and safe environment for our students.

TERMS OF THIS CATALOG ISSUE

Students graduate under the catalog requirements noted in the *Academic Policies* section of this catalog.

All statements made in this catalog and similar publications distributed generally to prospective or admitted students or interested parties shall be for informational purposes only and should not be interpreted as being contractual. Colorado State University-Pueblo reserves the right to change, modify, or cancel any course, program, procedure, policy, financial requirement, or disciplinary arrangement set forth in this catalog whenever, in its sole discretion, it determines such action to be appropriate. Furthermore, Colorado State University-Pueblo will not be responsible for any failure to present or complete any course or program or to perform any other activity, function, or obligation mentioned in this catalog.

Modifications to this Catalog pertaining to the academic policies and curricular requirements of the University, its individual colleges and its individual academic programs must be reviewed and approved by the Faculty Senate in accordance with the provisions of Chapter 1 of the Faculty Handbook prior to taking effect.

Colorado State University-Pueblo welcomes applications from all persons interested in post-secondary education. The **Office of Admissions** is located in the Administration building. All correspondence concerning admission should be addressed to the Office of Admissions, Colorado State University-Pueblo, 2200 Bonforte Boulevard, Pueblo, CO 81001-4901 or by email to info@csupueblo.edu.

The **Visitor Center,** located in the Buell Communications Center at the entrance of campus, provides services specifically for new first-year and transfer students, including campus tours and information on the admissions process. Campus tours are available Monday thru Friday, and reservations can be made online at: www.goCSUPueblo.com or by contacting the Visitor Center at (719) 549-2418 or visitorcenter@csupueblo.edu.

Prospective students may obtain information about all CSU-Pueblo programs, as well as admission procedures, from the Visitor Center or the Office of Admissions.

For information about admission to CSU-Pueblo Online see the CSU-Pueblo Online section within the *Special Academic Programs and Services* section of this catalog.

ENTERING FRESHMEN

Admission Standards

Colorado State University-Pueblo's admission process is designed to promote diversity within the student population and to assure equal access to qualified applicants. The final admission decision is based on the applicant's potential for attaining a degree at the University.

First-time applicants are eligible for consideration for admission to Colorado State University-Pueblo if the CDHE admissions index score is 86 or higher. The score can be achieved by various combinations of high school grade-point average and ACT composite or SAT combined scores. Such combinations include:

High School GPA	Minimum ACT or	SAT Composite		
2.000	25	1120	-	1150
2.300	22	1010	-	1040
2.600	20	930	-	960
3.000	16	750	-	790
3.300	14	610	-	680

If applicants do not achieve an index score of at least 86 with a minimum cumulative GPA of 2.0 and completion of the Higher Education Admission Requirements (HEAR), the credentials will be reviewed by an admissions committee which will base a recommendation for admission on:

1) The applicant's academic and personal potential to benefit from or contribute to University programs; and
2) The applicant's previous academic record. Students with non-traditional backgrounds are encouraged to apply.

A student admitted to Colorado State University-Pueblo with an index score of 86 or below is required to enroll in an academic skill building and success course in the first term of enrollment as a condition of admission to the University. The default course for all majors is US 101. The following courses are also acceptable: MUS 101, EN 101, EXHP 101, AIM 105, CET 101, BIOL 171, and BUSAD 101. Successful completion of the academic skill building course is a requirement of continued enrollment after the first semester. Students who are admitted with an index score of 80 or below are required to take a three credit course (US 151) in their first semester. Students who are admitted with an index score of 81 to 86 are required in their first semester to take either a one credit course (US 101) or substitute a course specified by their program and approved by the Curriculum and Academic Policies Board.

- NOTE: Acceptance by the University does not necessarily mean acceptance into a particular degree program, some of which have admission requirements beyond those of the University.

Admission Requirements

Students may apply after the completion of their junior year in high school. One official transcript of high school work should be sent directly to the Office of Admissions from the high school at the time of application, and a final transcript with graduation date must be submitted after the applicant graduates from high school. Students who apply on the basis of the General Education Development (GED) tests in place of high school graduation must have the agency issuing the GED tests forward the official test scores (not the certificate) to the Office of Admissions. College credit earned in high school is eligible to count toward a degree at CSU-Pueblo, but cannot classify a student as a transfer student.

Applicants must submit:

1) A completed CSU-Pueblo application;
2) A $25 application fee (non-refundable);
3) An official transcript of high school records or GED score of a 450 composite; and
4) Scores from either the ACT or the SAT.
   (Not required of applicants who are 23 years of age or older or who have been out of high school five or more years.)

NOTE: Applicants who have completed their secondary education through alternative options such as home schooling should submit documentation of that education (i.e., transcript, portfolio, narrative statements of accomplishment, etc). Consideration for admission will be in a similar manner as that for applicants from traditional high school programs, but additional emphasis will be placed on scores obtained on standardized examinations.

Graduates of Colorado high schools participating in the standards based admissions project will be considered according to the current state guidelines for that project.

Application Deadlines

For the best scholarship opportunities, registration time, and housing considerations, applicants should apply and be admitted as early as possible. Those still in high school may apply once they have completed six semesters. To be considered for a specific term, all documents required for admission must be received in the Office of Admissions by the deadline for that term. Transfer students should allow sufficient time to have official transcripts sent from all institutions previously attended.

Application forms and credentials must be filed by the following deadlines:

> Fall Semester..August 1
> Spring Semester ....January 2

Higher Education Admission Requirements (HEAR)

The Colorado Department of Higher Education Admission Requirements (HEAR) requires completion of the following high school course work for admission to any Colorado four-year public college or university, including Colorado State University-Pueblo.

- Four years of English;
- Four years of mathematics, including Algebra I, Algebra II, Geometry, Trigonometry, Pre-Calculus, Calculus, etc.;
- Three years of natural science, including at least two courses with laboratory work;
- Three years of social studies, including U.S. History or World Civilization;
- One year of foreign language; and
- Two years of academic electives.

More information is available through the Admission Standards section of the Colorado Department of Higher Education website:
http://highered.colorado.gov/Academics/Admissions/

Advanced Placement

See Credit by Examination (Academic Policies section).

Basic Skills Assessment

The University complies with statewide policies adopted by the Colorado Department of Higher Education (CDHE). As amended for fall 2014, every public institution of higher education in Colorado is required to assess writing and mathematic skill levels of all first-time, degree-seeking students. CSU-Pueblo also assesses reading skills. **Students whose assessment scores fall below the minimum requirements must enroll and successfully complete the appropriate skill building course(s) within their first 30 credit hours towards graduation.** Basic Skills Levels are determined by ACT or SAT scores. If students do not have an ACT or SAT score they must take the appropriate ACCUPLACER test. CSU-Pueblo also accepts COMPASS scores for placement.

Cut scores are listed below:

CDHE Placement Guidelines

Skill Area: Writing

ACT Subscore	SAT Subscore
English 18	Critical Rdg 430

ACCUPLACER Score	COMPASS Score
Sentence Skills.........95	Writing Skills.............79

Skill Area: Mathematics

ACT Subscore	SAT Subscore
Math 19	Math 460

ACCUPLACER Score	COMPASS Score
Elementary Algebra...85	Math Placement 63

With an ACT math subscore of 19 or an SAT subscore of 460 no skill building courses are needed in math unless the general education math course mandated for your major requires it.

CSU-Pueblo Placement Guidelines

Skill Area: Reading

ACT Subscore	SAT Subscore
Reading....................17	Critical Rdg 430

ACCUPLACER Score	COMPASS Score
Reading Comp 80	Reading Placement ...76

For more information on Basic Skills Assessment, contact the Center for Academic Enrichment at (719) 549-2584.

TRANSFER STUDENTS

Students who have attended other colleges or universities and are seeking admission to CSU-Pueblo for the first time must submit:

1) A completed CSU-Pueblo application;
2) A $25 application fee (non-refundable);
3) Final high school transcripts if total transfer credits earned are less than 30 transferable semester hours;
4) ACT or SAT scores if total transfer credits earned are less than 13 transferable semester hours; and
5) Official transcripts sent directly to CSU-Pueblo from each college attended. (No part of the previous collegiate record may be disregarded, all coursework from all previous colleges attended must be submitted. Failure to list all institutions previously attended is a serious offense that may result in the rescinding of admission, loss of credit, or disenrollment.)

Note: Transfer students who have fewer than 13 transferable collegiate semester credit hours must meet the first-time freshmen standards. This includes international applicants. College credit earned in high school is eligible to count toward a degree at CSU-Pueblo, but cannot classify a student as a transfer student.

Transfer students must be in good standing at the institution last attended and have at least a 2.30 cumulative grade-point average. If not, the records will be reviewed and a recommendation on admission will be made by the admissions committee.

Students who are enrolled at another institution at the time application for admission is made to CSU-Pueblo should arrange to have one official transcript from the current institution sent with the application. A final transcript must be sent when the final term is completed.

After admission and once all official transcripts have been received, evaluations of transferable credit will be completed and provided to the student.

Each student must indicate all previous college experience on his or her application. Applicants may not ignore previous college attendance. Students who fail to inform the Office of Admissions of all previous college work will be subject to delay of admission, loss of credit, rejection of application and/or cancellation of enrollment.

Transfer of Credit

Transfer students should be aware of the 10-year time limit on credit earned toward a bachelor's degree, which applies to both transfer and resident credit. (Additional information appears in the *Academic Policies* section of this catalog.)

Credit is accepted by CSU-Pueblo from institutions accredited by the Commission on Institutions of Higher Education of the North Central Association of Colleges and Schools or similar regional accrediting bodies. For credit toward degree requirements, CSU-Pueblo accepts a maximum of 60 semester hours from community or junior colleges and/or a maximum of 90 semester hours from four-year institutions toward degree requirements. For degree purposes, CSU-Pueblo accepts no more than 90 credits in total through transfer or other assessment of prior learning.

Transfer grades and credits are not computed within the cumulative grade point average earned at Colorado State University-Pueblo. Courses completed with a grade of C- or better are accepted in transfer.

Colorado State University-Pueblo only accepts Associate of Arts or Associate of Science degrees from regionally accredited out of state institutions as fulfilling the University's general education requirements if CSU-Pueblo's entire general education core is completed with acceptable transfer credit. However, some CSU-Pueblo majors may have specific general education requirements that must be completed. Associate of Applied Science degrees are not transferrable to CSU-Pueblo, but will be evaluated on a course by course basis.

AA and AS degrees earned at an accredited Colorado community/junior college satisfy the University's general education requirements, except for those courses which are major specific. Students generally transfer in 60 semester hours and achieve junior status.

Credit from an institution without regional accreditation may be accepted by petition for transfer after the student has completed at least one term of full-time coursework at CSU-Pueblo with a C (2.000) average or better.

The University accepts up to eight semester hours of cooperative education courses in transfer. Cooperative education course work, to be acceptable, must include a clearly defined academic element, such as a study plan or reading assignments.

Military service credit is evaluated when official copies of transcripts for military schools are received. Army, Navy, and Marine personnel should submit a Joint Service Transcript (JST). Air Force personnel should submit a Community College of the Air Force (CCAF) Transcript. Courses are evaluated according to the American Council on Education (ACE) Guidelines. A maximum of 20 semester hours of credit is counted toward a baccalaureate degree.

Acceptance of credit does not necessarily mean that a specific department will accept the same credit toward its major requirements. Each department evaluates transfer

courses to determine applicability to major and minor requirements.

All application materials for applicants who decide not to enroll for the term for which they applied will be kept on file in the Office of Admissions for one year. Official transcripts received from other institutions cannot be relinquished.

College Level Examination Program

See Credit by Examination (*Academic Policies* section).

Appeals Process

If a student disputes the **University's evaluation of credits** from other Colorado public institutions, the student must file a written appeal with the Registrar within 15 calendar days of receiving the evaluation. If the student fails to file an appeal within the 15-day period, the decision made in the transfer evaluation will be binding. The Registrar has 30 calendar days to respond. If the student does not receive a response or feels CSU-Pueblo did not follow its policies and procedures, the student can appeal to the Colorado Department of Higher Education (CDHE) to hear his/her case.

If a student disputes the University's evaluation of credits from a Colorado private institution, a non-Colorado institution, or a non-regionally accredited institution, the student must file a written appeal with the academic department at CSU-Pueblo within 15 calendar days of receiving the evaluation. If the student fails to file an appeal within the 15-day period, the decision made in the transfer evaluation will be binding.

The Academic Department will have 30 calendar days to review the appeal and notify the student in writing of the decision including the rationale for the decision. In addition, the student will be notified in writing about the process for appealing and the appeal decision should the student feel that reasonable doubt exists.

If the Academic Department fails to inform the student of the available appeal options, the appeals decision shall be null and void. The student's request prevails and cannot be overturned by any institutional administrator or committee.

A student may appeal the first appeal decision in writing to the Dean of the College in which the Academic Department is housed. The appeal must be filed within 15 calendar days of the postmark date of the letter from the Academic Department regarding the first appeal decision.

The University must hear and reach a decision on the appeal within 15 calendar days after the appeal is filed. The student will be notified in writing by the University of the decision regarding the appeal and the rationale for the decision. In addition, the student shall be informed in writing about the subsequent process for appealing the institutional transfer decision, if the student chooses to do so.

The student may appeal the institutional decision to the CSU-Pueblo Provost. The appeal must be filed within five (5) calendar days of the postmark date of the letter notifying the student of the institutional decision. If the student fails to file an appeal within this time period, the institutional decision shall be binding.

The Provost shall review and reach a decision on the appeal within five (5) calendar days after the appeal is filed. The student will be notified in writing of the decision regarding the transfer appeal and the rationale for the decision. In addition, the institution shall inform the student that the decision may be appealed further by writing to the Colorado Department of Higher Education (CDHE). The appeal must be filed within five (5) calendar days of the postmark date of the letter notifying the student of the Vice Chancellor's decision.

If a student disputes the decision of **petitions from transfer of credit from non-accredited institutions**, the student must file a written appeal with the Dean of the College who denied the petitions within 15 calendar days of receiving the petition denial. If the student fails to file an appeal within the 15-day period, the decision made in the petition process will be binding.

The Dean of the College will have 30 calendar days to review the appeal and notify the student in writing of the decision including the rationale for the decision. In addition, the student will be notified in writing about the process for appealing and the appeal decision should the student feel that reasonable doubt exists.

If the Dean of the College fails to inform the student of the available appeal options, the appeals decision shall be null and void. The student's request prevails and cannot be overturned by any institutional administrator or committee.

A student may appeal the first appeal decision in writing to the Provost. The appeal must be filed within 15 calendar days of the postmark date of the letter from the Dean of the College regarding the first appeal decision.

The University must hear and reach a decision on the appeal within 15 calendar days after the appeal is filed. The student will be notified in writing by the University of the decision regarding the appeal and the rationale for the decision. The decision is final with regard to the petition for the acceptance of transfer credit from non-accredited institutions.

DEGREE-PLUS (SECOND BACCALAUREATE DEGREE)

Students seeking a second undergraduate degree must meet all residency and major requirements. This includes a minimum of 30 credits in residency at CSU-Pueblo. Degree-plus students are considered to have satisfied General Education requirements by virtue of the work completed for their first undergraduate degree from a regionally accredited institution. For more information, refer to the Degree Plus (Second Baccalaureate Degree) section in the *Academic Policies* section of the catalog.

INTERNATIONAL STUDENTS

Students who are residents of another country must submit the following to be admitted to CSU-Pueblo:

1) The official international application for University admission, accompanied by a $30 fee for undergraduate admission or $35 fee for graduate admission; or a $30 fee for English as a Second Language students.
2) Two official transcripts of all work completed either in high school or in college (or the equivalent). One transcript must be in the native language, one in English. Both must show courses taken, grades earned, length of classes and length of school terms. All transcripts must bear the official seal of the issuing institution and must be sent by that institution directly to the Center for International Programs. An explanation of all transcript terminology must be included;
3) Results of an English language proficiency test. **First-time freshmen students:** A minimum score of **500** on the Test of English as a Foreign Language (TOEFL) paper-based test, a minimum score of **173** on the TOEFL computer-based test, a minimum score of **61** on the TOEFL internet- based (iBT), a minimum score of **80** on the Michigan Test of English Proficiency, a minimum band score of **5.5** on the International English Language Testing System (IELTS) test, or completion of the advanced level at CSU-Pueblo's English Language Institute (with ELI Director approval) is required. **Transfer students:** A minimum score of **500** on the Test of English as a Foreign Language (TOEFL) paper-based test, a minimum score of **173** on the TOEFL computer-based test, a minimum score of **61** on the TOEFL internet-based (iBT), a minimum score of **80** on the Michigan Test of English proficiency, or a minimum band score of **5.5** on the International English Language Testing System (IELTS) test is required. In addition, transfer students must have an overall cumulative grade-point average of 2.300 or above. English language proficiency tests are not required of students from countries where English is the native language.
4) A financial statement regarding the resources available to the student during his or her stay in the United States. An international student cannot be accepted without this statement.

The Center for International Programs reserves the right to change policy. Exceptions are at the discretion of the Vice-President of Enrollment Management and Student Affairs.

No international student application for admission will be considered until all required materials are complete. The Center for International Programs must receive all materials by the application deadlines.

INTERNATIONAL BACCALAUREATE DIPLOMA PROGRAM

See Credit by Examination (*Academic Policies* section).

RETURNING STUDENTS

Students who have been enrolled and received a grade notation in a course (see *Academic Policies* for grade notations), but whose attendance was interrupted for two or more regular semesters, excluding summer, are required to file an application for readmission by the admissions deadline of the term in which they wish to enroll. Students seeking readmission must submit a $25 reapplication fee (non-refundable). Students whose previous CSU-Pueblo work resulted in a cumulative grade point average below 2.000 ("C") must also provide a written statement detailing the previous academic difficulties, the student's plans to overcome these difficulties and any other pertinent information to assist the admissions committee in making a decision.

Students, who are re-admitted after an absence of two or more semesters, excluding summers, are governed upon readmission by the catalog current at the time of readmission. Any college credit earned more than 10 years before the date of admission or readmission is not applicable toward the degree desired unless it is approved by the appropriate department chair. This policy includes transfer credit previously accepted by CSU-Pueblo. This policy does not apply to general education courses. Any course substitutions, waivers, exceptions, or petitions completed prior to readmission must be submitted to the appropriate approving authority. Any exceptions to the policy must have prior approval from the Provost. Degree-seeking students who have attended another post-secondary institution or have taken college-level correspondence or extended studies courses must provide complete official transcripts of such studies. Each student must indicate all previous college experience on his or her application, including any coursework since last attendance at this institution. Applicants may not ignore previous college attendance. Students who fail to inform the Office of Admissions of all previous college work will be subject to delay of admission, loss of credit, rejection of application and/or cancellation of enrollment.

ACADEMIC RENEWAL

Undergraduate students who return to Colorado State University-Pueblo after an absence of at least three years and whose cumulative CSU-Pueblo grade point average is below 2.000 are eligible for academic renewal. Students who take advantage of the Academic Renewal Policy will not have grade-point averages carried forward upon readmission. Courses with an earned grade of D+ or below are not eligible to count toward graduation. Students must be currently enrolled for academic renewal to be processed. **Academic renewal will not be granted more than once.**

Any college credit earned more than 10 years before the date of readmission is not applicable toward the degree desired unless approved by the chair of the department offering the course(s) [or equivalent(s)]. This policy does not apply to general education courses.

Students who elect academic renewal will be required to complete at least 30 hours of credit after readmission before they are eligible for a baccalaureate degree.

Students who have been granted Academic Renewal must complete 60 semester credits with CSU-Pueblo after the Academic Renewal designation to qualify for graduation with scholastic honors.

The Academic Renewal Application can be obtained from the Registrar's Office.

NON-DEGREE STUDENTS

Students may enroll at Colorado State University-Pueblo as a non-degree seeking student in one of the following categories:

Guest Student – No Credit

Applicants who wish to register as a guest (no credit) without degree-seeking status should contact the Office of Admissions for current policies and procedures.

A guest (no credit) student may carry up to 6 hours per term. A guest (no credit) student is ineligible for financial aid. In place of a grade for each course, students receive the symbol NC (no credit) on their transcripts.

Guest Student – For Credit

Guest (for credit) student category is reserved for applicants who wish to enroll in courses without degree-seeking status. Applicants who wish to register as a guest (for credit) student must be Colorado residents and are required to complete a short application with the Office of Admissions each term that they wish to enroll. Guest (for credit) students are **NOT REQUIRED** to submit official transcripts, test scores or an application fee; however test

scores or a transcript will be required to enroll in an English or Math course. Tuition and fees are based on the number of credits for which they register and are **INELIGIBLE** to receive financial aid. A guest (for credit) student may carry up to 15 hours per semester and may earn a maximum of 30 semester hours while maintaining visiting status. A guest (for credit) student must maintain a 2.000 cumulative grade-point average. Guest (for credit) students who wish to exceed the 30-semester hour maximum must formally apply for admission. For information on Guest (for credit) Student Status for graduate students, see *Graduate Programs* section in catalog.

High School University Program

Under Colorado's Concurrent Enrollment and ASCENT Programs, high school students may register for classes at the University based on the availability of existing Concurrent Enrollment and ASCENT agreements. Information on these programs is available in the CSU-Pueblo Office of Extended Studies and at participating high schools.

The University also offers a Senior-to-Sophomore (STS) program by agreement with various high school districts. High school students in this program are afforded the opportunity to study in university level courses while remaining in their high school classrooms and are considered unclassified students by the University. Students must submit an application for admission, transcript of their high school record and ACT or SAT scores. Those STS students who are in their senior year are given consideration for admission as regular first-time students for the fall semester following their high school graduation. Students interested in this program are encouraged to seek information from their high school guidance counselor or from the University's Office of Extended Studies at 719-549-2316.

Senior Citizens

Persons 65 years of age or older, or 62 and retired, may audit courses on a space-available, non-degree student basis without paying tuition. Permission of the instructor is required. A grade of NC (no credit) will be posted.

RESIDENCY CLASSIFICATION

Your initial residency classification at Colorado State University-Pueblo is determined by the Office of Admissions based on information you provide in the Residency Section of the CSU-Pueblo Admissions Application. Students are responsible for checking the residency determination provided at the time of admission, with the admissions packet. Any new information must be provided **prior to the start of the student's first term**, according to the same deadlines as the petition process below. This initial residency classification remains the same unless you provide additional information to prove you meet the domicile requirements for Colorado

residency, or you submit a "Petition for In-State Tuition Classification" which supports your domicile, and your petition is approved. Students wishing to make a change to residency after the end of their first term MUST petition.

If you have been classified as a non-resident and believe you qualify for Colorado residency, it is important to do the following:

- Contact the Admissions Office to discuss your residency determination and provide additional information;
- If applicable, obtain a "Petition for In-State Tuition Classification" from the Admissions Office; and
- Submit a completed petition by the deadline. Deadlines are the first Monday in August for Fall semester and the third Friday in December for Spring semester.

Colorado residency for tuition purposes for the state of Colorado is governed by State Law (Title 23, Article 7-101 to 111, of the Colorado Revised Statutes of 1973, as amended) and by judicial decisions that apply to all public institutions of higher education in Colorado and is subject to change at any time. The residency decision made at one Colorado institution is non-transferable to other Colorado institutions. Colorado State University-Pueblo must apply the rules set forth in the residency statutes and is not free to make exceptions to the rules except as specifically permitted by State Law.

Qualified Individuals

Parent Petitioners

Parents who have moved to Colorado and meet the domicile requirements may submit a "Petition for In-State Tuition Classification" which supports their domicile. If their petition is approved, their dependents are eligible for Colorado residency.

Other Qualified Individuals

You are a qualified individual and eligible to establish domicile separate from your parents if, at the beginning of the 12-month domicile year, you were:

- At least 22 years old, or
- Married, or
- Emancipated, or
- A graduate student

An emancipated minor is an individual under 23 years of age who is no longer considered a dependent and is not supported by their parent(s) or any other individual. An emancipated minor can begin establishing their domicile on the date they become emancipated.

Emancipation must be proven in the following way:

- Parents or other individuals must no longer provide financial support of any nature for any purpose. Parental support includes funds your parents may have previously set aside for your current support even if those funds are in your name.
- Parents must no longer claim the minor on their federal and state income tax returns.
- If the minor takes out a loan, they must do so without a parent co-signer. In addition, the loan must not be the student's major source of support.
- The minor must document that they are independently able to meet all financial obligations without any financial help from any other individual.

Examples of financial obligations may include:

- Tuition and fees
- Rent and food
- Cable and cell phone statements
- Medical expenses, including health insurance
- Vehicle expenses, including auto insurance

If you are granted Colorado residency as an emancipated minor, you must continue to independently meet all your financial obligations, including the cost of education, without financial assistance from your parents or any other individual.

ASSET

A student who does not have lawful immigration status may be classified as an in-state student for tuition purposes if:

1) The student attended high school in Colorado for at least 3 years immediately preceding the date the student graduates from a Colorado high school or earns a GED;
2) The student is admitted to a Colorado institution of higher education or attends any institution of higher education under a reciprocity agreement within 12 months of high school graduation or earning a GED; and
3) The student submits an affidavit thru the COF application process stating that the student does not have lawful immigration status but has applied for lawful presence or will apply as soon as the student is eligible.

Additionally, a student who does not have lawful immigration status and graduated from a Colorado high school or earned a GED *prior to* September 1, 2013, but was not admitted to a Colorado institution within 12 months of graduating or earning a GED may nonetheless be qualified as an in-state student if the student has been continuously physically present in Colorado for at least 18

months prior to enrolling in a Colorado institution. Students applying under ASSET must complete a Colorado ASSET form, available from Admissions.

Non-citizens

Persons who are lawful permanent residents or who are admitted as refugees are eligible to establish domicile for tuition purposes. Nonimmigrant aliens who are residing in *Colorado for purposes other than education* may qualify for in-state status after one year of Colorado residence. The nonimmigrant categories subject this provision are determined by the Colorado Commission on Higher Education.

Nonimmigrants in the following categories cannot qualify for in-state tuition: F-1, F-2, H-3, J-1, M-1 and M-2.

- H-4 will qualify unless the visa holder is the spouse of child of an H-3.
- J-2 will qualify if the J-1 visa holder is not a student of trainee.
- H-1B, L, K, V, E, O and P visa may qualify.

Military Personnel

Military Exception

1) Active-duty members of the armed forces of the United States and Canada on either PCS or TDY orders in Colorado and their dependents (as defined by military regulations) are eligible for in-state status, regardless of domicile or length of residence in Colorado. A dependent of a member of the armed forces is eligible for in-state tuition classification when the member moves to Colorado on a PCS basis, regardless of the length of the member's or dependents residency in Colorado. After qualifying as an in-state student, a member of the armed forces of the member's dependent, shall not lose his or her eligibility for in-state tuition status if the member retires or separates from the military. Dependent means a spouse of a member of the armed services who was the member's spouse at the time that the member was stationed in Colorado and at the time the spouse is requesting in-state tuition classification and any child under twenty-two years of age born to or legally adopted by the member of the armed forces who enrolls in a public institution of higher education within ten years after the member was stationed in Colorado.
2) Members of the Colorado National Guard who maintain their sole legal residence in Colorado and their dependents also qualify for in-state tuition regardless of length of residence.
3) Military dependents continuously enrolled in a Colorado college continue to qualify for in-state tuition if the military member is transferred outside Colorado or retires and remains in Colorado.

Contact Admissions for required documentation and forms.

Military Members Domiciled in Colorado

To retain domicile during an absence from Colorado due to military orders, military personnel must maintain Colorado as their state of legal residence for tax purposes, and voters must maintain Colorado voter registration.

Military personnel may retain legal residence in their original state, or they may establish a new legal residence in a state in which they reside due to military orders. They may not establish domicile in Colorado while residing elsewhere or while being physically present in the State only on a temporary basis. Persons domiciled in Colorado for one year who enter active duty military service, and who return permanently to Colorado within 6 months of discharge, and their dependents, qualify for in-state tuition regardless of changes of domicile while on active duty.

Veterans

Honorably discharged members of the Armed Forces moving permanently to Colorado qualify for in-state tuition. Dependents of veterans are eligible for in-state tuition classification if the dependent has completed two years of high school in Colorado. Contact Admissions for required documentation and forms.

Court Appointed Legal Guardian

A student may qualify for Colorado residency based on the domicile of their court appointed legal guardian if the guardianship has been in effect for at least one year. The legal guardian must provide court documents certifying that the primary purpose of the appointment is other than to qualify the student for Colorado residency. The court must also certify that the student's parents do not provide financial support.

RESIDENCY REQUIREMENTS

Domicile

"Domicile" is used to describe the place where an individual has demonstrated intent to make a permanent home and legal residence. Both physical presence (see #1 below) and evidence of intent (see #2 below) must be in place to begin the domicile year. A qualified individual must reside in Colorado with the intent to make Colorado their permanent home and legal residence.

Colorado residency requires a domicile in Colorado for 12 continuous months on or prior to the first day of classes of each semester.

Since domicile is defined as a permanent home and legal residence, being in Colorado solely for school purposes and/or temporarily for other purposes does not qualify as domicile for Colorado residency.

1) Physical presence is your actual permanent home and legal residence. Proof of physical presence may include all of the following:

- Home ownership
- Lease agreement
- Rent receipts
- Notarized statement from a landlord

2) Evidence of intent to make Colorado your permanent home and legal residence is demonstrated by giving up all your legal ties with your prior state and establishing them with Colorado for 12 continuous months. Proof that demonstrates evidence of intent, as specified by the residency statute, may include all of the following:

- Colorado driver's license or valid Colorado ID.
  If you have a driver's license from another state, you must apply for a Colorado driver's license within 30 days of moving to Colorado (if you are employed) or within 120 days (if unemployed). If you do not drive, you may obtain a Colorado identification card.
- Colorado motor vehicle registration.
  If you operate a motor vehicle, you must register it in Colorado within 30 days of moving to Colorado (if employed) or within 120 days (if unemployed). This law applies to any vehicle you have, whether or not you are the registered owner.
- Permanent, full-time, off-campus employment or acceptance of future permanent employment in Colorado. (Student employment provided by CSU-Pueblo is not recognized by the state of Colorado in proving intent.)
- Colorado voter registration.
  You may register to vote with your county clerk, or when you obtain your Colorado driver's license. Although voting is not required by law, it is nonetheless an indicator of one's intent to create a Colorado domicile.
- Change in permanent address on all pertinent records.
- Payment of Colorado state income tax (if your income is sufficient to be taxed).
  All taxable income accrued after you move to Colorado, regardless of source, must be reported to the Colorado Department of Revenue. You should file part-year resident returns for each state of residence for the year you move to Colorado. For subsequent years, you should file a full-year resident Colorado return.

- Withholding of Colorado state taxes from wages.
- Ownership of residential property in Colorado that is your primary residence.
  (Ownership of vacation or income property is not an indication of domicile.)

Evidence of legal ties outside of Colorado during the domicile year that demonstrate residency in another state may include the following:

- Failure to file a Colorado state income tax return.
- Failure to pay Colorado state income tax (if your income is sufficient to be taxed).
  Income earned in another state by a resident of Colorado is taxable in Colorado. Filing a nonresident Colorado tax return is persuasive evidence of domicile outside Colorado.
- Failure to obtain a Colorado driver's license or Colorado ID.
  (Failure to change your driver's license to Colorado within the statutory periods)
- Maintenance of a home in another state.
- Prolonged absence from Colorado.
- Residing in another state between academic terms or when not enrolled as a student.
- Vehicle you operate is registered in another state.
  (Failure to register a motor vehicle in Colorado within the statutory periods)
- Any other factor unique to the individual who tends to imply your permanent home and legal residence is in another state.

The fact that an individual does not qualify for in-state status in any other state does not guarantee in-state status in Colorado; in-state classification is governed solely by Colorado statute. The tuition classification statute places the burden of proof on the petitioner to provide clear and convincing evidence of a change in eligibility for in-state tuition once the student has registered.

The Admissions Office must receive completed petitions no later than the published deadline date for the semester for which the student is petitioning. Deadlines are the first Monday in August for Fall semester and the third Friday in December for Spring semester. Petitions will not be accepted after the published deadline date; incomplete petitions will not be accepted and/or reviewed for that semester, and the tuition classification and tuition assessment will remain nonresident for that term.

Decisions made by the Tuition Classification Officer may be appealed to the University's Residency Appeals Committee. A student wanting to appeal the decision to the Residency Appeals Committee must contact the Office of Admissions no later than the appeal date listed in the letter in which the decision was conveyed to the student. The decision of the Residency Appeals Committee is FINAL University determination for that specific semester. In addition, there are no provisions in the Tuition Classification Statutes for retroactive petitioning.

Any student who provides false information to avoid paying out-of-state tuition may be subject to legal and/or disciplinary actions.

STUDENT BILLING SERVICES

Student Billing Services is a resource for students and parents seeking information on tuition and fees, COF, billing questions, tuition appeals, payment plans, and 1098-T's. Students may obtain information from Student Billing Services in the Administration Building, Room 212 or by calling 719-549-2181 or 549-2178. You may also email student billing: studentbilling@csupueblo.edu.

TUITION AND FEES

Tuition and fee rates are on-line at
http://www.csupueblo.edu/BFS/TuitionFees

Tuition rates are established by the Board of Governors of the Colorado State University System following budget action of the Colorado General Assembly. The Board of Governors normally acts on tuition and fee (course, program, and department) charges at a meeting prior to the start of the academic year. The Student Fee Governing Board (SFGB) is the body at Colorado State University-Pueblo responsible for recommending Permanent Student Purpose Fees (mandatory fees). There may be other fees associated with a student enrolled at the University. All fees and charges are subject to change. Go to your TWOLF Student Portal and then log into PAWS to view billing information.

Student Balance is due in full on the specified date of each semester. Any remaining balance after the due date will be accessed a 1.5% finance charge. Visit Student Billing web page and/or call student billing for more information. http://www.csupueblo.edu/BFS/StudentBilling/Pages/default.aspx

To view your bill: access your Student Paws/Billing Page.

COLLEGE OPPORTUNITY FUND

The College Opportunity Fund (COF), created by the Colorado Legislature, provides a stipend to eligible undergraduate students. The stipend pays a portion of your total in-state tuition when you attend a Colorado public institution or a participating private institution. Eligible undergraduate students must **apply** at https://cof.college-assist.org, be **admitted** and **enrolled** at a participating institution. Both new and continuing students are eligible for the stipend. Qualifying students may use the stipend for eligible undergraduate classes. The stipend is paid on a per credit hour basis to the institution at which the student is enrolled. The credit-hour amount will be set annually by the General Assembly. Basic skills courses are not covered by COF. If COF tasks are not completed by the end of the semester, students will be responsible for payment of the COF portion as well as the student share.

PARKING

Parking decals are required to park on campus and can be obtained at the Cashier's Office in the Administration Building or in the Auxiliary Services Office in the Occhiato Center. Visitor parking passes can be obtained in the Sheriff's Office in the Administration Building. Temporary (Staff and Concurrent Student) parking passes can only be obtained at the Cashier's Office in the Administration Building.

DELINQUENT STUDENT ACCOUNTS

Students are subject to any or all of the following actions if they have a delinquent debt to the University:

- Inability to view grades
- Administratively withdrawn
- Diplomas and transcripts held (official and unofficial)
- Letters of Completion for graduation withheld
- Enrollment and degree verification of National Student Clearinghouse will be restricted
- No future course registrations allowed
- Turned over to a collection agency

Reasonable collection/legal costs will be added to the amount due. Any student who pays with a check that is returned unpaid by his/her bank will be subject to all of the penalties for late payment and also will be charged an additional $25 fee.

TUITION APPEALS

The Tuition Appeals Committee will consider requests for adjustment to tuition and fee charges when a student can document extenuating circumstances. Appeals must be made no later than thirty (30) days past the end of the term in question. The Appeals committee meets only once a month. Appeal forms can be obtained by contacting Student Billing Services in the Administration Building.

No adjustment/refunds of tuition and fees will be made to a student who is suspended, dismissed or expelled for a breach of discipline.

FINANCIAL AID

FINANCIAL AID

Financial aid is a resource for students and parents seeking monetary assistance to help defray the costs of higher education. Eligible students who demonstrate financial need may receive assistance from the federal government and/or the State of Colorado in the form of grants, loans, work study and/or scholarship funds. Students may obtain information from **Financial Aid**, Administration Building, Room 212, telephone (719) 549-2753. Students may obtain further financial aid information by logging onto: http://www.csupueblo.edu/FinancialAid.

The primary responsibility for educational costs resides with the student and the student's family. Assistance offered through financial aid is intended to supplement the family contribution. Funds are awarded on a first-come, first-served, need basis.

Financial Aid Application Steps

1) Complete a **Free Application for Federal Student Aid** (FAFSA) by March 1. Students may apply online at http://www.fafsa.gov. The CSU-Pueblo school code is: 001365
2) Complete the CSU-Pueblo Scholarship application by March 1. Students may apply online at: http://www.csupueblo.edu/FinancialAid/Scholarships
3) Students can view their application status and other required documents on CSU-Pueblo's Personal Access to Web Services (PAWS). Once all required information is received, students will receive a financial aid award offer, which can be viewed through the PAWS account.

Students may **not** receive financial aid if they are:

1) Not enrolled in a degree-seeking program;
2) On financial aid suspension or ineligible SAP status;
3) In default on a federal student loan;
4) Owe money back on a federal student grant or federal loan over aggregate or have not made satisfactory arrangements to repay it; or
5) Ineligible non-citizens or not permanent residents of the United States.

FINANCIAL AID POLICIES

STUDENT RIGHTS AND RESPONSIBILITIES

As a student at CSU-Pueblo you have the right to:

- Know all the types of financial assistance available to our students, including federal, state, and institutional sources.
- Change or decline any financial aid awarded.
- Appeal financial aid eligibility, including a financial aid award.

As a student at CSU-Pueblo you have the responsibility to:

- Accurately and honestly complete the **Free Application for Federal Student Aid** (FAFSA) and CSU-Pueblo School Application each year by the priority deadline of March 1.
- Use financial aid solely for expenses related to attendance at CSU-Pueblo.
- Be admitted in a degree-seeking program in order to receive financial aid.
- Maintain at least 6 credit hours of enrollment per semester to receive financial aid.
- Keep your address updated with Financial Aid.
- Notify Financial Aid if you are attending two schools at the same time. (You may not receive financial aid at two schools at the same time.)
- Read and understand the Satisfactory Academic Progress Policy, the Withdrawal Policy, and other general policies related to financial aid.
- Officially withdraw from CSU-Pueblo if you are unable to attend classes.
- Report all scholarships that you receive to Financial Aid. (All scholarships are counted as part of your financial aid and may impact other financial aid.)
- Review disbursement schedules that are published.
- Pay any balance to CSU-Pueblo that is not covered by financial aid.
- Monitor your CSU-Pueblo e-mail account for important financial aid information.
- View your balance due, financial aid award, and other individual student information via PAWS.

SATISFACTORY ACADEMIC PROGRESS POLICY

As a standard for participating in any federal student aid program, CSU-Pueblo is required by the U.S. Department of Education to apply reasonable standards for measuring whether a student is making progress toward a degree. The state of Colorado also requires that students meet Satisfactory Academic Progress (SAP) in order to receive any state-funded student assistance. Both of these requirements are met and apply to CSU-Pueblo institutional financial aid eligibility by measuring student academic performance at the end of each payment period (period of enrollment) against the following qualitative and quantitative standards:

Cumulative Grade Point Average (GPA)

2.0 for undergraduate programs, 3.0 for graduate programs.

Completion Percentage (Pace)

At least 67% of all credit hours attempted must have successfully passing grades (all students must complete coursework with successfully passing grades by the end of each period of enrollment or put both current and future financial aid eligibility at risk). Successfully passing grades are S or D- and higher; all others (U, F, W, IN, IP, NC, and repeated coursework – see below) count as unsuccessful credit hours attempted.

Course repetition: Students are allowed to repeat a course and have it count toward enrollment for financial aid eligibility only once. Each attempt at the course, however, will count toward a student's pace, and all prior attempts with lower grades will count as unsuccessful credit hours attempted. Please note this is specifically in reference to repeating identical coursework at CSU-Pueblo. Credits accepted as transfer credits that may count as equivalent to coursework offered here at CSU-Pueblo do not count as course repetition.

Withdrawals: Withdrawals do not affect a student's cumulative GPA for SAP, but count as credit hours attempted toward both pace and maximum time frame. Please note that a withdrawal (grade of "W") has great distinction from courses which are simply dropped (no grade and no record of attempt).

Unofficial Withdrawals: Students who do not earn passing grades for the period of enrollment (the grade point average for the period of enrollment is 0.00) and do not complete the Official Withdrawal process are placed on Financial Aid Suspension (see Evaluation below for more details on Financial Aid Suspension), unless cumulative SAP standards are met.

Incompletes: At the time of evaluation (the end of each period of enrollment), Incompletes (grade of "IN") do not affect a student's cumulative GPA for SAP, but count as credit hours attempted toward both pace and maximum time frame. Students with grades of Incomplete which become new letter grades prior to or during a subsequent period of enrollment and that may affect financial aid eligibility for that period of enrollment can contact Financial Aid for further evaluation.

Transfer credits: Transfer credits do not count toward a student's cumulative GPA for SAP, but do count as both attempted and completed credit hours (100%) toward pace and maximum time frame.

Maximum Time Frame

Undergraduate students - attempted credit hours may not exceed 150% of the educational program

Graduate students - attempted credit hours may not exceed 100% of the educational program

Note that both Pace and Maximum time frame are measured in credit hours only, regardless of full time or part time attendance.

All students enrolled at CSU-Pueblo are evaluated for SAP at the end of each period of enrollment, after the Registrar's Office has released official grades. Students can find their SAP status within the Financial Aid menu on PAWS. Listed here you will find each status and definition:

- **Eligible** – Student is eligible for financial aid. This category may include students with no SAP issue at all, students who have appealed successfully and have successfully completed their Probation period of enrollment, students who have successfully completed their Probation period of enrollment and are following their Academic Plan, and students who have met SAP after being Ineligible previously.
- **Warning** – Failure to make SAP, but student is financial aid eligible for one more period of enrollment and must make SAP by the end of that period of enrollment or student will be placed on Financial Aid Suspension. Warning status is not appealable.
- **Suspension:** - Failure to make SAP after a Warning period, but student is eligible to appeal. If the appeal is approved, the student can continue financial aid eligibility for another period of enrollment under a Probation status. Students may also choose not to appeal and attempt to regain financial aid eligibility by meeting SAP while paying out of pocket (without any financial aid).
- **Probation** - Failure to make SAP, but appeal is approved and student is financial aid eligible for one more period of enrollment, or possibly more if following required Academic Plan (which may include documentation requirements not directly related to academic performance).
- **Ineligible** - Failure to make SAP and/or failure to follow required Academic Plan. This status also applies to appeals that are not approved - the student is not eligible for financial aid until cumulative SAP standards are met and may not appeal.

Appeal Procedure

All students who have their financial aid eligibility suspended may appeal to the Financial Aid Committee to receive financial aid in a subsequent period of enrollment. GPA, Pace, and Maximum time frame are all appealable. There is no form to complete, and contacting Financial Aid is not required, but you may visit a Financial Aid Counselor during our walk in business hours (8:00 a.m. – 5:00 p.m., Monday – Friday). Appeals must be in a written format, and:

- Have student printed name, PID, daytime contact information, and signature;
- Have Academic Adviser name, department, and contact information;
- Include information describing why SAP minimum standards have not been met and how the situation has changed so that SAP will be met at next evaluation;
- Detail any extenuating circumstances, including supporting documentation from a 3rd party (e.g., police reports, detailed hospital bill or physician's statement, death certificate, etc.);
- Include enrollment plans for next period of enrollment (e.g., number of credit hours, change in major, Academic Improvement Plan details, any other academic-related documentation, etc.); and
- Be complete and turned in to Financial Aid by the following priority deadlines for each period of enrollment:

  - July 1 for Fall semester
  - Monday before classes begin for Spring semester
  - June 1 for summer session

Absolutely no appeals will be reviewed after the first Friday of courses for a given period of enrollment.

Students are notified of their SAP appeal decision via their PAWS account. Financial Aid Committee decisions are final. Students whose appeals are not approved may reestablish financial aid eligibility only by meeting the SAP cumulative standards. Students may appeal SAP only once during their entire enrollment at CSU-Pueblo.

Academic Plans

All students who appeal successfully and are subsequently placed on Probation will automatically have a minimum Academic Plan consisting of at least 2.0 GPA and 75% completion rate (3.0 GPA and 100% completion rates for graduate students) within subsequent periods of enrollment. The Financial Aid Committee will further develop Academic Plans for individual students based on the particular situation and content of appeal on a case by case basis. The requirements of these more rigorous plans will be made in writing and signed by the student prior to a subsequent financial aid disbursement, and the Academic Plans will be monitored by the Financial Aid Committee or designee.

Note that the SAP policy differs from CSU-Pueblo's Good Academic Standing policy (see Catalog), and in particular the difference between an SAP Academic Plan and the Academic Improvement Plan from the Center for Academic Enrichment. The SAP policy reviews both Pace and Maximum time frame, in addition to GPA, and all attempted credit hours are included in reviewing student eligibility, including those excluded by the Registrar's

Office in Academic Renewal situations. These two policies also have separate appeal procedures.

This SAP policy is effective July 1, 2014, and supersedes all other CSU-Pueblo SAP policies published on the web and/or in prior catalogs.

OFFICIAL WITHDRAWAL POLICY

Students, who totally withdraw from the University, for any reason, when it is passed the drop period, must initiate the Official Withdrawal process by contacting the Center for Academic Enrichment. A withdrawal from the University is not considered official until the following three required steps are completed:

1) Students must obtain an Official Withdrawal Form from the Center for Academic Enrichment.
2) Students must speak with a Financial Aid Counselor in Financial Aid.
3) Students must turn in the Official Withdrawal Form with all required signatures from the above named offices to the Registrar's Office to finalize the withdrawal.

This process ensures proper notification of instructors for grading purposes. Students who do not complete the Official Withdrawal process will potentially receive all failing grades on their transcripts and will be required to repay their unearned federal financial aid based on 50 percent of the semester unless they can provide acceptable documentation proving they were in attendance passed 60 percent of the semester. Total withdrawals will not be processed after the last scheduled class day of the semester.

Please note that Official Withdrawal will affect the degree completion rate of the student and may affect their eligibility for financial aid. Please review the University's Satisfactory Academic Progress Policy (SAP) at: http://www.csupueblo.edu/FinancialAid/GeneralPolicies/SatisfactoryAcademicProgressPolicy/

Students who totally withdraw from the University after the drop period through 60 percent of the semester will have their tuition and fees prorated. A federal formula is used to determine the amount of federal financial aid earned by the student, which will be calculated for students who withdraw within 60 percent of the semester based on the percentage of the semester completed. If the student received less assistance than the amount earned, the student may be able to receive those funds. If the student received more assistance than earned, the excess funds must be returned. The amount of federal financial aid unearned will be deducted from the adjusted tuition and fee amounts credited to the student's account; however, there may be additional institutional charges that were not covered by federal financial aid and will be reflected in the

total amount owed by the student. Students may use the following calculation to estimate the amount of Title IV aid he or she earned prior to the withdrawal date.

# of days student completed*/total # of days in period of enrollment = percentage of aid earned

*Scheduled breaks of five or more days will be excluded from calculation.

Students who complete an Official Withdrawal after 60 percent of the period of enrollment will not have their tuition and fees adjusted or the federal financial aid received adjusted. Please note that federal financial aid received may not cover the total amount of institutional charges owed by the students. Students can review their account balance through their PAWS account.

Students who complete Official Withdrawals within 60 percent of the period of enrollment and did not receive federal financial aid will have their tuition and fees prorated based on the day the Official Withdrawal was initiated by the student through the Center for Academic Enrichment.

Students who cease attendance from the University and drop all courses during the drop period will receive a 100 percent tuition refund and will be responsible for repaying all of their federal financial aid funds received back to the University. Students are not eligible to receive federal financial aid when they have dropped all courses and no longer attend. Please review the Financial Aid Policies for more information.

FINANCIAL AID PROGRAMS

GRANTS

All grants are listed on our webpage:
http://www.csupueblo.edu/FinancialAid/Grants.

The following are three common need-based funds.

Federal Pell Grant

The Federal Pell Grant amount is determined by the Expected Family Contribution (EFC) listed on the Student Aid Report and whether the student is enrolled full-time or part-time. Generally, Pell Grants are awarded only to undergraduate students. In some cases, students might receive a Pell Grant for attending a post-baccalaureate teacher certificate program.

Colorado Student Grant (CSG)

Generally the CSG is for full-time undergraduate students and is awarded to Colorado residents on the basis of financial need as determined by the Colorado Commission on Higher Education. Funds are provided by the Colorado General Assembly.

Federal Supplemental Education Opportunity Grant (FSEOG)

The FSEOG is designed to assist undergraduate students with exceptional need, targeted to Federal Pell Grant recipients and other exceptional need students. Awards may not exceed $4,000 per year.

STUDENT EMPLOYMENT/ WORK STUDY

Work study provides part-time jobs to students. The program provides students with meaningful work experience, preferably related to their academic major. Students may use work study funds to supplement their income and help meet educational expenses. The program is funded by both the federal government and the Colorado General Assembly. The University annually employs approximately 450 students in the Student Employment program.

General Qualifications:

1) Must be enrolled at the University as a degree-seeking student.
2) Must be making satisfactory academic progress.
3) Must enroll in and maintain six (6) credit hours for each term employed.

Colorado Work Study

The Colorado work study program is funded by the Colorado General Assembly. To be eligible, students must be undergraduate Colorado residents.

Students must complete the Free Application for Federal Student Aid (FAFSA) to determine eligibility for work study. Students are selected for the program if qualifications are met and if funds are available. Generally students must demonstrate financial need, but the University is allowed to award a portion of the Colorado work study funds to students who have little or no financial need.

Federal Work Study

The federal work study program is funded by the federal government. To be eligible, students must demonstrate financial need.

Students must complete the Free Application for Federal Student Aid (FAFSA) to determine eligibility for work study. Students are selected for the program if qualifications are met and if funds are available. Students may work on campus or at off-campus community service designated sites and must be enrolled in undergraduate or graduate programs.

STUDENT LOANS

Prior to any federal education loan being processed by CSU-Pueblo, the applicant must complete the financial aid application process.

Federal Direct Loans

The U.S. Department of Education administers several loan programs designed to offer low-interest funding to students and their parents who need to borrow money to cover the costs of education. Below is a summary of the loans available:

Direct loans are either subsidized or unsubsidized. A **subsidized** loan is awarded on the basis of financial need. The federal government pays the interest while the student is in school.

An **unsubsidized** loan is not awarded on the basis of need. You'll be charged interest from the time the loan is disbursed until it's paid in full. If you allow the interest to accrue while you're in school or during other periods of nonpayment, it will be **capitalized**—that is, the interest will be added to the principal amount of your loan, and additional interest will be based on that higher amount.

The Federal Direct Loan Program is intended solely to aid students pursuing a degree in higher education. Students should borrow only the amount they believe is necessary to pay for educational costs. Keeping the amount of a loan at a minimum will ease repayment.

Student Loan Amounts

The unsubsidized Loan interest rate is fixed. You'll be notified of interest rate changes throughout the life of your loans.

You'll pay a fee of up to 4% of the loan, deducted proportionately from each loan disbursement.

Annual Loan Limits for Direct Loans

	Dependent Undergraduate Student	Independent Undergraduate Student
1st Year	$5,500–only $3,500 may be subsidized	$9,500–only $3,500 may be subsidized
2nd Year	$6,500–only $4,500 may be subsidized	$10,500–only $4,500 may be subsidized
3rd & 4th Years	$7,500–only $5,500 may be subsidized	$12,500–only $5,500 may be subsidized
Maximum Total Debt Allowed	$31,000–only $23,000 may be subsidized	$57,500–only $23,000 may be subsidized

*Graduate students may borrow up to $20,500 (unsubsidized) each academic year. Aggregate limits are also higher.

Federal Direct Parent Loan for Undergraduate Students (PLUS)

PLUS enables parents who do not have an adverse credit history to borrow to pay the education expenses of each child who is a dependent undergraduate student enrolled at least half-time. The interest rate is a fixed rate. Credit checks are conducted by the lender to determine loan approval. If the loan is denied the lender is responsible for notifying the parent (borrower).

The borrower (parent) must begin monthly payments of a Federal Direct (PLUS) loan 60 days after the final disbursement of a loan or borrowers may choose to defer payments until 6 months after the date the student ceases half-time enrollment.

EXIT COUNSELING AND TRANSCRIPT HOLDS

Students who are graduating, totally withdrawing, dropping below 6 credits of enrollment, or otherwise not returning to the University for any reason must complete Exit Counseling if they have ever borrowed any federal loan from any educational institution. Exit Counseling is completed online at www.studentloans.gov. (Students seeking information about repayment options, grace periods and consequences of not repaying a student loan can visit Student Aid on the Web at www.studentaid.ed.gov).

Students who do not complete the required Exit Counseling, or are delinquent on any federal loan, or in default on any federal loan, or if the University is notified by the loan servicer that contact information is out of date for the student borrower are subject to having transcripts and academic records withheld by the University until such time that these issues are resolved. Students who need more information on loan status or servicer can log onto the National Student Loan Data System at www.nslds.ed.gov.

SCHOLARSHIPS

To be considered for University grant and scholarship aid, students must complete the University Scholarship Application. Also, Financial Aid administers a number of private scholarships funded by individuals, foundations, agencies, and organizations. All CSU-Pueblo students may apply on-line at our webpage: http://www.csupueblo.edu/FinancialAid/Scholarships for institutional scholarships by submitting an institutional application by the March 1 deadline. Recipients are selected by various committees.

Students are encouraged to visit: http://www.csupueblo.edu/FinancialAid/Scholarships for more information about scholarship searches or visit **Financial Aid** in Administration Building, Room 212.

Impact on Financial Aid

As a direct resource, scholarships are part of the student's financial aid package. If the student's financial need is already met at the time of scholarship notification, other aid may be reduced or cancelled. Pell grants are never reduced as the result of a scholarship.

HOW AID IS DETERMINED

Financial need is the difference between the Cost of Attendance (COA) and the expected Family Contribution (EFC). Financial needs can be expressed as an equation:

COA minus EFC equals financial need.

$$\begin{array}{r} \text{COA} \\ - \quad \text{EFC} \\ \hline \text{Financial need} \end{array}$$

For each student, the COA, EFC, and financial need will be different. Financial aid is offered to help the student cover their financial need depending on specific qualifications and available funding.

The Cost of Attendance includes:

- Tuition & Fees
- Books & Supplies
- Room/Board
- Transportation
- Medical and Dental Expenses
- Personal Expenses

The Colorado Commission of Higher Education determines the amount for each budget item. Tuition & fees are based on actual cost, and the other items are adjusted according to whether you live on-campus, off-campus, or with parents or relatives.

Please also note that the Cost of Attendance may not be exceeded once all federal, state, University, and private (outside) sources of financial aid has been considered. This includes all loans, grants, scholarships, and federal and/or state work study earnings.

VETERAN EDUCATIONAL BENEFITS

Veterans must follow the admission requirements and procedures outlined in this catalog. For certification of eligibility for education benefits under one of the Public Laws, students can apply for Veterans Administration benefits through the Veterans Education Benefits Office in the Administration Building (ADM), Room 103, telephone, (719) 549-2910. Please allow at least two months for processing time.

BUREAU OF INDIAN AFFAIRS

Students, who are at least one-fourth American Indian, Eskimo or Aleut, as recognized by a tribal group served by the Bureau of Indian Affairs, may apply for a BIA grant. The amount awarded is based on financial need and availability of funds from the area agency. For additional information, write to: Scholarship Office, U.S. Department of the Interior, Bureau of Indian Affairs, P.O. Box 370, New Town, ND 58763.

CAMPUS LIFE, STUDENT ENGAGEMENT AND DEVELOPMENT

STUDENT LIFE

Student Life strives to support the University's goals for student learning and success by creating and maximizing opportunities, programs, and services for personal, professional, and leadership development that promotes respect for self and others, collaboration and service to the community.

The Office of Student Life
Library Academic Resource Center Building (LARC)
www.csupueblo.edu/studentlife/
Phone: 719-549-2586

RESIDENCE LIFE AND HOUSING

Live, learn, and enjoy the opportunities of a lifetime in campus housing. Living on campus can be an enriching experience and a great way to ensure success.

The residence halls are home to more than 900 students. The University Residence Life and Housing Office is located in the Culebra Residence Hall. Floors are typically co-ed; however, there are floors designated for women only. Cleaning services are provided for all common areas.

Most of the residence hall rooms are designed for two people in a suite style. Depending upon the building, there are single rooms with bathrooms, double rooms with a bathroom, and single room suites available. All of the rooms come with an extra-long twin bed, dresser, desk and desk chair for each individual. Rooms will also include a microfridge in each room. Rooms have cable and internet access–either ethernet or wireless as routers are not permitted within the Residence Halls. Front desks are staffed by student staff in order to check guests in and out of the hall and to answer questions and check out equipment to residents.

Live-in Requirement

First-Year and sophomore students who are single, under 21 years of age, with a home address outside of Pueblo County **MUST** live on campus two academic years (4 complete semesters). Credits taken concurrent with high school and/or credits attained through Advanced Placement (AP), CLEP, International Baccalaureate (IB) or similar programs do **NOT** apply towards living experience. Students who violate this policy will be assessed the minimum housing and meal plan.

All residential students are required to have a meal plan. Students failing to meet these requirements will be assessed the lowest priced residence hall (double room rate) and board (meal plan) charges.

Any exceptions to this requirement must be approved by Residence Life and Housing.

Residence Hall Association

Residence Hall Association (RHA) is a student organization within the residence halls with a focus on student programming. Being involved in RHA can be as easy as being a floor representative in your hall. Each hall has a hall council which works with the executive board of RHA to do programming for all halls. Being in RHA also allows the opportunity to attend regional and national conferences and the ability to network with other students across the nation. Involvement in RHA is a good opportunity for students to build networking and leadership skills on campus while being a part of the residence life experience.

Belmont Residence Hall

Belmont Residence Hall has three wings joined together by a large common area with a large-screen TV, pool table, ping pong table, kitchen and fireplace. The lower level of the common area consists of a recreation area (including a court for volleyball and basketball), study lounge, and laundry facilities. There are computer work stations open 24-hours, a study lounge, vending machines, an ice machine, and many other amenities. The front desk is staffed by student staff to answer questions and check out equipment.

Residence hall rooms are designed for two people, and single occupancy is available on a very limited basis. Rooms range in size but are generally 12 feet by 13 feet. Each room contains two extra-long twin beds, two dressers, two desks with a study lamp built into the desk, and two desk chairs. Belmont Residence Hall has limited Wi-Fi.

Crestone Residence Hall

This residence hall is home to 252 students in 72 bedroom suites. It features a laundry room, warming kitchen, computer lab, a state of the art classroom, cyber lounge and meeting space. A glassed-in lounge is located on each floor. There are also card access security entrances to provide a safe living and learning environment. This building is designed for wireless internet access.

Culebra Residence Hall

Culebra Hall has four floors of mostly suite-styled student rooms, totaling 235 beds, a commons/lounge area with adjacent small study rooms, laundry room, mailroom, and

a food venue offering coffee drinks, soups, snacks, sandwiches, and pizza. A glassed-in lounge is located on each floor. There are also card access security entrances to provide a safe living and learning environment. This building has wireless internet access.

Greenhorn Residence Hall

This residence hall offers four floors of mostly suite-styled student rooms totaling 263 beds with a commons/lounge area and adjacent small study rooms, laundry room, warming kitchen, fully-equipped technology classroom, and a computer "cyber lounge" available to residents. A glassed-in lounge is located on each floor. There are also card access security entrances to provide a safe living and learning environment. This building has wireless internet access.

Application Information

A $200 deposit and a $50 non-refundable application fee must accompany each application. Housing contracts are issued for the entire academic year and must include a meal plan.

Contract Board (Meal Plan) Policies

Residence hall students are required to contract for meals at the University. Meal plans are purchased each term and allow the student full dining privileges for that term. Special diets prescribed by a physician are given consideration.

Contact information for University Housing is:

Residence Life and Housing
2290 Bonforte Boulevard
Pueblo, CO 81001
Phone: (719) 549-2602
Fax: (719) 549-2636
Email: Housing@csupueblo.edu
Website: http://www.csupueblo.edu/housing/

University Village at Walking Stick (Student Apartment Housing)

University Village at Walking Stick is Colorado State University-Pueblo's on-campus apartment community for students and offers a unique housing opportunity for sophomores, juniors, and seniors or for students 21 years of age or older.

The apartments offer high-speed Internet access in each bedroom and common area, as well as premium cable TV in each bedroom and common area. Each unit features individually controlled heating and air-conditioning. Each unit is two-stories. Two floor plans are available, each consisting of 4-bedrooms and 2-bathrooms. All utilities are included in the rent.

Academic year occupancy begins August 22nd and extends through May 6th. Students in the apartments are not required to purchase a meal plan.

The interior of each apartment offers a kitchen, dining and living room on the first floor and a study loft on the second floor. Each floor plan features four private locking bedrooms and a semi-private locking vanity and bathroom on each floor. Bedrooms range in size from 108 square feet to 124 square feet with large closets. This student community also features a spacious and inviting clubhouse, an outdoor basketball court, park benches, and restricted on-site parking. On-site laundry is provided in the clubhouse for all University Village at Walking Stick residents.

Application Information for University Village at Walking Stick

A $200 deposit, $100 non-refundable restoration fee and a $50 non-refundable application fee must accompany each application. University Village at Walking Stick contracts are issued for entire academic year and do not require a meal plan.

Contact information for the University Village at Walking Stick is:

Residence Life and Housing
2200 Bonforte Blvd.
Pueblo, CO 81001
Phone: (719) 549-2602
Fax: (719) 549-2636
Email: housing@csupueblo.edu
Website:
http://www.csupueblo.edu/Housing/Pages/default.aspx

Housing for Students with Families

Although the University does not provide housing for students with families, the Pueblo community offers a variety of rental options including homes, condominiums, and apartments.

STUDENT RECREATION
http://www.csupueblo.edu/sr/

Student Recreation and its affiliated programs offer comprehensive and vibrant experiential opportunities that enhance students' fitness and wellness, knowledge, personal skills, and enjoyment by providing:

- Opportunities for a variety of activities that may contribute to individual physical fitness and wellness.
- Opportunities for organized, cooperative, and competitive activity.

- A medium through which students can learn and practice leadership, management, program planning, and interpersonal skills.
- Access to quality facilities, equipment, and programs.

The Student Recreation Center (SRC) is a student-funded facility designed to serve the recreational needs of students at CSU-Pueblo. Built in August 2008, the building is approximately 43,000 square feet located adjacent and attached to the southern portion of the HPER Building.

The Student Recreation Center facilities:

- Cardiovascular, strength, and conditioning areas
- Group fitness and dance studio
- Multi-court gymnasium with an elevated 1/12th mile running track
- Four racquetball courts (one convertible squash court)
- Swimming pool
- Rock climbing wall
- Multi-purpose room
- Locker rooms
- Lounge (Wi-Fi access) with indoor & outdoor seating area
- Health and wellness suite
- Outdoor athletic track and artificial turf field
- Outdoor Challenge (ropes) Course
- Outdoor Pursuits Programs (equipment rental program)

Student Recreation Center Programs
http://www.csupueblo.edu/sr

Students are encouraged to regularly check the SRC website for updated information including: intramural events and deadlines, fitness schedules, pool schedules, and calendars for upcoming trips and events.

Intramural Sports
(719) 549-2087 or email intramurals.sr@csupueblo.edu

Intramural Sports provide the opportunity to compete in various organized, safe, and friendly sporting activities during the academic year. Our goal is for every participant to have fun and enjoy the campus community emphasizing recreation, health, wellness, teamwork, leadership, sportsmanship, and social interaction.
Some of the activities offered include: flag football, soccer, basketball, volleyball, softball, arena football, ultimate frisbee, indoor soccer, table tennis, and various video game tournaments.

Group Fitness
(719) 549-2085 or email sr.fitness@csupueblo.edu

A variety of fitness classes are offered for participants wanting to get a great cardio workout, to burn some fat, and/or tone their bodies. Classes are open to participants of all fitness levels. Participants are encouraged to work at their own level. Classes are taught showing routine options to accommodate different audience skill levels (low, intermediate, and advanced). WALK-ins are always welcome!! You may join a class at any time and attend as often as you wish.

Classes are led by well-trained, friendly, and enthusiastic instructors who are either certified and/or have been through a rigorous training program focusing on proper technique, safety, and class format. Each instructor is allowed to teach with his/her own unique style, which enhances and adds variety to the program.

Equipment is provided for most classes, including steps and risers, Bosu balls, free weights, Body Bars, resistance bands and tubing, mats, yoga mats and blocks, jump ropes, and more!

Outdoor Pursuits
(719) 549-2091 or email sr.outdoorpursuits@csupueblo.edu

The Outdoor Pursuits Program offers a wide range of outdoor recreation and skill-building activities for students. Outdoor Pursuits core programs are:

Outdoor Programs/Trips

Professional and student staff members guide trips such as camping, hiking, skiing, snowboarding, rock climbing, kayaking, backcountry skiing/riding, snowshoeing, avalanche safety training, backpacking, peak climbing, and mountain biking.

Outdoor Pursuits can also provide maps, trip or route advice, reading material, and other resources to plan individual adventures.

Challenge Course/Team Development Programs

Challenge Course consists of a series of obstacles known as elements suspended from utility poles constructed with steel cables, ropes, and wood. The course offers a challenging environment (emotionally, mentally, and physically) designed to promote teamwork, cooperation, and group problem-solving skills, as well as develops individual self-confidence.

Programs are designed for a unique adventure based upon a group's objectives. Programs vary in degrees of difficulty, depending upon each group's specific needs and goals. Physical prowess is not necessary for participation; however, teamwork and cooperation are essential to help individuals discover the value of trust, shared responsibility, and mutual support. Trained facilitators provide positive support and encouragement as participants explore their individual and group abilities.

Rock Climbing Wall

The climbing wall at CSU-Pueblo located in Massari Arena has six top rope climbing routes and three sport lead routes. Classes range from an introductory session for the first timer to advanced anchor and rescue workshops. The wall is open during the day and evenings.

Equipment Rental

The Outdoor Pursuits Program provides CSU-Pueblo students with the opportunity to rent equipment for their own personal trips. Available by reservation for a modest term user fee, outdoor equipment includes:

- Mountain bikes
- Telemark skis, boots and backcountry gear
- Snowshoes and poles
- Tents
- Backpacks
- Camping equipment and cooking gear
- Maps, guidebooks
- Sleeping bags
- Rock climbing shoes

DIVERSITY RESOURCE CENTER

The Office of Diversity & Inclusion develops, promotes, and supports a welcoming environment for underrepresented students, faculty, and staff by providing transformative and educational learning experiences.

Diversity

The ODI collaborates with several organizations and departments to sponsor diversity programming throughout the year. These activities are held in conjunction with national holidays and cultural celebrations and are open to the entire student population and the local community. Examples include: Hispanic Heritage Month, Martin Luther King's Birthday, Black History Month, Cinco de Mayo, Disability Awareness Month, Lesbian, Gay, Bisexual, and Transgender Pride Week, Native American Day, Women's History Month, and Asian & Pacific Islander Heritage Month, etc.

Academic Support

Intellectual growth is important outside the classroom; therefore, activities and programs involving academic and student services departments are scheduled throughout the term to assist students to develop critical thinking; provide students with the skills necessary to maximize their talents and knowledge in order to advance towards a degree; and to develop an understanding of diversity in literature, art, mathematics, science, social science, and globally.

The Center also utilizes a variety of strategies such as cultural and diversity workshops and programs to develop an awareness of the diversity in our global society.

Leadership

THE ODI provides opportunities for students to learn about educational opportunities and career opportunities. The ODI staff conducts, supports, and co-sponsors programs that encourage student learning and enhance student retention such as local and national internships, conferences, and workshops. Students are also encouraged to participate in University programs, clubs, organizations, and conferences on and off campus.

Facilities, Technology, and Equipment

The ODI is located in the OUC, Room 031. Technology available to students includes computer stations with "wireless" capability. There are also study areas, microwaves, a television, and conference room for meeting and study group sessions. The Center is open from 8:00 a.m. until 8:00 p.m. Monday through Thursday and from 8:00 a.m. until 5:00 p.m. on Friday and is available upon request for the utilization of student organizations, departments, or committees by calling (719) 549-2627.

STUDENT ENGAGEMENT AND LEADERSHIP

The Office of Student Engagement and Leadership's (SEAL) mission is to provide students with co-curricular learning and leadership development opportunities through activities, events, student organizations, fraternity and sorority life, and orientation which promote and enhance their student experience and provide them with a sense of belonging at CSU-Pueblo.

SEAL facilitates a comprehensive student engagement program intended to enrich the campus experience for University students. SEAL promotes opportunities for students to participate in student leadership experiences that result in broad organizational and involvement opportunities and enhance the overall educational experiences of students through development of, exposure to, and participation in social, cultural, multicultural, intellectual, recreational, and community service programs.

Throughout the academic year, SEAL promotes events that motivate, challenge, and encourage divergent thinking through activities and events that are free for all CSU-Pueblo students. SEAL's popular events include speakers, comedians, hypnotists, magicians, do-it-yourself activities, talent competitions, movie nights, and concerts.

SEAL facilitates a vibrant campus environment in which students and student organizations are offered opportunities to:

- Participate in co-curricular out-of-class learning activities;
- Enhance leadership abilities;
- Widen healthy interpersonal relationships;
- Get involved in various productive ways;
- Explore activities in individual and group settings for self-understanding and growth;
- Learn about varied cultures and experiences, ideas and issues, and art and musical forms;
- Design and implement programs to enhance social, diversity, and academic opportunities;
- Design and implement programs that provide intellectual, recreational, community service, and campus involvement opportunities;
- Enable group interests and encourage group activities; and
- Learn about, and use campus facilities and other resources.

SEAL is located in the Student Recreation Center (SRC), Room 143. Please visit the Student Activities website to view all events: www.csupueblo.edu/getinvolved. Contact (719) 549-2151 for more information or to learn how you can get involved with campus life or join the SEAL team.

Non-Traditional Students Center

Non-Traditional Students Center (NoTs Spot) is an informal social and educational environment for non-traditional and commuter students, where they can become aware of the services and programs of the University and local community. The Center is a getaway space for students to study quietly before and after their classes. The Center is located in the lower level of the Psychology building.

Commuter Student Lounge

The Commuter Student Lounge is an informal social and educational environment for non-traditional and commuter students, where they can become aware of the services and programs of the University and local community. The Center is a getaway space for students to study quietly before and after their classes. The Center is located in the lower level of the Psychology building.

Commuter Student Program

The Commuter Student Program provides engagement opportunities for CSU-Pueblo students that live off campus to promote a sense of community and belonging and to contribute to the students' social and academic integration at CSU-Pueblo.

The Commuter Student Advisory Board, part of the Commuter Student Program, is a student group that provides guidance to the Office of Student Engagement and Leadership on what types of programming and services that students who live off campus would like to see. To apply to be a part of the Commuter Student Advisory Board, complete the application on Packlink: https://csupueblo.collegiatelink.net/.

Associated Students' Government

The Associated Students' Government (ASG) is the students' governing body and promotes student life and the general welfare of the student body. It also addresses student concerns and/or complaints regarding any campus issue. ASG works to make students aware of administrative decisions on campus by having Senators as representatives on most of the boards and committees on campus.

ASG functions through three branches of government: Legislative, Executive, and Judicial. The Legislative branch, the ASG Senate, is composed of 14 senators elected from the student body. It is presided over by the Vice President. The Executive branch consists of the President and the Vice President. The Judicial branch is composed of up to five justices, one of whom is designated the chief justice. The senate meets weekly. Contact (719) 549-2866 for more information.

ThunderWolf Welcome New Student Orientation

New student orientation is the beginning of an ongoing process of introduction to the curricular and co-curricular opportunities available to students at CSU-Pueblo. The purpose of orientation is to facilitate the transition of new and transfer students into the CSU-Pueblo community, prepare students for the institution's educational opportunities and student responsibilities, and provide information to parents and families of new students as they support their students' educational endeavors.

During orientation students will: 1) learn about the academic requirements and expectations at the University; 2) meet other new students, experienced students, University faculty, and University staff; 3) attend a variety of sessions on co-curricular activities and getting involved on campus; and 4) become familiar with the CSU-Pueblo campus and community.

Specific orientation dates and schedules are posted on the website: www.csupueblo.edu/Orientation.

Student Leadership

The Leadership Program at CSU-Pueblo strives to help plan and organize a comprehensive leadership development program that is designed to enhance the

total learning experience for our students. The Leadership Program evaluates student needs and implements programs and activities that facilitate the learning, growth, and development of students and fosters leadership, civic engagement, and sense of community. Through leadership education, service learning and advocacy, students will become active citizens on campus, in their respective communities, and in the workplace. The Student Leadership Program is comprised of the National Society of Leadership and Success (NSLS), the Student Leadership Experience, and other Leadership Workshops held throughout the academic year.

Fraternity and Sorority Life

The Office of Student Engagement and Leadership is committed to enhancing Fraternity and Sorority Life and Fraternity and Sorority affiliated students to build a Greek community where students can have a positive collegiate experience. SEAL believes that the leadership opportunities provided by membership in fraternal organizations are endless and will be an outstanding part of a student's life during their undergraduate career. Fraternity and Sorority Life builds an inclusive Greek community and enhances the collegiate experience by supporting opportunities for siblinghood, leadership, service, and scholarship; and to serve as liaison among the collegiate chapters, parents, alumni, international organizations, and the University to provide organizational guidance, educational programs, and resources while challenging members to live their fraternal values. Each organization also has representation on Fraternity and Sorority Council.

CSU-Pueblo is proud to be the home of five national social Greek letter organizations: (1) Alpha Sigma Alpha Sorority - Zeta Pi Chapter, (2) Alpha Kappa Alpha Sorority, Inc. – Tau Tau Chapter, (3) Lambda Theta Nu Sorority, Inc. – Alpha Omicron Chapter, (4) Alpha Psi Lambda - CSUP Colony and (5) Lambda Chi Alpha – Delta Omega Chapter. Contact (719) 549-2151 for more information or to learn how you can get involved with a Greek-Letter Organization.

Major Events Series

Colorado State University-Pueblo hosts a series of major events each academic year. The series is an opportunity to learn from scholars, politicians, business people, and philanthropists who can inspire students and community members to think critically about current issues, trends, events, knowledge, diversity, and leadership. The series also features cultural events; including dance productions, major concerts, and comedy shows. The major events series is open to the public and free or a minimal cost for students. Events are co-sponsored by the Office of Student Engagement and Leadership, the Student Fee Governing Board, the Office of Diversity and Inclusion, and other entities around campus.

For more information, visit: www.csupueblo.edu/studentlife or contact the Office of Student Life at (719) 549-2687.

Student Organizations

CSU-Pueblo students have opportunities to take part in the activities of a number of student organizations. Students can search for student organizations and join them virtually through http://www.csupueblo.collegiatelink.net/. Students interested in starting a new recognized student organization must first find a faculty or staff member willing to advise the organization, four other CSU-Pueblo students interested in the same group, and develop a student organization mission statement and constitution. All students then must meet with the Office of Student Engagement and Leadership to complete the process. For information, please contact the Office of Student Engagement and Leadership at (719) 549-2151.

For a current list of student organizations, please visit the Student Organization website:
http://www.csupueblo.collegiatelink.net/.

Academic Organizations

- American Society of Mechanical Engineers
- Art Club
- Associated General Contractors
- Association of Computing Machinery
- Athletic Training Club
- Automotive Booster Club Jr. B3
- Chemistry Club
- CSU-Pueblo Forensics Team
- CSU-Pueblo Health and Wellness Club
- Enactus
- English Club
- English Graduate Interactive Society
- Entrepreneurs and Innovation Club
- Hispanic Scholarship Fund
- Honors Club
- HSB Accounting Club
- Institute of Electrical and Electronics Engineers
- Institute of Industrial Engineering
- Marketing Club
- Math and Physics Club
- Medical Science Society
- National Association of Music Education
- Past Masters – History Association
- Physical Educators Club
- Political Science Club
- Pre-Vet Club
- Society of Mexican-American Engineers & Scientists
- Sociology Club
- Southern Colorado Association of Nursing Students

- Student Social Work Association
- Tempered Steel Literary Magazine
- Tri Beta Biology Club

Campus-Life Organizations

- Anime Club
- Campus Activities Board (CAB)
- Winterguard

Cultural-Organizations

- Black Student Organization
- Bold and Beautiful Educated Sisters
- CSU-Pueblo Ballet Folklorico
- Latino Students' Union
- Movimiento Estudiantil Chicano de Aztlán (MEChA)
- PRIZM: Gay, Lesbian, Bisexual, Transgender, Ally Alliance

Greek Letter Organizations

- Alpha Kappa Alpha
- Alpha Psi Lambda
- Alpha Sigma Alpha
- Fraternity and Sorority Council
- Lambda Chi Alpha
- Lambda Theta Nu

Honor Societies

- Golden Key Honor Society
- Phi Alpha Theta
- Phi Alpha Zeta Delta
- Sigma Alpha Pi (National Society of Leadership and Success

Specific Interest Organizations

- Army (ROTC)
- Brew Club
- Campus Crusade for Christ
- Catholic Campus Ministry
- Fellowship of Christian Athletes
- Pueblo Students for Life
- Residence Hall Association
- Student Veterans of America
- The Underground
- Veterans and Military Support Club

SERVICES, SUPPORT, AND STUDENT DEVELOPMENT PROGRAMS

CAREER CENTER

The Colorado State University-Pueblo Career Center offers employment services and opportunities for students and alumni that will assist in developing a career objective, obtaining relevant work experience, and learning the skills necessary to conduct a self-directed job search.

The Career Center assists students with professional employment, internships, career planning and career coaching. This includes but not limited to: Résumé and Cover Letter development, interviewing skills, how to search and apply for internships, and strategies on how to conduct a self-directed job search.

The Career Center coordinates all on-campus recruiting with employers and coordinates the annual Dining Etiquette Training and the Spring Career Fair.

All off-campus employment, full, part-time, seasonal, and internship opportunities are posted on the Career Twolves website, via the Career Center webpage on a regular basis. Resources information such as Salary Surveys, How to Search for a Job, Dining Etiquette, and a variety of reference materials are also available in the Center.

The Career Center is located on the main floor of the University Library and Academic Resource Center (LARC), suite 187. For further information about programs and services offered by the Career Center, contact a staff member at (719) 549-2980 or visit our website at http://www.csupueblo.edu/careercenter.

DISABILITY RESOURCE & SUPPORT CENTER

The Disability Resource & Support Center assists in providing accommodations and services to students with documented disabilities. Students with documented disabilities should contact us in LARC 169 or call (719) 549-2648.

STUDENT COUNSELING CENTER

The mission of the Colorado State University-Pueblo Student Counseling Center is to provide a professional and confidential setting for the psychological, emotional, and developmental support of students as they pursue academic goals and explore personal growth, and act as a resource for faculty and staff to assist with their interactions with students.

Visits with a counselor are confidential and the records of counseling sessions are kept separate from academic records. There are some exceptions to confidentiality and they relate to those situations in which an individual

describes behavior that indicates a potential for child abuse or threats to harm oneself or someone else.

The Counseling Center staff operates in a manner consistent with the concept that any client of the Center should be fully informed of their treatment options and should participate in decisions as to the nature of that treatment. We also work to honor and protect each individual's values, beliefs, and general orientation to life. We act in a manner that demonstrates respect for and supports an individual regardless of gender, sexual orientation, disability, age, or country of origin.

The Counselors work with students whose concerns include stress, depression, loneliness, difficulty adjusting to college life, difficulty with life issues, suicidal thoughts, relationship difficulty, sexual assault, and many other issues.

Counseling Center services are free service to all degree-seeking CSU-Pueblo students. The Center is located in the Psychology Building in Room 236. Appointments can be made by calling University Health and Counseling Services at 549-2838.

HEALTH EDUCATION AND PREVENTION (HEP) PROGRAM

Our mission is to provide prevention education and healthy living and learning opportunities for Colorado State University-Pueblo students to develop and sustain a wellness-focused environment that furthers academic and student development. The health Education and Prevention (HEP) Program works with individual students, small groups and the campus/community to provide individually tailored, evidence-based prevention education and behavioral interventions.

Individual students can receive a free assessment, access to free educational/behavioral interventions, and referral to additional options on and off campus. Some students may be mandated to complete an assessment and educational intervention track as a result of violating the Alcohol and Other Drug Policy. To schedule an appointment with the Coordinator of Health Education and Prevention (HEP) Program, call (719) 549-2121.

Group presentations are available for student clubs, organizations, residence hall communities, fraternities, sororities, classrooms, and other workgroups.

Health Education and Prevention Program
Phone: (719) 549-2121
http://www.csupueblo.edu/CounselingCenter/Pages/Alcohol-and-Other-Drugs.aspx

DRUG FREE SCHOOLS AND COMMUNITIES ACT (DFSCA)

CSU-Pueblo maintains compliance with the Drug Free Schools and Communities Act regulations. The unlawful possession, use, or distribution of illicit drugs is prohibited. Students, faculty, or staff found in violation of campus policies will face disciplinary sanctions. For more information about the legal sanctions under federal, state, or local law; information about the health risks associated with the use of alcohol or other drugs; or for information about counseling, treatment, rehabilitation, or re-entry programs, visit:
http://www.csupueblo.edu/CounselingCenter/Pages/Alcohol-and-Other-Drugs.aspx

SEX/GENDER DISCRIMINATION AND SEXUAL MISCONDUCT POLICY STATEMENT

Members of the University community, guests and visitors have the right to be free from sexual violence and discrimination. All members of the University community are expected to conduct themselves in a manner that does not infringe upon the rights of others. The University maintains a policy of zero tolerance for sexual misconduct regardless of the sexual orientation or gender identity of individuals engaging in sexual activity. This zero tolerance means that the University will remedy all unwelcome conduct of a sexual nature and will impose appropriate sanctions on anyone found in violation of University policy. The University will take the necessary steps to: bring an end to the harassing or discriminatory conduct, prevent its recurrence and remedy the effects on the victim and the community.

The University is committed to complying with all requirements as set forth by Title IX of the Education Amendments of 1972 ("Title IX"). As such, discrimination on the basis of sex or gender will not be tolerated in any of the University's education programs/activities or working environment. Such discrimination includes, but is not limited to: sexual harassment; sexual violence; sex or gender-based bullying; stalking; relationship violence (including dating violence and domestic violence); and failure to provide equal opportunity in admissions, program/activities, athletics or employment. The University Title IX Coordinator will be informed of, and oversee, all notices of sex/gender discrimination and sexual misconduct and is responsible for identifying and addressing any patterns or systemic problems that arise during the review of such notices/complaints. Questions or concerns regarding the University's procedures and Title IX may be directed to one or more of the following resources:

For matters relating to faculty, staff, students, contractors, guests, or visitors:

Kaitlyn M. Blakey
Title IX Coordinator & Associate Director, Equal
    Opportunity/Affirmative Action
Administration Building, Room 304
Phone: (719) 549-2223
Email: kaitlyn.blakey@csupueblo.edu

For student-to-student matters:

Jennifer Alanis
Director, Diversity & Inclusion & Deputy Title IX Coordinator
Phone: (719) 549-2658
Email: jennifer.deluna@csupueblo.edu

Coordinator, Health Education & Prevention Program
& Deputy Title IX Coordinator
Phone: (719) 549-2121

For matters relating to athletics:

Jacklin Wallgren Associate Athletic Director for
Compliance & Deputy Title IX Coordinator
Massari Arena, Room PE 208
Phone: (719) 549-2021
Email: Jackie.wallgren@csupueblo.edu

Additional information and resources may be found on the CSU-Pueblo website at:
http://www.csupueblo.edu/CouncelingCenter/pages/Sexual-Assault.aspx

STUDENT HEALTH SERVICES

The mission of Student Health Services is to provide acute and preventative care and promote wellness, to encourage academic success and leadership of the student population.

There is no charge for an appointment to see a Nurse Practitioner or Nurse. Students, however, incur charges for laboratory tests, physical or specialty exams performed, or for medication dispensed from the on-site pharmacy. Forms of payment include credit cards, check, or cash.

Students are encouraged to visit the health clinic whenever necessary. The licensed professional staff of Student Health Services consists of nurse practitioners. Patients are seen by appointment. Walk-ins are welcome and will be seen at the first available time.

Office: (719) 549-2830
FAX: 719-549-2646
Web: http://www.csupueblo.edu/shs
Email: shs@csupueblo.edu

OFFICE OF STUDENT CONDUCT

Colorado State University-Pueblo strives to achieve a campus community in which individuals demonstrate respect for others, for themselves, and for the University; uphold high standards of personal and academic integrity; are accepting of differences and gain an appreciation for living in a pluralistic society; understand the impact of their behavior both upon the University and the larger community; and freely accept the responsibility for and the consequences of their conduct.

Code of Student Conduct & Adjudication

Colorado State University-Pueblo students are expected to become familiar with the Code of Student Conduct and Adjudication and the student conduct process. The most recent version of the Code of Student Conduct and details of the disciplinary processes and procedures may be accessed via the University's website at:
http://www.csupueblo.edu/StudentLife/StudentConductCode/Documents/The-Student-Code-of-Conduct.pdf .

You may contact the Director of Student Conduct and Case Management or Student Life/Affairs if you have any questions or concerns or need to report an incident involving students at (719) 549-2586/2092.

TRiO EDUCATIONAL OPPORTUNITY CENTER (EOC)

EOC is a federally funded TRiO grant program, sponsored by CSU-Pueblo that assists first-generation and low-income individuals in gaining access to higher education. The program provides services to CSU-Pueblo students as well as high school students and adults in twelve southern Colorado counties and one northern New Mexico county. EOC services are especially beneficial to individuals who seek extra assistance in navigating the procedures related to financial aid and admissions. All services are provided free of charge.

Services include:

- Information about college and career opportunities.
- Assistance in completing admissions and financial aid applications.
- Referrals to GED and college preparation programs.
- Information about scholarship opportunities.
- College application and testing fee waivers.

For services on the CSU-Pueblo campus, students and community members can call (719) 549-2457. The central office is located on the CSU-Pueblo campus, Room 365 in the Library and Academic Resource Center (LARC). Satellite offices are located at Fort Carson's Education Center and on community college campuses in Pueblo, Colorado Springs, Lamar, La Junta, and Trinidad. To access services or for more information, call (719) 549-

2457 or toll free (877) 302-4433 or visit our website: http://www.trioeoc.com.

COLLEGE ASSISTANCE MIGRANT PROGRAMS (CAMP)

The purpose of the Federally-funded College Assistance Migrant Programs (CAMP) is to provide academic and financial support to assist students with migrant and seasonal farm work backgrounds in entering college and being successful. The CAMP program at CSU-Pueblo is in partnership with Kansas State University.

Services:

- Academic advising
- Scholarship to assist with tuition, fees, housing, and other expenses
- Tutoring and college skills development
- Career exploration
- Mentoring, emotional and social support

Eligibility:

- Have been employed or parents have been employed in migrant or seasonal farm work for at least 75 days in the past 24 months
- Have high school diploma or GED
- Have not entered college or have earned less than 30 credit hours
- U.S. Citizen or permanent resident
- Enrolled or admitted for enrollment at CSU-Pueblo

For more information about the CAMP program, call (719) 549-2402 or stop by the office in the Library and Academic Resource Center (LARC), Room 383.

TRiO STUDENT SUPPORT SERVICES

Student Support Services (SSS) is a federally funded TRiO grant project providing an array of services to low-income, first-generation students and students with disabilities. The purpose of TRiO SSS is to increase the retention and graduation rate of participants. This is accomplished by providing supportive services such as:

- Academic action planning.
- Peer tutoring (one-on-one, group, and drop-in).
- Academic, career, financial literacy, and graduate school counseling.
- Financial Aid advisement.
- College Success Course.
- Academic success seminars.
- Educational resource center and study room.

To be eligible to receive services from the TRiO SSS Project, students must meet the following requirements:

- Be enrolled or accepted for enrollment at CSU-Pueblo as an undergraduate student,
- Be a low-income student, and/or
- Be a first-generation student, and/or
- Be a student with a documented /diagnosed disability,
- Meet the academic criteria as established by the TRiO SSS Project, and
- Be a citizen, national, or permanent resident of the U.S.

Students who meet these criteria are encouraged to apply. For more information, please stop by the office located in the Library and Academic Resource Center (LARC), Room 357 or call us at (719) 549-2111. Additional information can be located on the SSS website: http://www.csupueblo/sss.

TRiO UPWARD BOUND

Upward Bound is a federally funded TRiO grant program sponsored by CSU-Pueblo. The program mission is to provide low-income and first generation students the pre-collegiate experiences and services (academic, social, and cultural) necessary to matriculation into higher education and successful completion of an Associates or Bachelors Degree. Upward Bound services students at County, Centennial, Central, and East high schools in Pueblo.

Services include:

- Academic year tutoring on a weekly basis at area target schools
- Six-week Summer Pre-college Academy at CSU-Pueblo
- Summer Bridge (transition to college) Program at CSU-Pueblo
- Service learning and leadership development
- Social and cultural activities
- Continued Alumni outreach and support services

The main office is located on the CSU-Pueblo campus, Room 376 on the 3rd floor of the Library and Academic Resource Center (LARC). To access services or for more information, call (719) 549-2750 or visit our website: http://www.csupueblo.edu/TRIO/UB/Pages/default.aspx.

TRiO VETERANS UPWARD BOUND

Veterans Upward Bound is a U.S. Department of Education TRiO Grant program which provides academic refresher assistance, training and advising to low income and/or first generation honorably discharged veterans who are pursuing a GED certificate and/or are preparing to enter post-secondary education. Non-credit academic instruction is available in the subject areas of English, mathematics, science, careers, computer literacy, and Spanish.

This program is an opportunity for veterans to re-establish fundamental ideas and study habits, which are prerequisites for successful performance at the post-secondary educational level. Additionally, Veterans Upward Bound provides access to academic resources, employment referrals, assistance with VA benefits applications, and referrals to various community assistance organizations.

Colorado State University-Pueblo is the host university; classes are offered at Pikes Peak Community College and Pueblo Community College. The program, all classes and materials are FREE for those who qualify.

The Veterans Upward Bound Staff can assist veterans in several areas, including:

- Academic Skills Refresher Training
- GED Preparation
- College Entrance Assistance
- Admissions
- Financial Aid Applications
- VA Educational Benefits
- Academic Advising
- Career Guidance

Classes are offered at various times. Please contact the program for the current schedule.

Please call to get complete information on how Veterans Upward Bound can benefit you or visit our website: http://www.csupueblo.edu/TRIO/VUB/Pages/default.aspx

VUB Contact Information:

- Colorado State University-Pueblo
  2200 Bonforte Blvd,
  Library and Academic Resource Center (LARC),
    Room 374
  Pueblo, Colorado 81001-4901
  Phone: (719) 549-2824
               (719) 549-2875

- Pueblo Community College
  Phone: (719) 549-3077

- Pikes Peak Community College
  Phone: (719) 502-4020

Students are well advised to become familiar with the academic policies of the University. Each student owns the responsibility to comply with these policies.

ACADEMIC YEAR

The academic year begins with Fall semester and ends with the Summer session.

RIGHTS REGARDING STUDENTS' EDUCATIONAL RECORDS

The Family Educational Rights and Privacy Act (FERPA) (20 U.S.C. § 1232g; 34 CFR Part 99) is a Federal law that protects the privacy of student education records. Colorado State University-Pueblo's practice in regard to student record keeping and access is based on the provisions of FERPA. FERPA applies to the Education Records of Colorado State University-Pueblo students who are currently enrolled, or who were formerly enrolled, regardless of their age or status with regard to parental dependency. A student is considered to be currently enrolled and covered under FERPA when the student enrolls in classes at the University. For specific details, visit or contact the Registrar's Office (Administration Building, Room 202).

Schools may disclose, without consent, directory information (designated below), collectively or individually. Colorado State University-Pueblo does publish several bulletins, lists, brochures, catalogs, directories, yearbooks, commencement items, annuals, guidebooks, news releases, sports information, honor rolls, etc., containing this directory information which specifically identifies students and information about them.

Directory information includes, but is not limited to,

- Student's name
- Address
- Telephone listing
- Electronic mail address
- Photograph
- Date and place of birth
- Major field of study
- Grade level
- Enrollment status (e.g., undergraduate or graduate, full-time or part-time)
- Dates of attendance
- Participation in officially recognized activities and sports
- Weight and height of members of athletic teams
- Degrees, honors, and awards received
- The most recent educational agency or institution attended

A student, by the end of the second week of classes, must notify the Registrar's Office (Administration Building, Room 202) in writing that directory information should not be released without prior written consent by completing the "Request to Withhold/Release Directory Information" form.

If a student later wants this information released when requested, he/she needs to complete a new "Request to Withhold/Release Directory Information'' form.

Generally, schools must have written permission from the eligible students in order to release any information from a student's education record. However, FERPA allows schools to disclose those records, **without** consent, to the following parties or under the following conditions (34 CFR § 99.31) which include but are not limited by:

- School officials with legitimate educational interest;
- Other schools to which the student is transferring;
- Specified officials for audit or evaluation purposes;
- Appropriate parties in connection with financial aid to a student;
- Accrediting organizations;
- Organizations conducting certain studies for or on behalf of the school;
- To comply with a judicial order or lawfully issued subpoena;
- Appropriate officials in cases of health and safety emergencies; and
- State and local authorities within a juvenile justice system, pursuant to specific State law;
- The disclosure is to parents, of a dependent student, pursuant to the IRS code;
- The disclosure of the final results of a disciplinary proceeding to a victim of an alleged perpetrator of a crime of violence or a non-forcible sex offense;
- The disclosure is to a parent of a student under the age of 21 who is disciplined due to a violation any Federal, State, or local law, or of any rule or policy of the institution, governing the use or possession of alcohol or a controlled substance; and
- The disclosure concerns sex offenders and other individuals required to register pursuant to the Violent Crime Control and Law Enforcement Act of 1994, and the information had been provided to the university.

Subject to the conditions set forth in 99.31-99.35 of the Act.

ACADEMIC DISHONESTY

Academic dishonesty is any form of cheating that results in students giving or receiving unauthorized assistance in an academic exercise or receiving credit for work which is not their own.

In cases of academic dishonesty, the instructor will inform the chair of the department prior to implementation of punitive action. Academic dishonesty is grounds for disciplinary action by both the instructor and the Dean of Students. Any student found to have engaged in academic dishonesty may receive a failing grade for the work in question, a failing grade for the course, or any other lesser penalty which the instructor finds appropriate.

To dispute an accusation of academic dishonesty, the student should first consult with the instructor. If the dispute remains unresolved, the student may then state their case to the department chair (or the dean if the department chair is the instructor of the course). A student may appeal a grade through the Academic Appeals Board.

Academic dishonesty is a behavioral issue as well as an issue of academic performance. As such, it is considered an act of misconduct and is also subject to the University disciplinary process as defined in the CSU-Pueblo Code of Student Conduct. Whether or not punitive action has been implemented by the faculty, a report of the infraction should be submitted to the Office of Student Conduct who may initiate additional disciplinary action. The decision by the Office of Student Conduct may be appealed through the process outlined in the Code of Student Conduct.

What Are Specific Acts of Academic Dishonesty?

The following acts of misconduct are acts of academic dishonesty:

1) Cheating—intentionally using or attempting to use unauthorized materials, information, or study aids in any academic exercise. The term academic exercise includes all forms of work submitted for credit or hours.
2) Fabrication—intentional and unauthorized falsification or invention of any information or citation in an academic exercise; or of documentation meant to excuse or justify adjustments related to attendance or completion of work (exams, exercises, etc.)
3) Facilitating Academic Dishonesty—intentionally or knowingly helping or attempting to help another commit academic dishonesty.
4) Plagiarism—the deliberate adoption or reproduction of ideas, words, or statements of another person as one's own without acknowledgment.
5) Unauthorized Collaboration—-intentionally sharing information or working together in an academic exercise when such actions are not approved by the course instructor.

This is not meant to be an exhaustive list of all acts of academic dishonesty, but a guide to help faculty and students understand what constitutes academic dishonesty.

CLASSROOM BEHAVIOR

The classroom instructor is responsible for setting standards for all classroom conduct, behavior and discipline. Only enrolled students, administrative personnel and persons authorized by the instructor are permitted in classrooms and other instructional areas during scheduled periods. University policy and Colorado state laws also prohibit all forms of disruptive or obstructive behavior in academic areas during scheduled periods or any action which would disrupt scheduled academic activity. Use of classrooms and other areas of academic buildings during non-scheduled periods are permitted only in accordance with University practices and/or policy. Anyone in unauthorized attendance or causing a disturbance during scheduled academic activity may be asked to leave. If a person refuses such a request, he or she may be removed by a deputy of the Pueblo County Sheriff's Office located at the University and may be subject to legal prosecution.

All communications with instructors, whether in class, face-to-face, on paper, or by telephone, email or other electronic means, are subject to the same standards for conduct, behavior and discipline as classroom behavior. Standards of conduct outlined elsewhere (Code of Student Conduct, Sexual Harassment Policy, etc.) also apply.

CLASS ATTENDANCE

Students are expected to attend all classes for which they are enrolled unless excused by the instructor. No extensions of vacation periods are given to students regardless of the location of their homes. Non-attendance of classes caused by late registration is considered the same as absence. Students are not allowed to attend classes for which they are not properly enrolled.

The University does not have a policy permitting a specific number of cuts or absences from class. Each instructor establishes an attendance policy for his or her classes and must inform students in writing of the policy at the beginning of the term. However, the student's grades shall not be affected negatively solely due to absence from class because of participation in University-sanctioned events. Such University-sanctioned activities may include, but are not limited to: intercollegiate competition, participation on the forensics team, and field trips. Class absence due to University-sanctioned participation does not in any way excuse students from completing class preparations, assignments, examinations, or projects.

Although students may drop classes on their own initiative within time lines established by policy, faculty members have the right to withdraw students for non-attendance.

CATALOG REQUIREMENTS

Students may graduate under the catalog requirements for the year in which they are first enrolled, provided they complete graduation requirements within a continuous period of no more than 10-years. If a student withdraws or is withdrawn for any reason from the University and is subsequently readmitted after an absence of two or more semesters, re-admittance will be governed by the catalog current at the time of readmission. Any exceptions to the policy must have prior approval from the Provost. Students should obtain and keep a copy of the catalog under which they enter or are readmitted. Students may also elect to follow any subsequent catalog.

TIME LIMITATION ON CREDIT

Any college credit earned more than 10 years before the date of admission or readmission is not applicable toward a baccalaureate degree desired unless it is approved by the appropriate department chair. This policy includes transfer credit previously accepted by CSU-Pueblo. This policy does not apply to general education courses. Credits from general education courses are accepted even if earned more than 10 years prior to the date of admission or readmission. Any course substitutions, waivers, exceptions, or petitions completed prior to readmission must be submitted to the appropriate approving authority.

CLASSIFICATION OF STUDENTS

Classification of students is based on semester credit hours earned as follows:

Freshman	0 - 29	semester hours earned
Sophomore	30 - 59	semester hours earned
Junior	60 - 89	semester hours earned
Senior	90 +	semester hours earned

Graduate Student   See the *Graduate Studies* section for classification information.

Guest Student – No Credit

Applicants who wish to register as a guest (no credit) without degree-seeking status should contact the Office of Admissions for current policies and procedures.

A guest (no credit) student may carry up to 6 hours per term. A guest (no credit) student is ineligible for financial aid. In place of a grade for each course, students receive the symbol NC (no credit) on their transcripts.

Guest Student – For Credit

Guest (for credit) student category is reserved for applicants who wish to enroll in courses without degree-seeking status. Applicants who wish to register as a guest (for credit) student must be Colorado residents and are required to complete a short application with the Office of Admissions each term that they wish to enroll. Guest (for credit) students are **NOT REQUIRED** to submit official transcripts, test scores or an application fee; however test scores or a transcript will be required to enroll in an English or Math course. Tuition and fees are based on the number of credits for which they register and are **INELIGIBLE** to receive financial aid. A guest (for credit) student may carry up to 15 hours per semester and may earn a maximum of 30 semester hours while maintaining guest status. A guest (for credit) student must maintain a 2.000 cumulative grade-point average. Guest (for credit) students who wish to exceed the 30-semester hour maximum must formally apply for admission. For information on Guest (for credit) Student Status for graduate students, see *Graduate Programs* section in catalog.

Auditor

An auditor is defined as a student who has been permitted to enroll in a course for which he or she will receive no credit. Auditors determine their own attendance, take no examinations, receive no grades, do not participate in classroom discussion except as permitted by the instructor and earn no credit. They pay the same tuition and fees as persons enrolled for credit. An auditor may not be reclassified to receive credit in the course after the drop period of the course has passed. In place of a grade, students receive the symbol NC (no credit) on their transcripts. Students wishing to register as auditors must declare their intention at registration and may not seek credit in the course after the drop period for the course has expired. Likewise, a student may not change his or her regular enrollment to auditor (no credit) status after the end of the drop period. Auditor (or no credit) forms are available in the Registrar's Office.

Senior Citizen

Persons 65 years of age or older, or 62 and retired, may audit courses without paying tuition on a space-available basis. Permission of the instructor is required in all cases. A grade of NC (no credit) will be posted.

FULL-TIME / HALF-TIME ENROLLMENT STATUS

Enrollment status (full-time, half-time) is determined by the number of credit hours which the student has completed or is pursuing for the term in which the certification is requested.

Credit hour requirements for enrollment verification (i.e., health insurance, auto insurance, loan deferments) are as follows:

Fall/Spring Semesters

Undergraduates
Full-time	12 or more credits
Half-time	6-11 credits
Less than half-time	Below 6 credits

Graduate Program
Full-time	9 or more credits
Half-time	6-8 credits
Less than half-time	Below 6 credits

Summer Session

Undergraduates
Full-time	6 or more credits
Half-time	3-5 credits
Less than half-time	Below 3 credits

Graduate Program
Full-time	6 or more credits
Half-time	3-5 credits
Less than half-time	Below 3 credits

You may print an Enrollment Verification Certificate online through PAWS or visit the Registrar's Office for certification of enrollment status and term(s) of attendance. (Please note that the above schedule for enrollment status may differ from the full-time/half-time schedule as recognized by Financial Aid.)

Verification of enrollment or loan deferments can only be processed for the term in which the student enrolled and paid tuition for the course(s). If a student receives an IN grade for a course(s) and continues working to complete the requirements for the course(s), he/she would not qualify for a verification of enrollment or loan deferment for that completion time beyond the initially enrolled term for that course(s).

GRADES AND THE GRADING SYSTEM

Awarding of Grades

Grades are earned by students and awarded by faculty.

The Grading System

The quality of a student's work is appraised according to letter grades and grade point averages. The grading system of Colorado State University-Pueblo includes the following grades: A, A-, B+, B, B-, C+, C, D+, D, D-, F, S, U, IN, W, WN, NC, IP. Faculty use of +/- grading is optional. Course instructors should indicate on the course syllabus and/or policy statement the grading system used in the course.

Grade		Grade Points per Credit
A	(Excellent)	4.00
A-		3.67
B+		3.33
B	(Good)	3.00
B-		2.67
C+		2.33
C	(Satisfactory)	2.00
D+		1.33
D	(Poor)	1.00
D-		0.67
F	(Failure)	0.00
S	(Satisfactory)	*
U	(Unsatisfactory)	**
IN	(Incomplete)	**
W	(Withdrawal)	**
WN	(Administrative Withdrawal or Nonpayment)	**
NC	(No Credit—Audit)	**
IP	(In Progress)	**

*   Credits not used to compute the grade-point average but counted toward graduation, excluding remedial courses.

**   Credits not used to compute grade-point average and not counted toward graduation.

D   Indicates below average achievement. Although grades of D+, D, and D- are passing, they do not constitute satisfactory grades. Many departments do not permit these grades to count toward fulfillment of their requirements, even though the hours may be counted toward graduation requirements. Such grades from other institutions are not accepted in transfer.

F   Counted as a course attempted; does not constitute a passing grade nor does it satisfy major or institutional requirements.

S   Available only in certain approved courses.

U   Available only in certain approved courses.

W   This grade is given under two conditions: 1) when a student withdraws or is withdrawn from a course prior to the end of the regular withdrawal period; 2) when a student withdraws totally from the University after the initial drop period.

IN   The grade of IN is recorded at the end of the term when a student is granted an extension of time to complete course work which could not be completed for reasons beyond the student's control. It is given solely at the discretion of the instructor and is not to be used to grant the student additional time to complete assigned course work due to poor time management. The student must be receiving a passing grade at the time an IN agreement is made, which may be no earlier than the end of the withdrawal period. The IN agreement consists of a

plan for the completion of the course work and must designate the student's existing grade in the course and the work to be completed for the IN to be removed. It must be in writing, signed by the instructor and the student, and placed on file in the Department office. An incomplete course must be satisfactorily completed within the time frame stipulated by the instructor but no later than one calendar year from the date the IN was given. An incomplete not removed within one calendar year shall revert to the pre-assigned grade and be included in the computation of the student's grade point average. Re-enrollment is not allowed while the IN is still outstanding. Adjunct faculty are not allowed to award grades of IN without approval from the Department Chair.

IP   A grade of IP may be given at the close of the term in certain approved courses. Students receiving an IP must register in the same course the next term, pay tuition and must complete the work during that term. Courses for which IP grades are accrued are identified in the *Course Description* section of this catalog.

Grade-Point Average Computation

Earned grade points are computed by multiplying the point value of A, A-, B+, B, B-, C+, C, D+, D, D-, and F grades earned by the number of credit hours of the course(s) in which the student was enrolled.* A student's term GPA is calculated by dividing total grade points by total credit hours attempted. A student's cumulative GPA is calculated by dividing total grade points earned by total credit hours attempted. Earned grades of S, U, W, WN, IP, IN and NC are not computed in the grade-point average. **For purposes of computing a student's grade-point average only CSU-Pueblo hours are used**.

*and rounding to one digit past the decimal

Grade Changes

Two signatures are required to successfully complete a faculty initiated student grade change. Since the faculty member is solely responsible for effecting a grade change, the Faculty signature is required. The second signature will be that of the Department Chair. In the event that the Department Chair is the instructor of the course, the second signature will be that of the Dean.

Grade Change Policy/Academic Appeals

Students have the right to appeal any academic decision, including the assignment of final grades. A grade-change request should be extremely rare. It is not appropriate to change a grade because the student submitted additional work.

Before making an appeal, the student must discuss the situation with the instructor(s) involved in the decision. If a grade change is approved by the instructor(s) on the basis of this discussion, the instructor(s) will complete and submit a grade change form.

If a grade change is not approved by the instructor(s), the student may appeal the instructor(s') grading decision based upon one or more of the following four grounds. The burden of proof rests with the student to demonstrate that the grading decision was made on the basis of any of these following conditions:

1) An instructor(s) made an error in calculating the original grade or a similar occurrence.
2) A grading decision was made on some basis other than performance and other than as a penalty for academic dishonesty.
3) A grading decision was based on standards unreasonably different from those that were applied to other students.
4) A grading decision was based on a substantial, unreasonable, or unannounced departure from previously articulated standards.

The student must submit a written grade appeal to the department chairperson. The written document must set forth the basis for the appeal, identifying at least one of the four categories set forth above. The request must be submitted, or postmarked if mailed, no later than 20 working days from the beginning of the next regular semester following the date the grade was recorded. If no appeal is received before the deadline, the grade will be considered final. It is strongly recommended that the student meet with the department chairperson within 10 working days after submission of the appeal to discuss the appeal process. The department chairperson, the dean, or any administrative official is prohibited from making a decision concerning the grade change appeal.

Within 20 working days of receipt of the written request for an appeal, the chairperson must provide a copy of the student's appeal to the instructor(s) who assigned the grade, the dean, and the Academic Appeals Board unless the appeal has been withdrawn. The instructor(s) must write a response to the Academic Appeals Board within 10 working days of receipt of the appeal. If the written request for an appeal is received prior to or during the summer session, when the instructor(s) who assigned the grade may not be available, the chairperson must provide copies to the faculty member and the Appeals Board no later than 20 working days from the beginning of the following fall semester. All documents submitted will become part of the student's academic file for their review.

The Academic Appeals Board will review the written appeal and response of the instructor(s). When needing further clarification, the Board may elect to separately

interview both the student and the instructor(s) before rendering a decision. The decision of the Academic Appeals Board will be based upon whether one or more of the conditions for an appeal set forth above have been met. At the conclusion of the deliberations, the Board will render one of the following decisions:

1) The original grading decision is upheld.
2) The Academic Appeals Board will re-evaluate the student's achievement of the instructional objectives of the course and assign a grade accordingly.

The Academic Appeals Board decision is the final decision of the University. Within 20 working days of reaching the decision, the Academic Appeals Board will provide written summaries of the hearing and decision, together with a rationale for that decision, to the student, the instructor(s) who assigned the grade, and the academic department of the instructor(s). Should the appeal result in a grade change, the Chair of the Academic Appeals Board will submit a grade change form to the Registrar's Office.

DEANS' LIST

All undergraduate students, including those enrolled in extended studies classes and those enrolled in a second baccalaureate degree program, are eligible for the Deans' List in a given semester provided they:

- Achieve a minimum semester grade-point average of 3.500;
- Are degree-seeking;
- Earn at least 12 credit hours at Colorado State University-Pueblo; and
- Receive no grade of "incomplete" (IN).

The Deans' List is generated and published fall and spring semesters by the Provost's Office, excluding summer.

GOOD ACADEMIC STANDING

The academic standing of all students is reviewed two times each year by the Center for Academic Enrichment, at the end of fall, and spring semester. Students must have a **cumulative grade point average of 2.000** or higher to remain in Good Academic Standing.

ACADEMIC PROBATION

Students are placed on academic probation at the end of any semester (excluding summer, and excluding first semester freshman year) in which their cumulative grade-point average falls below 2.000.

Academic Probation status is noted on the transcript. In addition, students receive a letter (Notification of Academic Probation Status) from the Center for Academic Enrichment. At this point, **students are strongly encouraged to develop an Academic Improvement Plan (AIP)** in collaboration with staff from the CSU-Pueblo's Center for Academic Enrichment.

Students on Academic Probation will have two semesters (excluding summer) to raise their cumulative grade-point average to a 2.000.

ACADEMIC SUSPENSION

Students who fail to clear Academic Probation after two regular semesters (excluding summer) will be placed on Academic Suspension.

Students placed on Academic Suspension cannot re-enroll at the University for a period of two consecutive semesters (excluding summer) unless they successfully appeal their suspension by the appeal deadline (see Appeal Process for Academic Suspension below).

Students placed on Academic Suspension who successfully appeal their suspension can return to the University on a Conditional Reinstatement.
Students on Conditional Reinstatement status will remain under the guidelines of the catalog in effect at the time of their regular admission.

Students on Academic Suspension who stay away from the University two consecutive semesters (excluding summer) following their notice of formal academic suspension must (a) be readmitted to the University, and (b) adhere to the requirements of the catalog in effect at the time they are readmitted to the University. Please see the *Catalog Requirement* section for more information.

Appeal Process for Academic Suspension

Students who want to appeal their Academic Suspension are responsible for initiating the process by submitting an Appeal Letter to the Center for Academic Enrichment. The Appeal Letter must address two issues: (1) why the Academic Suspension is being appealed, and (2) what the student will do to make an improvement in academic performance.

The deadlines for Appeal Letters requesting Conditional Reinstatement are:

- Subsequent fall semester—the 2nd Monday in June
- Subsequent spring semester—the 3rd working day of January

Failure to submit Appeal Letters within this prescribed time line will result in Academic Suspension for two consecutive semesters (excluding summer).

CLASS HOURS AND CREDIT HOURS

Colorado State University-Pueblo offers two traditional semesters (fall and spring), and 4, 6, and 12 week summer sessions. CSU-Pueblo's policies and practices are consistent with the credit hour definition provided by Colorado Department of Higher Education and the Higher Learning Commission. The University has adopted a standard lecture class minimum of 2,250 minutes of combined in-class (750 minutes) and out-of-class (1,500 minutes) time per credit hour per semester. The University's course schedule reflects the need to surpass this minimum to account for potential reductions that may be caused by inclement weather or other unforeseen circumstances.

In a traditional lecture course of three credit hours, sample calculations would be:

MWF 14 (weeks) x 55 (minutes) x 3 (days) = 2,310 minutes in-class, plus twice that amount outside-of-class: to this subtotal of 6,930 minutes we add 140 minutes for the final exam yielding a total of 7070 minutes.

Hybrid courses meet in-class for 25% to 75% of the required minutes and online courses meet 0% to 24% in-class, with both formats including the appropriate out-of-class minutes to exceed the required 2,250 minutes per credit per semester.

For more information regarding the credit hour, review the University's official Credit Hour Policy.

COURSE LOADS AND OVERLOADS

Enrollment in more than 18 credit hours in a given term is defined as an overload. Both resident and extended studies courses are counted in the credit-hour total.

Students who have earned 15 or more semester credit hours and have a grade-point average of 3.000 or greater are eligible to enroll for an overload.

Overloads must be authorized by student's faculty adviser and department chair (or dean if the adviser is the department chair). Both signatures are required. Appeals may be made to the dean of the college of the student's major. **Under no circumstances may a student enroll for more than a total of 25 semester credit hours in a single term.**

CREDIT BY EXAMINATION

A student may earn a maximum of 30 hours of credit by examination towards the minimum semester hours required for graduation regardless of the source type, (i.e., CLEP/DANTES, International Baccalaureate, advanced placement, and/or in-house departmental exams). Credit

by Exam is not counted as hours in residence. Types and methods of earning credit by examination are as follows:

1) **Advanced Placement**

   Colorado State University-Pueblo participates in the Advanced Placement Program of the College Entrance Examination Board. Under the program, outstanding secondary school students may take certain college-level courses in their own high schools. Students who have taken the Advanced Placement Examination and who have received scores of 3, 4, or 5 will generally be granted University credit as well as advanced placement; scores of 3 are not accepted in some subjects.

   CSU-Pueblo credit is awarded and posted on the transcript without a grade, is counted toward graduation, and may be used to fulfill specific requirements. For more information, please contact the Registrar's Office.

   Please refer to the Advanced Placement (AP) Equivalency Chart that shows the specific courses and credit to be awarded based on score(s) on the AP examination(s) located at the end of the *Academic Policies* section.

2) **College Level Examination Program**

   Credit earned by the student on these exams will be accepted by CSU-Pueblo and posted on the transcript provided the student submits an official CLEP/DANTES score report and has scored at or above established benchmarks. If a student has already earned college credit in an academic course(s) before taking CLEP/DANTES exam, the latter credit will be considered duplicate and will not be awarded. Please contact the Registrar's Office for additional information.

   Please refer to the CLEP and DANTES Equivalency Charts that shows the specific courses and credit to be awarded based on score(s) on the CLEP and DANTES examination(s) located at the end of the *Academic Policies* section.

3) **International Baccalaureate Diploma Program**

   Colorado State University-Pueblo recognizes and encourages high school students to participate in the International Baccalaureate Diploma Program. The University recognizes the IB program as a rigorous pre-university course of study for highly motivated secondary students. Students who successfully complete the IB program and examination(s) are eligible to receive credit and advanced placement standing at CSU-Pueblo.

To receive University credit, a student must take the IB exam(s) and request that the scores be sent to CSU-Pueblo Registrar's Office. Upon receipt of the scores, an evaluation for credit will be performed and the student will be notified by mail of the evaluation results in approximately two to four weeks.

A score of 4 or better on each exam will receive between 3-10 credits for most examinations. Students successfully completing an IB Diploma Program may be awarded a minimum of 24 semester credits. Students who have earned an IB Diploma with a score of less than 4 on any exam may be awarded less than 24 credits. Please refer to Colorado GB 03-1108 Section 1, sub section (VII) (2) (d) for additional information.

Please refer to the IB Equivalency Chart that shows the specific courses and credit to be awarded based on score(s) on the IB examination(s) located at the end of the *Academic Policies* section.

4) Credit by Examination (In-house subject area exams)

Departmental faculty shall identify those undergraduate courses, if any, for which students may earn credit by examination.

If a student is successful in challenging a course, the title of the course, credit hours and notation of credit by examination will be recorded on the student's permanent record/transcript. (Unsuccessful attempts are not recorded on the transcript.) The credit hours earned by examination do NOT count in the student's load for the term or in the calculation of the student's grade point average.

The non-refundable fee for credit earned by examination is $50 per course. Application forms for credit by examination are available from the Registrar's Office.

A student may earn credit by examination in any of the approved courses subject to the following conditions:

- The student has not previously earned credit in the course at CSU-Pueblo, has not previously failed a challenge exam for the course, or has not previously failed the course itself;
- The student has approval of the appropriate department chair (with appeal rights to the dean) to take the challenge examination;
- The student's performance on the examination is at the level of B or better;
- The student is currently enrolled at CSU-Pueblo and in good academic standing at the time the examination is administered;

- The student does not use the challenged course to satisfy the residency requirement for graduation; and
- The student satisfies any and all additional criteria as specified by the department.

5) General Education Test-Out Policy (In-House)

All courses satisfying general education requirements have a test-out procedure. The student does not receive a grade or credit for the course, nor does the test-out appear on the transcript.

Students wishing to test out of a course should contact the chair of the department offering the course. A student who successfully completes the test-out examination with a grade of B or better satisfies that particular general education requirement.

General education test-out examinations are free of charge.

FINAL EXAMINATIONS

Final examinations are not to be scheduled at times other than those published in the *Semester Notes* and on-line. In some courses a final examination may not be appropriate to the material; however, classes meet through the period scheduled for the final examination.

FACULTY RECORDS

All faculty members keep appropriate records (such as grade books or sheets) of each student's progress in every course offered for University credit. Records are retained by the faculty member's department for one year. They are treated in confidence by the faculty member, chair of the department, and staff.

REPEATING COURSES FOR ACADEMIC CREDIT

With certain restrictions, undergraduate students may repeat a course to raise the grade. Students do not accumulate graduation credits by repeating a course: a course's credits apply toward graduation only once, no matter how many times the course is repeated. ("Repeatable" courses are an exception to this rule; see below.) The first two times a course is repeated, only the highest grade is averaged into students' cumulative grade-point average. (For example, if a student earns an F, a C and a D in successive attempts with a course, only the C will be included in the student's cumulative GPA.) For the fourth and any subsequent time students complete the same course, the highest of the first three grades AND all subsequent grades are averaged into the GPA. (For example, if a student earns grades F, C, D and an A in successive attempts with a course, the C and the A are averaged into the student's cumulative grade-point average.)

Transcripts contain an appropriate entry of RP indicating that the course has been repeated and the grade-point average has been recomputed.

If a student transfers a course to CSU-Pueblo from another institution and then repeats the course at CSU-Pueblo, the credit and grade points from CSU-Pueblo will remain part of the cumulative hours and grade point average. In addition, if a student takes a course at CSU-Pueblo and then transfers the course from another institution, the credit and grade points from CSU-Pueblo will remain part of the cumulative hours and grade point average. Duplicate credit will not be granted.

CSU-Pueblo course grades cannot be recomputed using transfer courses. Students should be aware that some academic departments place limitations on repetition of courses for majors and/or minors. Once a degree has been posted, no repeats will be processed for the period used toward the degree.

INDIVIDUAL COURSES WHICH MAY BE REPEATABLE FOR CREDIT

Generally courses cannot receive duplicate credit. Some specified courses may be repeated for credit. These courses are designated by the word Repeatable in the *Course Description* section of this catalog. The number after the word Repeatable indicates the maximum number of credits that may be used toward degree requirements. The catalog in effect during the completion of the course will determine whether or not the course may be repeated for credit.

CLASS SCHEDULE CHANGES

Students are encouraged to secure adviser approval for all schedule changes. When students do not secure such approval, they assume full responsibility for their progress toward meeting degree requirements.

Students are responsible for processing schedule changes during the drop or add period for each course. **Under no circumstances** shall the instructor or adviser assume this responsibility on behalf of the student.

Continuing students are strongly encouraged to take advantage of the pre-registration process in order to obtain the class schedule which best meets their needs.

If you pre-register and subsequently choose not to attend, you are responsible for dropping all courses before the drop period.

Adding Courses/Late Add Policy

A student may add a course without instructor approval during the first week of the regularly scheduled semester. However, after the first week of the scheduled semester, a student can only add a course with the instructor's approval. Payment of a late fee is required to add courses after the drop/add period of a course has passed. After the 5th week a course may only be added with the approval of the instructor, the chair, and payment of a late fee. The Late Add Form must be completed in its entirety and must be submitted to the Registrar's Office (ADM 202) within 5 business days of the instructor signature. For short-term or summer courses, the Late Add Period is abbreviated and similar fees apply.

Addition of Independent Study and Extended Studies

A resident student may enroll in independent study and extended studies courses only if the addition of such courses will not cause his or her program to exceed the maximum load allowable.

Dropping Courses

Students may drop courses before 15% of the course duration has passed without a record of the dropped course appearing on the student's permanent record. Courses may be dropped officially in the Registrar's Office or processed through the Web Registration System (PAWS). The drop date of each course is printed on the student's schedule.

ADMINISTRATIVE DROP FOR NON-ATTENDANCE

CSU-Pueblo reserves the right to administratively drop all students from the University who fail to attend an enrolled course session at least once during the first two weeks of the semester. The University will attempt to contact the student before an administrative drop is enacted. This is done to ensure that CSU-Pueblo contributes to student success and accurately reports student enrollment.

If you pre-register and subsequently choose not to attend, you are responsible for dropping all courses before the drop period.

WITHDRAWAL FROM A COURSE

Immediately following the end of the drop period, students may withdraw from a course according to the policies below.

When a student withdraws from a course before 60 percent of the course duration has passed, a grade of "W" (withdrawal) will be recorded on the academic record. After 60 percent of the course duration has passed, a student may not withdraw. Tuition and fees will not be adjusted for course withdrawals during this withdrawal period. **Course withdrawals can be processed in the Registrar's Office or through the Web Registration System (PAWS).** The withdrawal date of each course is printed on the student's schedule.

FACULTY INITIATED STUDENT WITHDRAWAL

Under certain specific circumstances, a faculty member or the University may withdraw a student from a course or courses. The circumstances are either A or B below.

(A) Faculty may withdraw a student from a course for non-attendance if the student has never attended class through the end of the drop period. The course will be removed from the student's transcript and no grade will be issued. Withdrawal forms must be received by the Registrar's Office by 5:00 pm on the last day of the drop period.

(B) Faculty may withdraw a student for a designated number of absences or for any other reason as stated in the course syllabus with the student's signature acknowledging the withdrawal on the course withdrawal form. In the event that faculty efforts to contact a student concerning the withdrawal are unsuccessful, the signature of the department chair (or Dean if the Department Chair is the instructor of the course) acknowledging the withdrawal may be substituted for the student signature. The student will receive a grade of W for the course. Exceptions to the requirement of a student or department chair signature may be granted to programs by the Provost.

If a faculty member chooses to incorporate this policy, it must be stated in the course syllabus. The criteria to be met by the student which would trigger a Faculty Initiated Withdrawal of the student from the course must be stated in the policy. The criteria will also include the method by which the student will be informed by the faculty member of the impending withdrawal. As with the Student Initiated Withdrawal Policy, faculty may not initiate a student withdrawal after the official course withdrawal period has ended.

TOTAL WITHDRAWAL FROM THE UNIVERSITY

Up until the drop period expires, students may drop full-term courses without charge by using our web registration system (PAWS) or at the Registrar's Office. Short-term courses will have shorter drop periods. Students must refer to their course schedules for exact date for each course.

After the end of the drop period, students who are planning to withdraw from *all* courses and leave the University for any reason **must** begin the withdrawal process with the Center for Academic Enrichment (LARC 151) prior to departure. Total withdrawals will not be processed after the last scheduled class day of the semester. Students residing in the residence hall also must check out at the housing office. Unless the total withdrawal procedure is followed, students are not eligible for an adjustment (if appropriate) of tuition and fees and will receive failing grades in all courses.

Retroactive Withdrawal

A student may request that all grades in previous terms be retroactively removed and replaced by entries of "W" on his/her transcript if he/she had experienced, during that term, health and/or personal problems so severe that he/she could not reasonably have been expected to complete the term satisfactorily. Application for a retroactive withdrawal may occur any time after the current term and before conferral of a degree. The Retroactive Withdrawal request form must be submitted with supporting documentation to the Registrar's Office. Documentation must include specific information from a professional who can attest to the students' claim of illness or legal issues, speak clearly to the difficulty that was encountered by the student and correlate to the specific time frame requested. After a request is received by the Registrar's Office, it will be addressed by the Retroactive Withdrawal Committee. Once the request is reviewed and a decision is made, the student will be notified of the outcome by mail. If a student chooses not to share such information, the Student Academic Appeals Board will decide the case based on the information available.

If a student chooses to appeal the decision of the Retroactive Withdrawal Committee, the student must submit a formal appeal including thorough documentation as listed above. The appeal must be submitted, or postmarked if mailed, to the student Academic Appeals Board no later than 20 working days after the date of the initial decision of the Retroactive Withdrawal Committee. If no appeal is received before the deadline, the Retroactive Withdrawal Committee's decision will be considered final.

The Academic Appeals Board decision is the final decision of the University.

Examples of reasonable requests for retroactive withdrawal include:

1) Death of immediate family member
2) Serious personal/family problems
3) Unexpected deployment or relocation
4) Diagnosed physical or mental condition/illness

A retroactive withdrawal is not allowed if a student has already earned a degree from Colorado State University-Pueblo and the term being requested is prior to the degree conferral.

Retroactive withdrawal applies to every class for the requested term(s), not for selective courses during a term.

An approved retroactive withdrawal will have no impact on any financial balance owed to the University. Please contact Student Billing Services for Tuition Appeal Information.

Military Withdrawal

If military obligations interrupt the academic work of a member of the armed forces registered for courses, the student may ask instructors for an early termination of his or her courses. Early terminations may include, but are not limited to: 1) a grade of W; 2) an incomplete (IN) grade, if there is any chance the student will be able to complete the course requirements; 3) an early final examination and course grade; 4) partial course credit; or 5) an opportunity to complete the class by independent study. It is the student's responsibility to make such a request in writing to the instructor. After the student and instructor have agreed on the terms of early termination, the agreement must be approved in writing by the department chair and the dean.

MILITARY LEAVE OF ABSENCE

If a student member of the armed forces receives orders to deploy or temporally transfer stations for an extended period, that student may be accorded a military leave of absence. In those cases, the student will retain their catalog rights and return to the University at the end of their deployment or temporary transfer without break or need to reapply for admission.

EXPERIENTIAL CREDIT COURSES

Through cooperative education, internships, field experiences and laboratory research, students in many degree programs have the opportunity to expand knowledge and apply theory in real-life situations. All experiential credit courses occur under the direction of an academic instructor and are included in the regular University curriculum. In some cases, such courses are required for majors. All such courses require registration, payment of tuition, carry credit, are listed in the catalog and include a planned program of activities outlined in the course syllabus. The grading system is the same as the system used for regular courses.

DESIGNATED EXPERIENTIAL EDUCATION COURSES

CSU-Pueblo adopted Experiential Education as the focus of its 2017 Higher Learning Commission Quality Initiative (HLC QI) and engaged in a number of efforts toward promoting the pedagogy of experiential education campus-wide beginning 2013.

As a result of the QI, CSU-Pueblo began recognizing and designating courses with significant experiential education (EE) components. The EE designation may be extended to courses on a permanent or semester-by-semester (or section-by-section) basis. EE designated courses include:

1. At least 10 hours of experiential education course work per credit hour earned

2. Discussion of the definition, principles, and purpose of the Experiential Learning Cycle
3. Course objectives and learning outcomes tied to direct experience
4. Structured reflection
5. Activities aligned with experiential education principles
6. Assessment of student learning and effectiveness of the experience

Students in EE designated courses:

1. Conceptualize course material and engage theory with practice through posing questions, solving problems, and constructing meaning,
2. Are encouraged to engage in experimentation, and
3. Demonstrate evidence of knowledge constructed through experiential learning (i.e., portfolios, presentations, projects, performances, displays, etc.).

The Association of Experiential Education (AEE) definition and principles of EE inform the practice at CSU-Pueblo. The following is from http://www.aee.org/what-is-ee, with modifications approved by the CSU-Pueblo EE Roundtable, September 2015:

Experiential education is a philosophy that informs many methodologies in which educators purposefully engage with learners both in what John Dewey refers to as direct experience and in focused reflection in order to increase knowledge, develop skills, clarify values, and develop people's capacity to contribute to their communities.

Experiential learning theory defines learning as "the process whereby knowledge is created through the transformation of experience". Kolb's (1984) Experiential Learning Cycle (see Figure below) depicts the learning process as including four adaptive learning modes: concrete experience (CE), reflective observation (RO), abstract conceptualization (AC), and active experimentation (AE). Concrete experiences are the basis for the learners' reflections. The reflections are then assimilated into abstract concepts to be utilized in future contexts. These abstract concepts are then tested actively and serve to inform the learner when he or she is exposed to new experiences. This process is cyclical in nature where learners are exposed to each of the learning modes – experiencing, reflecting, thinking, and acting – in a recursive process that is dependent on the unique experiences and elements to be learned. Knowledge results from the combination of grasping and transforming experience.

Concrete Experience (doing / having an experience)

Reflective Observation (reviewing / reflecting on the experience)

Abstract Conceptualisation (concluding / learning from the experience)

Active Experimentation (planning / trying out what you have learned)
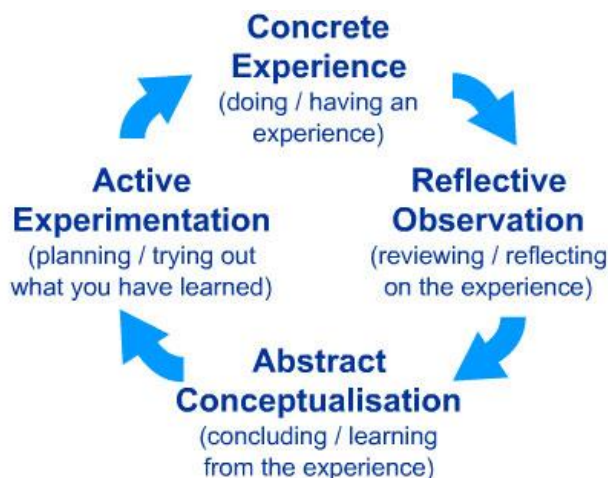
The principles of experiential education practice are:

- Experiential learning occurs when carefully chosen experiences are supported by reflection, critical analysis and synthesis.
- Experiences are structured to require the learner to take initiative, make decisions and be accountable for results.
- Throughout the experiential learning process, the learner is actively engaged in posing questions, investigating, experimenting, being curious, solving problems, assuming responsibility, being creative, and constructing meaning.
- Learners are engaged intellectually, emotionally, socially, and/or physically.
- The results of the learning are personal and form the basis for future experience and learning.
- Relationships are developed and nurtured: learner to self, learner to others and learner to the world at large.
- The educator and learner may experience success, failure, adventure, risk-taking and uncertainty, because the outcomes of experience cannot totally be predicted.
- Opportunities are nurtured for learners and educators to explore and examine their own values.
- The educator's primary roles include setting suitable experiences, posing problems, setting boundaries, supporting learners, insuring physical and emotional safety, and facilitating the learning process.
- The educator recognizes and encourages spontaneous opportunities for learning.
- Educators strive to be aware of their biases, judgments and pre-conceptions, and how these influence the learner.

CREDIT FOR PRIOR LEARNING

Prior learning is non-college or experience-based learning that has been attained outside of accredited postsecondary education systems. Credit for Prior Learning includes learning acquired from work and life experiences. It is awarded for college-level learning involving knowledge, skills, and competencies that students have obtained. CSU-Pueblo students may seek up to six hours of undergraduate academic credit for prior learning by contacting the academic department from which they would like the credits awarded. The department chair will describe the requirements and the process for obtaining prior learning credit.

TRANSCRIPTS OF CREDIT

Official transcripts are issued by the Registrar's Office at the **signed** request of the student. There is a non-refundable fee for each official transcript. Check with the Registrar's Office for current fees. Transcript fees must be prepaid before official transcripts will be released. Acceptable methods of payment are cash, personal check, money order, VISA, MasterCard and Discover. Special fees are charged for special handling (Priority, Express, International mail, and faxing).

All accounts with Colorado State University-Pueblo must be settled before an official transcript can be issued.

Transcripts are processed as rapidly as possible and are usually issued within five working days from the date the signed request is received in the Registrar's Office. Students should allow extra time for issuance near the end of term. Due to the processing of grades, transcripts (official or unofficial) for enrolled students will not be released during the week of finals and the following week. CSU-Pueblo does not accept e-mail or telephone transcript requests.

Faxing of Transcripts

A pre-paid fee is required for an unofficial transcript to be faxed to a destination within the United States; there also is a higher pre-paid fee required for a transcript faxed outside the country. Since faxed transcripts are considered as working (unofficial) documents only, the fax will be followed up by an official (hard copy) version to follow by first class mail within five working days.

How to Order a Transcript

Signed transcript requests should include the following information:

- Student's full name (including maiden or other name if applicable);
- Student's current address and phone number;
- Student ID number;
- Date of birth;
- The last term the student was enrolled at CSU-Pueblo;

- Instructions on whether the current term grades or degree conferral; are to be included (this is important when a transcript is ordered near the end of a term);
- The complete name and address of the agency, school or individuals to whom transcripts are to be sent;
- The student's signature (this provides CSU-Pueblo with the necessary authorization to release the transcript to the designee; and
- Payment method.

NOTES:

- Transcripts do **not** include Upward Bound, GED, ACT, SAT, GRE or college class rank information.
- If someone other than the individual named on the transcript has been authorized to pick up the document in person, they must provide a signed release from the person named on the transcript.

Payment of Transcripts

- If payment is to be made by credit card, please provide type (VISA, MasterCard or Discover), credit card number, expiration date, 3-digit CVV code on back of card, name of card holder, address of card holder and daytime phone number.
- If the order is for a faxed transcript, the following information is also needed:

  1) The fax number and name of the person to whose attention the transcript is to be sent.
  2) The name and address to which the subsequent official, hard copy transcript will be mailed.

GRADUATION CONTRACTS

Graduation Contracts for fall and spring semester are due no later than the fourth week of the graduating term.

Graduation Contracts for summer session are due no later than the third week of the 12-week summer session.

Students unable to complete degree requirements within the University deadlines will be required to submit a new Graduation Contract to the Registrar's Office in order to establish a new tentative degree conferral date.

COMMENCEMENT

Commencement exercises take place once a year, at the end of spring semester. Students eligible to participate include those who completed graduation requirements in the preceding summer and fall semester, as well as those who are scheduled to complete requirements in the spring semester. Candidates must appear in official academic regalia at commencement exercises. Petitions for exceptions to this policy must be submitted to the Provost's Office.

Utilizing data from official deadlines, the information for the commencement program is finalized in early March—changes, modifications, or updates received after that time may not be included.

The commencement program is not an official list of confirmed graduates or honors awarded. A final audit will determine degree conferral and academic accords

GRADUATION WITH UNIVERSITY HONORS

There are three levels of University (baccalaureate degree only) scholastic honors at graduation: *summa cum laude*, *magna cum laude* and *cum laude*. A minimum of 60 semester credits must be earned at CSU-Pueblo for a student to be considered for these honors. Remedial courses, credit within Academic Renewal, and credit by examination cannot be included in the 60 semester credits.

To graduate *summa cum laude*, a minimum cumulative grade point average of 3.900 is required; for *magna cum laude*, a minimum cumulative grade point average of 3.750 is required; and, for *cum laude*, a minimum cumulative grade point average of 3.500 is required.

While honors will be listed in the commencement program for those who may reasonably anticipate them, the listing in the program is not a guarantee of receiving honors. The listing and reading of *cum laude* status for degree candidates are based on the grade point averages achieved at the beginning of the student's final term. The official honor awarded, based on the final grade point average and hours earned in residence, will be noted on the student's diploma and transcript.

CLASS RANK

CSU-Pueblo does not maintain or provide class rank information.

DIPLOMAS

Diplomas are dated and awarded to graduating students each semester or session (fall, spring and summer) upon graduation clearance of each student. The spring commencement date and the last day of the summer and fall term are the dates recorded on diplomas and on the transcripts for all students fulfilling degree requirements within a degree granting period. The diploma is imprinted with the name of the degree awarded and the student's major(s). Minors, emphases, tracks, specializations, and concentrations are not printed on the diploma. Diplomas will be mailed to graduates approximately ten to twelve weeks after the end of the term in which the degree is conferred. All accounts with Colorado State University-Pueblo must be settled before a diploma will be awarded. Replacement diplomas may be issued upon signed

request from the original holder. Please check with the Registrar's Office for current diploma replacement fees.

POSTHUMOUS DEGREE

Colorado State University-Pueblo has a posthumous degree policy to confer a degree for eligible deceased students. Eligible students are those who were scheduled to graduate either in the term of his/her death or the next term, are in good academic standing, and have support of the department and college.

Please contact the Registrar's Office for specific information on the policy and process.

REGISTRATION

Advisement

All students are required to consult an academic adviser before registering for classes each term. The major area assigns academic advisers.

Undeclared academic advising for continuing and new undeclared transfer students will be handled by the Center for Academic Enrichment, located in the Library and Academic Resources Center, LARC, Room 151.

All first-year, first-time students are advised through the Center for Academic Enrichment located in the Library and Academic Resources Center, LARC, Room 151.

Registration

Registration dates are published in *Semester Notes* in advance of each registration period. Students can register through PAWS, with their adviser, or in the Registrar's Office.

Change of Address

Students should keep university authorities informed of their current address. Students may change their address on-line through PAWS or complete the Change of Address form and return completed form to the Registrar's Office.

Immunization Requirement

Colorado law requires all college students born since January 1, 1957, to be immunized against measles, mumps and rubella.

Proof of immunity consists of:

- Measles–one dose of live measles vaccine administered no sooner than four days before the first birthday and a second dose of live measles vaccine administered at least 4 weeks after the 1st dose or a blood test showing immunity to measles.

- Mumps–one dose of live mumps vaccine administered no sooner than four days before the first birthday and a second dose of live mumps vaccine administered at least 4 weeks after the 1st dose or a blood test showing immunity to mumps.
- Rubella–one dose of live rubella vaccine administered no sooner than four days before the first birthday and a second dose of live rubella vaccine administered at least 4 weeks after the 1st dose or a blood test showing immunity to rubella.

Medical, religious, or personal exemptions continue to be in effect. The exemption statement, on the certificate provided by the University, must be signed by a physician, parent, or student 18 years and older. In the event of an outbreak, exempted people may be subject to exclusion from school and quarantine.

Prior to registration please have verified immunization records sent to Student Health Services, Colorado State University-Pueblo, Pueblo, Colorado 81001-4901 or fax records to (719) 549-2646.

MMR (measles, mumps, and rubella) vaccine is available in Student Health Services if immunization records indicate that a booster is necessary. For further information, contact the Student Health Services Office at (719) 549-2830.

UNDERGRADUATE PROGRAMS

DEGREE REQUIREMENTS

Candidates for the baccalaureate degree must satisfy institutional and general education requirements, as well as specific requirements for a major.

INSTITUTIONAL REQUIREMENTS FOR ALL BACCALAUREATE DEGREES

1) Students must successfully complete a minimum of 120 semester hours of credit with an earned grade point average of 2.000 for all CSU-Pueblo hours attempted and included in the GPA computation. Courses numbered below the 100-level **cannot** be applied toward graduation; (i.e. ENG 099, MATH 091, 098, 099, RDG 099).
2) Students must successfully complete a minimum of 40 credit hours in upper-division courses (numbered 300-499). Upper division credit may be earned only through a four-year institution.
3) A minimum of 60 semester hours must be earned from a four-year institution.
4) A minimum of 30 semester hours of credit (as stated in the program of the major) must be earned in residence (courses taken from Colorado State University-Pueblo) with a minimum grade point average of 2.000 for all resident hours attempted. (Both on-campus and extended studies for-credit courses are considered resident credit.)

5) For degree purposes, CSU-Pueblo accepts a maximum of 60 semester hours from community or junior colleges.

6) For degree purposes, CSU-Pueblo accepts a maximum of 90 semester hours from other four-year institutions.

7) Of the last 60 semester hours earned immediately preceding graduation, no more than 30 may be completed at other colleges or universities.

8) A student may earn a maximum of 30 hours of credit by examination.

9) For degree purposes, CSU-Pueblo accepts no more than 90 credits in total through transfer or other assessment of prior learning.

10) Students must successfully complete the requirements for an approved major program. Some major programs may require completion of a minor or specific related courses outside the major field.

11) Students must achieve a minimum grade point average of 2.000 in their major field of study. (Some majors and programs require higher GPAs. Refer to specific program sections of this catalog for details.)

12) Students must achieve a minimum grade point average of 2.000 in their minor field of study.

13) Students must complete the Skills Component (English Composition I and II, and Mathematics) with a minimum overall GPA of 2.000.

14) Students must satisfactorily complete all general education requirements as defined and explained in the *General Education Requirements* section of the *Academic Policies* chapter of this catalog.

15) Candidates for the Bachelor of Arts degree must satisfy the foreign language requirement.

16) Degree candidates must file a completed *Graduation Planning Sheet* with the Registrar's Office no later than the third week of the semester prior to the graduating term (check *Semester Notes* on-line or with the Registrar's Office for specific deadlines).

17) Degrees are issued only at the close of each semester and summer session.

18) Degrees will be granted at the end of the term during which the student completes all degree requirements.

19) Additional majors, emphasis areas, or minors will not be awarded or posted to a transcript after a baccalaureate degree has been granted.

20) Once a baccalaureate degree has been awarded, the student cannot repeat courses in order to improve the undergraduate grade point average.

21) All accounts with Colorado State University-Pueblo must be settled before a diploma will be awarded or official transcripts will be issued.

MAJOR REQUIREMENTS

A baccalaureate candidate must select a major and successfully complete all requirements prior to receiving a degree. The minimum number of required semester hours varies by major but must include a departmentally approved program of **at least 30 semester hours of course work in the program of study.**

Emphasis Area/Track/Specialization/Concentration

Certain programs of study may specify emphasis areas, tracks, specializations or concentrations within majors. Only the official emphasis areas will be recorded on the transcript. Neither emphasis areas, nor tracks, nor specializations nor concentrations are printed on the diploma.

MINOR REQUIREMENTS

Minors consist of a sequence of courses in a specific academic discipline which is established by the department offering the minor. General education courses can apply towards the minor and major(s) unless otherwise stated. Upon graduation, completed majors and minors are recorded on the transcript. Minors are not printed on the diploma.

DOUBLE (SECOND) MAJOR

Students may choose to complete concurrently the requirements for two majors. Students seeking a double major must satisfy the requirements of both majors as stated by both departments involved under a single degree program. The single degree awarded is that degree appropriate for the first major. A single diploma is issued which displays both majors and both majors are recorded on the student's academic transcript.

DOUBLE (CONCURRENT) DEGREES

Students may choose to complete concurrently the requirements for two degrees. The second degree must be granted in a major area other than that in which the first baccalaureate degree is granted. The additional credits required for the second degree may be completed concurrently with the credits applying to the first degree and the two degrees may be granted simultaneously, providing all requirements are completed for both degrees. The total hour requirement is 150 earned hours. Simultaneous degrees require two separately completed degree planning sheets. Successful completion of concurrent degrees will result in two diplomas and both degrees are recorded on the student's academic transcript.

DEGREE-PLUS (SECOND BACCALAUREATE DEGREE)

A second baccalaureate degree may be granted in a major area other than that in which the first baccalaureate degree was granted provided the student has met all requirements for the second baccalaureate degree, including not fewer than 30 semester hours of Colorado State University-Pueblo (resident) credit beyond the first degree with a minimum grade point average of 2.000. The additional 30 hours of credit must have the approval of the department from which the second degree is to be earned.

Students seeking a second degree are eligible for the Deans' List.

Degree-plus students seeking a second baccalaureate degree are eligible for scholastic honors. To qualify for graduation with honors, a minimum of 60 semester credits must be completed with CSU-Pueblo after the first degree(s) are conferred. In determining the grade point average of a student, only grades earned after the first degree(s) are considered.

The general education and institutional requirements are considered complete if the student has earned a baccalaureate degree from a regionally accredited college or university, and is accepted to the University as a degree-plus student. Prior credit earned will not be posted to the CSU-Pueblo transcript; however, each department may internally consider approving prior credit earned toward certain requirements.

BACHELOR OF ARTS DEGREE: FOREIGN LANGUAGE REQUIREMENT

Students seeking the degree of Bachelor of Arts must complete one of the three options listed below:

1) Completion of the second level of a foreign language (course number 102).
   - Students may test out of the course.
   - Completion of a foreign language course above 102 with a grade of C or better will satisfy the requirement.
2) Completion of FL 100, Introduction to Comparative Linguistics, *and* ANTHR/ENG 106, Language, Thought and Culture.
3) Completion of the first and second level of American Sign Language.

International students for whom English is a second language may substitute two terms of English courses (excluding ENG 101 and ENG 102) for the foreign language requirement.

GENERAL EDUCATION REQUIREMENT

Graduates of Colorado State University-Pueblo are lifelong learners who have developed the intellectual and ethical foundations necessary for an understanding of and respect for humanity as well as the knowledge and skills necessary to adapt to the demands of a rapidly changing society.

To help students achieve these goals, the skills component of the CSU-Pueblo general education program is designed to give students the written communication and quantitative reasoning skills necessary for success in their undergraduate studies and future careers. The knowledge component is designed to give students direct experience in the methods of thought and inquiry in three central areas of academic endeavor: the arts and humanities; the social sciences; and the natural and physical sciences.

Upon completion of general education courses, students will:

- Use the English language to communicate with clarity, coherence and persuasiveness, demonstrating critical analysis, logic, precision and rhetorical awareness. (Communication)
- Identify, analyze and evaluate arguments and sources of information to make informed and logical judgments, to arrive at reasoned and meaningful arguments and positions, and to formulate and apply ideas to new contexts. (Critical Thinking)
- Articulate the nature of a multicultural society and recognize the role of aesthetic awareness, foreign language skills, cultural and social perspectives or human and institutional systems of the past and present. (Diversity and Social Responsibility)
- Clarify and evaluate their own values and ethical conduct and analyze the values and ethical conduct of others. (Personal Values and Ethics)
- Apply numeric, symbolic and geometric skills to formulate and solve quantitative problems. (Quantitative Reasoning)
- Apply the scientific method, laboratory techniques, mathematical principles and/or experimental design. (Scientific Reasoning)
- Identify and evaluate wellness principles, including mental, emotional and physical health, needed to make informed choices. (Wellness and Well-Being)

The Colorado guaranteed transfer program (gtPathways) is a set of general education courses that the state guarantees to transfer. Certain courses taken at Colorado public colleges and universities are guaranteed to transfer among all two- and four-year public institutions in the state. Up to 31 credit hours of successfully completed (C- or better) courses in general education will count toward general education or graduation requirements. These courses are not based on equivalencies but meet specific content and competency criteria. Additional information about gtPathways is available at http://highered.colorado.gov/Academics/Transfers/gtPathways/. The gtPathways courses offered at CSU-Pueblo are identified in the skills and knowledge components below. They are listed according to their appropriate gtPathways code, which is common among all gtPathways courses in Colorado.

The general education requirement for graduation includes a total of 35 semester credits in two categories:

Skills Component .... 9 credits
Knowledge Component .... 26 credits

TOTAL .... 35 credits

I. SKILLS COMPONENT

Candidates for the baccalaureate degree must satisfy institutional and general education requirements, as well as specific requirements for a major. (Students must successfully complete all remedial coursework within their first thirty [30] credits and the Skills Component of general education within their first sixty [60] credits. Transfer students must complete the Skills Component of general education by the end of their second semester at CSU-Pueblo.)

To complete the Skills component, students must successfully complete courses in the following content areas with a minimum overall GPA of 2.000:

Written Communication ..... (2 courses) .... 6 credits
Quantitative Reasoning ..... (1 course) .... 3 credits

TOTAL.. 9 credits

A. Written Communication

Take **each** of the following courses:

GT-CO1 (Introductory Writing Course)

ENG   101   Composition I .... 3 credits

GT-CO2 (Intermediate Writing Course)

ENG   102   Composition II .... 3 credits

B. Quantitative Reasoning

Take **one** of the following courses:

GT-MA1 (Mathematics)

MATH   109   Mathematical Explorations........ 3 credits
MATH   121   College Algebra .... 4 credits
MATH   124   Pre-Calculus Math .... 5 credits
MATH   126   Calculus and Analytic
                      Geometry I................................ 5 credits
MATH   156   Introduction to Statistics............ 3 credits
MATH   221   Applied Calculus: An Intuitive
                      Approach .... 4 credits

or any MATH course that includes one of these as a prerequisite. (If a MATH course is taken that is not one of the above listed GT-MA1 courses but does contain one of the above courses as a prerequisite, the MATH course taken will count toward the Quantitative Reasoning requirement at CSU-Pueblo but will not be guaranteed to transfer among all two-and four-year public institutions in the state.)

II. KNOWLEDGE COMPONENT

To complete the Knowledge component, students must successfully complete courses in the following content areas:

Humanities .... (3 courses) ....9 credits
History.................... (1 course)...........................3 credits
Social Sciences...... (2 courses)...........................6 credits
Natural and Physical Sciences
                      (2 courses with labs) ....8 credits

TOTAL ....26 credits

Students must take one course that is designated as cross-cultural. Courses taken to meet the Knowledge content area requirements may also be used to meet the cross-cultural requirement if they have a **(CC)** next to their listing.

Your major may recommend certain courses from this list. Refer to your major's catalog description for more information.

A. Humanities

GT-AH1 (Arts and Expression)

ART   100   Visual Dynamics *(CC)*
ART   211   History of Art I *(CC)*
ART   212   History of Art II *(CC)*
ENG   114   Introduction to Creative Writing *(CC)*
MUS   118   Music Appreciation *(CC)*
SPN   130   Cultures of the Spanish-Speaking
                    World *(CC)*

GT-AH2 (Literature and Humanities)

ENG   130   Introduction to Literature
ENG/CS   220   Survey of Chicano Literature *(CC)*
ENG   221   Masterpieces of Literature I
ENG   222   Masterpieces of Literature II
ENG   240   Survey of Ethnic Literature *(CC)*

GT-AH3 (Ways of Thinking)

PHIL   102   Philosophical Literature
PHIL   120   Islam and Non-Western Religions *(CC)*
PHIL   201   Classics in Ethics
PHIL   204   Critical Reasoning
PHIL   205   Deductive Logic

GT-AH4 (Foreign Languages)
(must be Intermediate/200 Level)

FRN   201   Intermediate French I *(CC)*
FRN   202   Intermediate French II *(CC)*
GER   201   Intermediate German I *(CC)*
GER   202   Intermediate German II *(CC)*

ITL	201	Intermediate Italian I *(CC)*
ITL	202	Intermediate Italian II *(CC)*
SPN	201	Intermediate Spanish I *(CC)*
SPN	202	Intermediate Spanish II *(CC)*

Humanities courses not designated as gtPathways
(Courses that will count for Humanities at CSU-Pueblo; but are not guaranteed to transfer among all two-and four-year public institutions in the State.)

| FL | 100 | Introduction to Comparative Linguistics *(CC)* |
| COMR | 103 | Speaking and Listening |

Foreign Language

ASL	101	Beginning American Sign Language I *(CC)*
ASL	102	Beginning American Sign Language II *(CC)*
FRN	101	Beginning French I *(CC)*
FRN	102	Beginning French II *(CC)*
GER	101	Beginning German I *(CC)*
GER	102	Beginning German II *(CC)*
ITL	101	Beginning Italian I *(CC)*
ITL	102	Beginning Italian II *(CC)*
RUS	101	Introduction to Russian I *(CC)*
RUS	102	Beginning Spoken Russian II *(CC)*
RUS	201	Intermediate Russian I *(CC)*
RUS	202	Intermediate Russian II *(CC)*
SPN	101	Beginning Spanish I *(CC)*
SPN	102	Beginning Spanish II *(CC)*

B. History

GT-HI1 (History)

CS	101	Introduction to Chicano Studies *(CC)*
HIST	101	World Civilization to 1100 *(CC)*
HIST	102	World Civilization from 1100 to 1800 *(CC)*
HIST	103	World Civilization since 1800 *(CC)*
HIST/CS	136	Southwest United States *(CC)*
HIST	201	US History I
HIST	202	US History II

C. Social Sciences

GT-SS1 (Economic or Political Systems)

ECON	201	Principles of Macroeconomics
ECON	202	Principles of Microeconomics
POLSC	101	American National Politics
POLSC	201	International Relations *(CC)*
SOC	201	Social Problems
SW	205	Social Welfare in the United States

GT-SS2 (Geography)

| GEOG | 103 | World Regional Geography *(CC)* |

GT-SS3 (Human Behavior, Culture, or Social Frameworks)

ANTHR	100	Cultural Anthropology *(CC)*
CS/SW	230	Chicanos: Social and Psychological Study *(CC)*
MCCNM	101	Media and Society
PSYCH	100	General Psychology
PSYCH	151	Human Development
PSYCH	222	Understanding Animal Behavior
SOC	101	Introduction to Sociology

Social Science courses not designated as gtPathways
(Courses that will count for Social Science at CSU-Pueblo; but are not guaranteed to transfer among all two-and four-year public institutions in the State.)

ANTHR/ ENG	106	Language, Thought and Culture *(CC)*
POLSC	202	Comparative Politics *(CC)*
PSYCH/SOC/WS	231	Marriage, Family and Relationships
PSYCH	251	Childhood and Adolescence
SOCSC	209	African American Studies *(CC)*
WS	100	Introduction to Women's Studies *(CC)*

D. Natural and Physical Sciences

GT-SC1 (Course with Required Laboratory)

BIOL	100/L	Principles of Biology with Lab
BIOL	121/L	Environmental Conservation with Lab
BIOL	181/L	College Biology I/Organismal Bio with Lab
BIOL	182/L	College Biology II/Cellular Bio with Lab
BIOL	201/L	Botany with Lab
BIOL	223/L	Human Physiology & Anatomy I with Lab
BIOL	224/L	Human Physiology & Anatomy II with Lab
CHEM	101/L	Chemistry and Society with Lab
CHEM	111/L	Principles of Chemistry with Lab
CHEM	121/L	General Chemistry I with Lab
CHEM	122/L	General Chemistry II with Lab
CHEM	125/L	Environmental Science with Lab
CHEM	160/L	Introduction to Forensic Science with Lab
GEOL	101/L	Earth Science with Lab
GEOL	114/L	Oceanography with Lab
PHYS	110/L	Astronomy with Lab
PHYS	140/L	Light, Energy and the Atom with Lab
PHYS	201/L	Principles of Physics I with Lab
PHYS	202/L	Principles of Physics II with Lab
PHYS	221/L	General Physics I with Lab
PHYS	222/L	General Physics II with Lab

Natural and Physical Sciences courses not designated as gtPathways
(Courses that will count for Natural and Physical Sciences at CSU-Pueblo; but are not guaranteed to transfer among all two-and four-year public institutions in the State.)

| BIOL | 202/L | Zoology with Lab |
| EXHP | 162/L | Personal Health with Lab |

PHYS   145/L A Survey of Global Energy Resources
               with Lab

III. COURSE SUBSTITUTIONS/WAIVERS

Substitutions and/or waivers for courses fulfilling general education requirements may be approved by the appropriate department chair and reviewed by the Registrar.

ASSESSMENT OF STUDENT LEARNING

Colorado State University-Pueblo is committed to providing quality education and to assuring students gain the knowledge and skills necessary to be successful after they graduate. Assessment of student learning in general education, undergraduate majors and minors, certificates, and graduate programs is central to our on-going improvement efforts.

Students will periodically participate in assessment by submitting examples of their course work, participating in focus groups, completing questionnaires, and sitting for standardized exams. Faculty and staff use assessment results to determine the extent to which students demonstrate competency in their field of study, and to improve courses and curricula, teaching practices, and other activities.

The assessment process for all academic programs contains the following common elements:

1) Student learning outcomes for undergraduate major and stand-alone minor programs, certificates, and graduate programs are set by faculty and communicated widely;
2) Student learning outcomes are evaluated by faculty using generally accepted best practices in assessment;
3) Faculty and others use assessment information to improve programs as appropriate; and
4) Information about assessment is reported to stakeholders, including the Board of Governors of the Colorado State University System, the Colorado Commission on Higher Education, professional accreditors, and the Higher Learning Commission.

In recognition of the evolutionary nature of accountability and assessment processes, the University acknowledges that they may change at any time. The University will make reasonable efforts to inform students and other stakeholders of modifications.

The University and its departments also conduct satisfaction and other types of surveys before and after students graduate. Students and alumni are strongly encouraged to respond to these surveys so that the information may be used to improve our campus.

GRADUATION RATE

Under the Students Right to Know and Campus Security Act of 1990, colleges and universities are required to publish the graduate rate of first-time undergraduate students. This graduation rate is defined as the percentage of first-time undergraduate students who complete their bachelor's degree, at CSU-Pueblo, within six years of their initial enrollment. First-time undergraduate students are defined as full-time, degree seeking undergraduate students who enroll at Colorado State University-Pueblo with no previous college experience.

The University's average graduation rate for the most recent 3-year average of entering cohorts is 33%, a rate comparable with graduation rates of other regional public institutions in Colorado.

STUDENT BILL OF RIGHTS—FOUR YEAR GRADUATION AGREEMENT

C.R.S. 23-1-125. Commission directive –student bill of rights

The General Assembly hereby finds that students enrolled in public institutions of higher education shall have the following rights:

a) Students should be able to complete their associate of arts and associate of science degree programs in no more than sixty credit hours or their baccalaureate programs in no more than one hundred twenty credit hours unless there are additional degree requirements recognized by the commission;
b) A student can sign a two-year or four-year graduation agreement that formalizes a plan for that student to obtain a degree in two or four years, unless there are additional degree requirements recognized by the commission;
c) Students have a right to clear and concise information concerning which courses must be completed successfully to complete their degrees;
d) Students have a right to know which courses are transferable among the state public institutions of higher education;
e) Students, upon completion of core general education courses, regardless of the delivery method, should have those courses satisfy the core course requirements of all Colorado public institutions of higher education;
f) Students have a right to know if courses from one or more public higher education institutions satisfy the student's degree requirements;
g) A student's credit for the completion of the core requirements and core courses shall not expire for ten years from the date of initial enrollment and shall be transferrable.

FREEDOM OF EXPRESSION AND INQUIRY

Colorado State University-Pueblo considers freedom of discussion, inquiry, and expression to be consonant with the history and traditions of our country and a cornerstone of education in a free society. CSU-Pueblo is committed not just to valuing and respecting diversity, but also to respecting diverse viewpoints. CSU-Pueblo encourages members of the University community to engage in discussion, to exchange ideas and opinions, and to speak, write, and publish freely in accordance with the guarantees and limitations of our state and national constitutions.

Faculty and students have not only a right, but also a responsibility, to examine critically the insights, understandings, values, issues, and concerns which have evolved in the various areas of human activity. Accordingly, University-registered student organizations may extend invitations for guest lecturers, exhibitors, performers, and exhibitions of works of art with no restrictions of form or content other than those imposed by law and University policy. It is understood that inviting a speaker, performer, or exhibit does not imply concurrence of the University or of the sponsoring organization with the opinions, beliefs, or values expressed. In exercising their rights, members of the University community should understand that the public may judge the institution by their actions. Hence, they should at all times strive to be honest and accurate, exercise appropriate restraint, and show appropriate respect for the opinions of others.

Any members of the campus community (students, faculty, or staff) who feel that they have been treated unfairly because of their views should contact the Director of Equal Opportunity/Affirmation Action and Title IX Coordinator, the Office of Student Conduct, or the Director of Diversity and Inclusion.

Advanced Placement (AP) – Equivalency Chart 2016-2017

AP Exam	Score	Course Number	Class Equivalent	Credits Received	Gen Ed Group
Art History	3 or 4	ART 211	History of Art I	3 credits	H
	5	ART 211 & 212	History of Art I & II	6 credits	H
Art, Studio Drawing	3, 4 or 5	ART 141	Drawing I	3 credits	
Art, Studio 2D Design	3, 4 or 5	ART	Elective	3 credits	
Art, Studio 3D Design	3, 4 or 5	ART	Elective	3 credits	
Biology	3	BIOL 100/L	Principles of Biology & Lab	4 credits	ST
	4 or 5	BIOL 181/L BIOL 182/L	Coll Biology I/Organismal Biology & Lab Coll Biology II/Cellular Biology & Lab	4 credits 4 credits	ST ST
Calculus AB	3, 4 or 5	MATH 126	Calculus and Analytic Geometry I	5 credits	M
Calculus BC	3	MATH 126	Calculus and Analytic Geometry I	5 credits	M
	4 or 5	MATH 126 MATH 224	Calculus and Analytic Geometry I Calculus and Analytic Geometry II	5 credits 5 credits	M M
Chemistry	3	CHEM 111/L	Principles of Chemistry & Lab	4 credits	ST
	4	CHEM 121/L	General Chemistry I & Lab	5 credits	ST
	5	CHEM 121/L CHEM 122/L	General Chemistry I & Lab General Chemistry II & Lab	5 credits 5 credits	ST ST
Chinese Language and Culture	3	FL 101	Intro to Critical Foreign Language I	3 credits	H
	4	FL 101 & 102	Intro to Critical Foreign Language I & II	6 credits	H
	5	FL 101, 102 & Elective	Intro to Critical Foreign Language I & II Elective	6 credits 3 credits	H H
Computer Science A	3	CIS	Elective	3 credits	
	4 or 5	CIS	Elective	4 credits	
Computer Science Principles	3	CIS	Elective	3 credits	
	4 or 5	CIS	Elective	4 credits	
Economics (Macroeconomics)	3, 4 or 5	ECON 201	Principles of Macroeconomics	3 credits	SS
Economics (Microeconomics)	3, 4 or 5	ECON 202	Principles of Microeconomics	3 credits	SS
English Language and Composition	3 or 4	ENG 101	Composition I	3 credits	E
	5	ENG 101 & 102	Composition I & II	6 credits	E
English Literature and Composition	3 or 4	ENG 130	Intro to Literature	3 credits	H
	5	ENG 101 ENG 130	Composition I Intro to Literature	3 credits 3 credits	E H
Environmental Science	3, 4 or 5	CHEM 125/L	Environmental Science & Lab	4 credits	ST
European History	3	HISTORY	General Education History Elective	3 credits	HS
	4 or 5	HISTORY	General Education History Elective	6 credits	HS
French Language and Culture	3	FRN 201	Intermediate French I	3 credits	H
	4	FRN 101 & 201	Beginning French I & Inter. French I	6 credits	H
	5	FRN 101, 102 & 201	Beginning French I & II Intermediate French I	6 credits 3 credits	H H
German Language and Culture	3	GER 201	Intermediate German I	3 credits	H
	4	GER 101 & 201	Beginning German I & Inter. German I	6 credits	H
	5	GER 101, 102 & 201	Beginning German I & II and Intermediate German I	6 credits 3 credits	H H
Government & Politics: Comparative	3, 4 or 5	POLSC 202	Comparative Politics	3 credits	SS
Government & Politics: United States	3, 4 or 5	POLSC 101	American National Politics	3 credits	SS
Human Geography	3, 4 or 5	GEOGRAPHY	General Education Elective	3 credits	SS

Italian Language and Culture	3	ITL 201	Intermediate Italian I	3 credits	H
	4	ITL 101 & 201	Beginning Italian I & Inter. Italian I	6 credits	H
	5	ITL 101, 102 & 201	Beginning Italian I & II Intermediate Italian I	6 credits 3 credits	H H
Japanese Language and Culture	3	FL 101	Intro to Critical Foreign Language I	3 credits	H
	4	FL 101 & 102	Intro to Critical Foreign Language I & II	6 credits	H
	5	FL 101, 102 & Elective	Intro to Critical Foreign Language I & II Elective	6 credits 3 credits	H H
Latin	3	FL 101	Intro to Critical Foreign Language I	3 credits	H
	4	FL 101 & 102	Intro to Critical Foreign Language I & II	6 credits	H
	5	FL 101, 102 & Elective	Intro to Critical Foreign Language I & II Elective	6 credits 3 credits	H
Music Theory	3, 4 or 5	MUSIC	Elective	3 credits	
Physics I	3, 4 or 5	PHYS 201/L	Principles of Physics I & Lab	4 credits	ST
Physics II	3, 4 or 5	PHYS 202/L	Principles of Physics II & Lab	4 credits	ST
Physics C: Electricity & Magnetism	3, 4 or 5	PHYSICS	General Education Elective & Lab	5 credits	ST
Physics C: Mechanics	3. 4 or 5	PHYSICS	General Education Elective & Lab	5 credits	ST
Psychology	3, 4 or 5	PSYCH 100	General Psychology	3 credits	SS
Spanish Language and Culture	3	SPN 201	Intermediate Spanish I	3 credits	H
	4	SPN 101 & 201	Beginning Spanish I & Inter. Spanish I	6 credits	H
	5	SPN 101, 102 & 201	Beginning Spanish I & II Intermediate Spanish I	6 credits 3 credits	H H
Spanish Literature	3	SPANISH	Elective	3 credits	
	4	SPANISH	Elective	6 credits	
	5	SPANISH	Elective	9 credits	
Statistics	3, 4 or 5	MATH 156	Introduction to Statistics	3 credits	M
United States History	3	HIST 201	U.S. History I	3 credits	HS
	4 or 5	HIST 201 & 202	U.S. History I & II	6 credits	HS
World History	3	HIST 101	World Civilization I	3 credits	HS
	4 or 5	HIST 101 & 103	World Civilization I & III	6 credits	HS

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KEY:
Gen Ed Group= General Education Category
E=English
M=Math
HS=History
H=Humanities
SS=Social Science
ST=Natural Science

CLEP Equivalency Chart 2016-2017

Name of Exam	ACE Recommended Score Through 6/2001	ACE Recommended Score 7/2001-Current	Course Number	Class Equivalent	Credits	Gen Ed Group
American Government	47	50	POLSC 101	Amer National Politics	3	SS
American Literature	46	50	ENG 210 & 212	Amer Literature I & II	6	
Analyzing & Interpret Literature	47	50	ENG 130	Intro to Lit	3	H
			Elective	Elective	3	H
Biology	46	50	BIOL	Elective (no Lab credit)	3	ST
Calculus	41	50	MATH 126	Calc & Analytic Geom I	5	M
Chemistry	47	50	CHEM 111/L	Prin of Chemistry & Lab	4	ST
College Algebra	46	50	MATH 121	College Algebra	4	M
College Algebra/Trigonometry	46	50	MATH 121	College Algebra	4	M
College Composition		50	ENG 101 & 102	Composition I & II	6	E
Coll Comp Modular w/Essay		50	ENG 101	Composition I	3	E
Coll Comp Modular w/o Essay		50	ENG 101	Composition I	3	E
College Mathematics	420-500	50	MATH 109	Math Explorations	3	M
English Comp with Essay	420-500	50	ENG 101 & 102	Composition I and II	6	E
English Comp without Essay	420-500	50	ENG 101 & 102	Composition I and II	6	E
English Literature	46	50	ENG 231 & 232	Lit of England I and II	6	
Financial Accounting	NA	50	ACCTG 201	Prin of Financial Acctg	3	
French Language, Level I	42	50	FRN	FRN 101 & 102	6	H
French Language, Level II	45	59	FRN	FRN 101, 102, 201 & 202	12	H
Freshman College Composition	44	50	ENG 101 & 102	English 101 & 102	6	E
German Language, Level I	36	50	GER	GER 101 & 102	6	H
German Language, Level II	42	60	GER	GER 101, 102, 201 & 202	12	H
History of US I: to 1877	47	50	HIST 201	U.S. History I	3	HS
History of US II: 1865-Present	46	50	HIST 202	U.S. History II	3	HS
Human Growth & Development	45	50	PSYCH 151	Intro Human Develop	3	SS
Humanities	420-500	50	ART	Elective	6	H
Info Sys & Computer Apps	52	50	CIS	Elective	3	
Introduction to Business Law	51	50	BUSAD	Elective	3	
Intro to Educational Psychology	47	50	PSYCH	Elective	3	
Introduction to Psychology	47	50	PSYCH 100	General Psychology	3	SS
Introduction to Sociology	47	50	SOC 101	Intro to Sociology	3	SS
Natural Science	420-500	50	BIOL	Elective (no Lab credit)	6	ST
Pre-Calculus	NA	50	MATH 124	Pre-Calculus Math	5	M
Principles of Macroeconomics	44	50	ECON 201	Prin of Macroeconomics	3	SS
Principles of Microeconomics	41	50	ECON 202	Prin of Microeconomics	3	SS
Principles of Management	46	50	MGMT 201	Prin of Management	3	
Principles of Marketing	50	50	MKTG 340	Prin of Marketing	3	
Social Science & History	420-500	50	SOC	Sociology Elective	3	SS
			HIST	History Elective	3	HS
Spanish Language, Level I	45	50	SPN	SPN 101 & 102	6	H
Spanish Language, Level II	50	63	SPN	SPN 101, 102, 201 & 202	12	H
Trigonometry	50	50	MATH 122	College Trigonometry	3	M
Western Civilization I	46	50	HIST	Elective	3	HS
Western Civilization II	47	50	HIST	Elective	3	HS

**If a student has already earned college credit in an academic course(s) before taking CLEP/DANTES exams, the latter credit will be considered duplicate and will not be awarded

General Education: E=English, H=Humanities, HS=History, M=Math, SS=Social Science, ST=Science & Technology
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DSST (DANTES) Equivalency Chart 2016-2017

Name of Exam	Acceptable Score	CSU-Pueblo Equivalent		Credits	Gen Ed Group
		Course Number	Course Equivalent		
Art of the Western World	48	ART	Elective	3	H
Astronomy	48	PHYS 110	Astronomy (without lab)	3	ST
Business Ethics and Society	400	BUSAD 302	Ethics in Business (Upper Division)	3	
Business Law II	44	BUSAD	Elective (Upper Division)	3	
Business Mathematics		NT	Not Transferrable		
Civil War & Reconstruction	47	HIST	Elective (Upper Division)	3	
Criminal Justice	49 or 400	SOC	Elective (Upper Division)	3	
Substance Abuse	49 or 400	EXHP 201	Drugs/Healthy Lifestyle (Upper Division)	3	
Environment & Humanity	46	BIOL	Elective (without lab)	3	ST
Ethics in America	46 or 400	PHIL	Elective (Lower Division)	3	H
Foundations of Education	46	ED 202	Foundation of Education	3	
Fund of College Algebra	47 or 400	MATH	Elective (Lower Division)	3	M
Fundamentals of Counseling	45	PSYCH	Elective (Lower Division)	3	
General Anthropology	47	ANTHR	Elective (Lower Division)	3	SS
Here's to your Health	48 or 400	EXHP	Elective (Upper Division)	3	ST
History of the Vietnam War	44	HIST	Elective (Upper Division)	3	
Human Resource Management	46	MGMT 318	Human Resource Mgmt (Upper Division)	3	
Human/Cultural Geography	48	GEOG	Elective (Lower Division)	3	SS
Introduction to Business	46 or 400	BUSAD 101	Bus Careers & Opportunities	3	
Introduction to Computing	45 or 400	CIS 150	Computer Info Systems	3	
Intro to Law Enforcement	45	SOC	Elective (Lower Division)	3	
Intro to Modern Middle East	47	POLSC	Elective (Lower Division)	3	
Intro to World Religions	48 or 400	PHIL	Elective (Lower Division)	3	H
Lifespan Developmental Psych	46	PSYCH 151	Intro Human Development	3	SS
Management Info Systems	46 or 400	MGMT 365	Management Info Systems (Upper Division)	3	
Money & Banking	48	BUSAD	Elective (Upper Division)	3	
Organizational Behavior	48	MGMT	Elective (Upper Division)	3	
Personal Finance	46 or 400	BUSAD	Elective (Lower Division)		
Physical Geology	46	GEOL	Elective (No Lab, Lower Div)	3	ST
Principles of Finance	46 or 400	FIN 330	Prin of Finance (Upper Division)	3	
Prin of Financial Accounting	49	ACCTG 201	Prin of Financial Accounting	3	
Principles of Physical Science I	47	PHYS	Elective (No Lab, Lower Div)	3	ST
Principles of Public Speaking	47	COMR 103	Speaking & Listening	3	H
Principles of Statistics	48	MATH 156	Intro to Statistics	3	M
Principles of Supervision	46 or 400	BUSAD	Elective (Lower Division)	3	
Rise & Fall of the Soviet Union	45	HIST	Elective (Upper Division)	3	
Technical Writing	46	ENG	Elective (Lower Division)	3	
Western Europe since 1945	45	POLSC	Elective (Lower Division)	3	

General Education: H=Humanities, M=Math, SS=Social Science, ST=Science and Technology

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International Baccalaureate Equivalency Chart 2016-2017

IB Exam	Score	Course Number	Class Equivalent	Credits	Gen Ed Group
Anthropology – HL	4-7	ANTHR 100 Elective	Cultural Anthropology Elective	3 3	SS SS
Anthropology – SL	4-7	ANTHR 100	Cultural Anthropology	3	SS
Art History – SL	4-7	ART	Elective	3	H
Astronomy – SL	4-7	PHYS 110/L	Astronomy & Lab	4	ST
Biology – HL	4-7	BIOL 181/L BIOL 182/L	Coll Biology I/Organismal Biol & Lab Coll Biology II/Cellular Biology & Lab	4 4	ST ST
Biology – SL	4-7	BIOL 100/L	Principles of Biology & Lab	4	ST
Business Management – HL	4-7	MGMT BUSAD	Elective Elective	3 3	
Business Management – SL	4-7	MGMT	Elective	3	
Chemistry – HL	4-7	CHEM 121/L CHEM 122/L	General Chemistry I & Lab General Chemistry II & Lab	5 5	ST ST
Chemistry – SL	4-7	CHEM 111/L	Principles of Chemistry & Lab	4	ST
Computer Science – HL	4-7	CIS	Elective	6	
Computer Science - SL	4-7	CIS	Elective	3	
Dance – HL	4-7	EXHPR	Elective	3	
Dance – SL	4-7	EXHPR	Elective	3	
Design Technology	No Credit				
Economics – HL	4-7	ECON 201 ECON 202	Prin of Macro Economics Prin of Micro Economics	3 3	SS SS
Economics – SL	4-7	ECON	Elective	3	SS
English A Language & Literature – SL (Native Language)	4-7	ENG 101	Composition I	3	E
English A Language & Literature – HL (Native Language)	7	ENG 101 &102 ENG 130 Elective	Composition I, Composition II Intro to Literature Elective	6 3 3	E H
	6	ENG 101 &102 ENG 130	Composition I & Composition II Intro to Literature	6 3	E H
	5	ENG 101 ENG 130	Composition I Intro to Literature	3 3	E H
	4	ENG 130	Introduction to Literature	3	H
English A Literature – HL (Native Language)	7	ENG 130 ENG elective	Introduction to Literature Elective	3 9	H
	6	ENG 130 ENG elective	Introduction to Literature Elective	3 6	H
	5	ENG 130 ENG elective	Introduction to Literature Elective	3 3	H
	4	ENG 130	Introduction to Literature	3	H
English A Literature – SL (Native Language)	4-7	ENG 130	Introduction to Literature	3	H
Environmental Systems – SL	4-7	BIOL 121	Environmental Conservation	3	ST
Film – HL	4-7	ENG	Elective	6	
Film – SL	4-7	ENG	Elective	3	
Foreign Language A1 – HL (Native Language)	4-7	FRN, GER, ITL, SPN	Upper Division Foreign Language Elective	6	
Foreign Language A1 – SL (Native Language)	No Credit				

Foreign Language B – HL (Non-Native Language)	6-7	FRN, GER, ITL, SPN 101, 102, 201, 202, 303	Beginning I, II, Intermediate I, II & Conversation & Composition	12 3	H
	5	FRN, GER, ITL, SPN 101, 102, 201 & 202	Beginning I, II, Intermediate I & II	12	H
	4	FRN, GER, ITL, SPN 101, 102, & 201	Beginning I, II, & Intermediate I	9	H
Foreign Language B – SL (Non-Native Language)	4-7	FRN, GER, ITL, SPN 101, 102	Beginning I, II	6	H
Foreign Language AB – SL (Non-Native Language)	4-7	FL 101 FL 102	Intro Critical Foreign Language I Intro Critical Foreign Language II	3 3	H H
Geography – HL	4-7	GEOG 101 GEOG 103	Physical Geography World Regional Geography	3 3	SS
Geography – SL	4-7	GEOG 103	World Regional Geography	3	SS
20th Century World History & History of Africa – HL	4-7	HIST	Elective	6	HS
20th Century World History & History of the Americas – HL	4-7	HIST 201 & 202	U. S. History I & II	6	HS
20th Century World History & History of Asia/OCE – HL	4-7	HIST	History General Education	6	HS
20th Century World History & History of Europe/ M.E. – HL	4-7	HIST 102 HIST	World Civilization from 1100 - 1800 Elective	3 3	HS
20th Century World History – SL	4-7	HIST 102	World Civilization from 1100 - 1800	3	HS
History of Europe and the Islamic World – HL	4-7	HIST	History General Education	6	HS
History of Europe and the Islamic World – SL	4-7	HIST	Elective	6	HS
Information Technology– SL	4-7	CIS	Elective	3	
Latin – Higher or SL	4-7	FL 101	Intro Critical Foreign Language	3	H
Math Studies – SL	4-7	MATH 121	College Algebra	4	M
Mathematics – HL	4-7	MATH 126 MATH 224	Calculus & Analytic Geometry I Calculus & Analytic Geometry II	5 5	M M
Mathematics – SL	4-7	MATH 126	Calculus & Analytic Geometry I	5	M
Math (Further) – SL	4-7	MATH 109	Mathematical Explorations	3	M
Music – HL	4-7	MUS 150	Music Theory I	3	
Music – SL	4-7	MUS 118	Music Appreciation	3	H
Music Performance–SL	4-7	MUS	Elective	3	
Philosophy – HL	4-7	PHIL 102 Elective	Philosophical Literature Elective	3 3	H H
Philosophy – SL	4-7	PHIL 102	Philosophical Literature	3	H
Physics – HL	4-7	PHYS 201/L PHYS 202/L	Principles of Physics I & Lab Principles of Physics II & Lab	4 4	ST ST
Physics – SL	4-7	PHYS 140/L	Light, Energy, and the Atom & Lab	4	ST
Psychology – HL	4-7	PSYCH 100 Elective	General Psychology Elective	3 3	SS SS
Psychology – SL	4-7	PSYCH 100	General Psychology	3	SS
Theatre – HL	4-7	TH	Elective	6	H
Theatre – SL	4-7	TH	Elective	3	H
Visual Arts HL	4	ART 100	Visual Dynamics	3	H
	5-7	ART 100 Elective	Visual Dynamics Elective	3 3	H
Visual Arts SL	4-7	ART 100	Visual Dynamics	3	H
World Religions SL	4-7	PHIL	Gen Ed Elective	3	H

Key: SL=Standard Level, HL=Higher Level, E=English, M=Math, HS=History, H=Humanities, SS=Social Science, ST=Natural Science

04/27/16

SPECIAL ACADEMIC PROGRAMS

UNIVERSITY STUDIES

The University Studies Program offers students opportunities to take courses in areas generally not available through the University's departmental structures. These include such interdisciplinary programs as the First-Year Experience, as well as individual courses that will contribute to the student's University education but are not available through other departments or programs.

PRESIDENT'S LEADERSHIP PROGRAM

Director: Shelly Moreschini

The President's Leadership Program (PLP) at Colorado State University-Pueblo is a competitive, cohort-based, multidisciplinary program with a strong experiential emphasis that leads to a minor in Leadership Studies. The curriculum includes a core of five three-credit-hour courses and a minimum of three credit hours of approved elective courses selected from leadership-related courses offered on campus.

The vision of the President's Leadership Program is to create multiculturally-competent transformational leaders who will serve the communities in which they live and work. Crucial to the development of participants' leadership skills and practices are the acquisition of intercultural competence, social consciousness and civic responsibility, as well as ethical and altruistic attitudes and behaviors.

Potential scholars must be admitted to Colorado State University-Pueblo as full-time students. Applications to the PLP must demonstrate academic excellence, leadership potential, and community service experience. Throughout their time in the program, PLP scholars may be eligible for scholarship consideration and/or financial assistance, based on merit and program participation.

President's Leadership Program Goals

- To provide a sequence of courses and professional placements centered in the concept of trans-formational leadership.
- To offer challenging experiential opportunities for students in diverse leadership settings.
- To showcase individual student interests and goals through mentorship, personal development strategies, and internship placements.

Requirements for PLP Scholars

Students must remain in good academic standing within the program, maintaining a minimum cumulative grade point average of 3.000. Program participants are expected to be involved in extra-curricular activities on campus and in the community, and must adhere to the PLP Standards and Expectations, as outlined in the PLP Student Handbook distributed at the Scholar Orientation and Retreat each August. All students are expected to volunteer 30 hours of community service each semester.

Student Learning Outcomes

Scholars in the President's Leadership Program will complete the minor in Leadership Studies. Through this minor program, students will focus on six learning outcomes as described below:

- **Self-Leadership:** PLP scholars will understand, synthesize, and evaluate their personal readiness for leadership by communicating effectively through written and oral means as measured by course assignments and a final portfolio.
- **Ethics:** PLP scholars will manifest an understanding of leadership ethics and service to others, and illustrate, analyze and assess ethical behaviors as demonstrated in written work and oral presentation.
- **Leadership Theory:** PLP scholars will describe, apply and criticize major leadership theories, and will be prepared to assess their own leadership qualities in relation to theoretical principles.
- **Critical Thinking:** PLP scholars will understand the methods and skills needed for critical thinking and decision-making and be prepared to interpret situations and cases beyond surface arguments.
- **Problem Solving:** PLP scholars will apply problem-solving skills through faculty-directed classroom project assignments and by taking on volunteer and community service projects.
- **Civic Engagement:** PLP scholars will understand the importance of civic engagement and community activism as measured through volunteerism, community and campus service, team projects and class assignments.

Outcomes Assessment Activities

Assessment of the Leadership Studies minor is the responsibility of the PLP faculty, staff, and students. The following tracking processes are in place to gather information and evaluate student progress in the following ways:

- Course syllabi, sample project portfolios and presentations, and related survey data will remain on file in the office of the President's Leadership Program for use in appropriate assessment activities.

- The executive director and academic director routinely advise students on the Leadership Studies minor and maintain academic records and progress reports on current minors.
- PLP students participate in nationally-normed standardized testing on an annual basis.
- Scholar reports and portfolios are reviewed on a semester by semester basis to determine levels of learning outcome success.
- Students are asked to evaluate all minor courses, serve on PLP committees, and to serve on focus groups to provide feedback and input for PLP activities.
- Student volunteer service hours are tracked, reviewed, and analyzed each semester.
- PLP faculty and students participate in Colorado Leadership Alliance activities to ascertain best practices and to arrange leadership activities for students in the statewide organization. PLP faculty members affiliate with the Association of Leadership Educators.

Program Admissions

The PLP focuses on first-time, full-time students who meet the minimum program admission requirements and must submit all of the components of the application, which includes:

- PLP Application Form (available online).
- Essay on a Leadership Topic (see application form).
- Resume (including personal objectives, education, work experience, school and community leadership experiences, honors and awards).
- Two letters of recommendation from professionals (teachers, principals, pastors, employers, etc.).
- Copy of Official High School Transcript.

All application information is available on the PLP website. Students who have been accepted into other college-level leadership programs, and wish to transfer into CSU-Pueblo's PLP must apply through the Director. All applicants are interviewed by a PLP Selection team and are accepted at the discretion of this committee based on the admissions criteria.

Timelines

To meet the preferred deadline, application materials must be received by **March 1st**. The applications will be screened and interviews with the Selection Committee will be scheduled.

Leadership Studies Minor
(Prerequisite: Acceptance into President's Leadership Program)

Requirements:

Courses		Titles	Credits
PLP	160	Principles of Leadership	3
PLP	260	Leadership in Service Organizations	3
PLP	360	Applied Leadership	3
PLP	460	Working with Experienced Leaders	3
		OR	
PLP	489	Field Placement in Leadership	3
COMR	103	Speaking and Listening	3
		(or an equivalent college-level public speaking course)	
Approved Electives (minimum)			3
		TOTAL	18

Students may choose from the following electives to complete the minor in Leadership Studies. Students are encouraged to diversify their course selections. **Only one course may count in both the student's major and the Leadership Studies minor**. Special topics courses related to leadership and new courses approved in other disciplines may also be approved on a case by case basis. Students should check with the PLP Academic Adviser for a current roster of specific additions. (In some cases, prerequisites or permission of instructor may be required for enrollment. See *Course Descriptions* section of catalog for information and requirements about all courses.)

Courses		Titles	Credits
BUSAD	270	Business Communication	3
BUSAD	302	Ethics in Business	3
EXHP	436	Exercise Assessment	3
MCCNM	370	Non-Profit Organizations and Communication	3
MGMT	201	Principles of Management	3
MGMT	301	Organizational Behavior	3
PHIL	201	Classics in Ethics	3
PHIL	204	Critical Reasoning	3
POLSC	405	The American Presidency	3
PSYCH	311	Theories of Personality	3
PSYCH	315	Industrial/Organizational Psychology	3
PSYCH/ SOC	352	Social Psychology	3
REC	270	Outdoor Leadership I	2
REC	350	Leadership and Ethics	3
REC	370	Outdoor Leadership II	2
SOC	432	Organization Theory	3
PLP	491	Special Topics	3

The President's Leadership Program staff recommends at least one course focusing on the issues of diversity, either as a general education offering or as it relates to leadership, to prepare students for leadership in a multicultural world. Considering the benefits of a multidisciplinary education, students should select electives from more than one discipline.

UNIVERSITY HONORS MINOR PROGRAM

Director: John O'Connor

The University Honors minor at CSU-Pueblo provides high-achieving students with enhanced learning opportunities to stimulate their engagement and development, both within an intellectual community of scholars, and as citizens of the wider university community and the world. The Honors minor curriculum provides students with special opportunities for interaction with faculty in thought-provoking seminars and intensive guided research, as well as experiential and service-learning projects.

Program Goals

- To provide opportunities for enriched work for high-achieving students.
- To offer small classes that permit challenging study of advanced material and increased interaction with faculty who will serve as academic and pre-professional mentors.
- To provide students with an interdisciplinary approach to academic research through seminars and experiential learning, culminating in individual projects supervised by faculty.

Expected Student Learning Outcomes

Honors Program students should be able to:

- Formulate and develop arguments with sufficient support, including reasoning, evidence, persuasive appeals, and proper attribution.
- Integrate knowledge from diverse perspectives, disciplines, and skill sets, both theoretical and applied, to hone them into arguments and/or strategies.
- Apply discipline-specific as well as cross-discipline-based knowledge to design, execute, and report on a specific problem-solving strategy.
- Make substantial leadership contributions to advancing personal and group work.
- Behave ethically as demonstrated in all performance categories, including classroom, extracurricular, community-based service learning, and independent research areas.

Program Admission Requirements

Criteria for admission to the CSU-Pueblo University Honors Minor Program:

1) **Incoming freshmen** to Colorado State University-Pueblo are encouraged to apply for the Honors Program if they graduated high school with a GPA of 3.8 or a minimum combined ACT score of 26, or a minimum combined SAT score of 1200. An index system determines final eligibility.

2) **Undergraduate transfer students and current CSU-Pueblo undergraduate students** with a minimum grade point average of 3.5 are encouraged to apply for membership in the Honors Program. Two letters of recommendation from faculty members addressed to the Honors Program Director are also required.

3) **Admission of non-honors students** into honors courses is at the discretion of the faculty member teaching the course, with the approval of the Honors Director. Non-honors students may enroll in a maximum of two honors courses. They may, however, apply for admission to the Honors Program if their overall grade-point average and their honors coursework are commensurate with the general standards for admission.

General Requirements

- University Honors Minor Program students must maintain a 3.5 cumulative GPA at CSU-Pueblo to remain in good standing in the program. Students who do not meet the requirement will receive a single one semester probation period permitted before they are removed from the program and forfeit program awards. Students must maintain appropriate Honors standards as well, and may also be removed from the program by the Honors Director, in consultation with the Honors Steering Committee, for failing to uphold other Program commitments (e.g., failing Honors courses, failing to attend Honors seminars, and inappropriate behavior on service-learning assignments). To receive program credit, each required Honors Minor course must be passed with a B (3.0) or better.

Honors Minor Requirements

Courses	Titles	Credits
HONOR 101	Foundations of Knowledge	1
HONOR 101L	Foundations of Knowledge Lab	1
HONOR 201	Art and Science of Human Experience	2
Honors General Education Courses		6
Honors Upper Division Course		3
	(requires Honors Director approval)	
HONOR 310	Honors Group Project	3
HONOR 380	Honors Service-Learning	2
	(1 cr. taken twice for total of 2 cr.)	
HONOR 481	Senior Honors Thesis	3
	TOTAL	21

Outcomes Assessment

Assessment for Honors seminars is based on short research papers each semester involving the use of academic resources and material covered by seminar speakers. Assessment of service learning experiences is based on journals submitted by students and on evaluations provided by site supervisors. Assessment of Honors courses and supervised research will be conducted by the faculty supervisor in the appropriate academic department. An assessment plan is on file with the University and will be updated annually.

Contact Information

Contact the University Honors Program for further information at: (719) 549-2429.

CSU-PUEBLO ONLINE

In Spring 2016, CSU-Pueblo offered its first online degree completion program through CSU-Pueblo Online, the bachelor's degree in construction management. The Bachelor of Science degree in Construction Management, http://csupuebloonline.co/academic-programs/construction-management/, combines skill sets obtained through course work in Civil Engineering Technology and business combined with construction management courses to prepare students for the fast-paced construction industry. The program provides students with industry current and relevant skills necessary to manage construction-related projects. The program composition enables the student to work in heavy-civil infrastructure or commercial-residential-industrial projects. The online model offers students the opportunity to retool or work on career advancement without having to return back to the campus environment. The online degree is flexible and convenient by design. With CSU-Pueblo Online, students can take classes without fixed schedules, available to you 24 hours a day, 7 days a week, anywhere that you have internet access. Courses are offered in eight-week modules, allowing you to earn your degree at your own pace, on your own terms. CSU-Pueblo Online offers one tuition rate, regardless of your location, which is locked in for the entire sequence of courses taken for a degree provided the student is making adequate academic progress. Please contact CSU-Pueblo Online for current tuition rates. Tuition discounts are available for those military service members who qualify.

Contact Information:

Website: http://csupuebloonline.co
Email: admissions@csupuebloonline.co

COOPERATIVE EDUCATION

Cooperative education provides an educational plan in which periods of study and periods of career-related work are combined in one program, individualized for each student. Students earn a salary and acquire academic credit in their majors while experiencing, on a temporary basis, their chosen career.

The experience gives cooperative education students an opportunity to become well-acquainted with the employer which, in many cases, leads to permanent placement upon graduation. All cooperative programs are administered by the academic departments.

UNIVERSITY PROGRAMS AND SERVICES

ATHLETICS

The Colorado State University-Pueblo Athletic Department offers 22 varsity intercollegiate sports, which compete at the NCAA Division II level.

For the women, CSU-Pueblo offers golf, soccer, basketball, tennis, volleyball, softball, cross-country, indoor track & field, outdoor track & field, lacrosse, swimming, and diving.

On the men's side, the ThunderWolves compete in soccer, basketball, baseball, tennis, golf, football, wrestling, lacrosse, cross country, indoor track & field, and outdoor track & field.

CSU-Pueblo is a member of the Rocky Mountain Athletic Conference (RMAC) which consists of 15 member institutions throughout the states of Colorado, New Mexico, South Dakota, Nebraska, and Utah.

Pack Athletics have won two team national championships, 75 RMAC championships, 84 national tournament appearances, eight regional tournament championships and 35 team top ten finishes. CSU-Pueblo has also crowned 210 All-Americans, of which 63 have been named in the past 12 years.

For more information, please visit the CSU-Pueblo athletics website at http://www.gothunderwolves.com.

Rawlings Outdoors Sports Complex

Colorado State University-Pueblo's Rawlings Sports Complex houses the CSU-Pueblo baseball, softball, men's and women's soccer, and men's and women's lacrosse programs.

The Rawlings Sports Complex features a 2,500-seat baseball facility, Rawlings Field, and the four-diamond Rawlings Softball Complex, as well as the Rawlings

Soccer/Lacrosse Complex. The areas are used by sports teams for training and for use by student and public groups.

Neta and Eddie DeRose ThunderBowl

Home of CSU-Pueblo's football and men's & women's track and field programs, the ThunderBowl features 6,500 seats, a synthetic turf field, a ten-lane all-weather track, throwing, jumping and pole vault areas, as well as a 27,000 square-foot field house, which includes a 9,400 square-foot strength and conditioning complex for all 22 of CSU-Pueblo's intercollegiate athletics programs, team meeting areas, student-athlete study-areas and lounges, and track and football coaches' offices.

Massari Arena

Massari Arena seats 3,900 fans and is the home of CSU-Pueblo men's and women's basketball, wrestling, and volleyball programs. The arena includes one section of premium chair back seating and a luxury box overlooking the arena, dubbed "The Wolf Pack Room".

CENTER FOR ACADEMIC ENRICHMENT

Academic Improvement Program

The Academic Improvement Program helps students on academic probation develop an individualized plan for improving their academic standing. Contact us in LARC 151 or call (719) 549-2584.

First-Year Student Advising

All first-year, first-time students are advised through the Center for Academic Enrichment. The First-Year Advising program advises and orients new students during their first year in college. This program advises students for appropriate course selection and gives students the information and guidance they need to be successful college students. The Center for Academic Enrichment is located in the Library and Academic Resources Center (LARC), Room 151, and can be reached by phone at (719) 549-2584. Also, look on the web at http://www.csupueblo.edu/fyp.

Undeclared Academic Advising for Continuing and New Transfer Students

The Center for Academic Enrichment Academic Adviser works with new transfer and continuing students who are undeclared, students changing their major and undeclared students interested in exploring majors and learning how majors connect to careers. The adviser also assists students with course selection and registration. Undeclared advising is located in LARC 151. To schedule an appointment call: (719) 549-2584.

Gen Ed Tutoring Center

The Gen Ed Tutoring Center provides individual and group tutoring for general education courses in humanities, history, and social sciences as well as ENG 099, ENG 111, and RDG 099. For more information visit us in LARC 251 or call us at (719) 549-2901.

Writing Room

The Writing Room provides an inviting atmosphere where students can receive advice and positive feedback on any type of writing from research papers, letters, and writing assignments to poetry and fiction. Visit us in LARC 251, online at http://www.csupueblo.edu/owl, or call us to make an appointment at (719) 549-2901.

CENTER FOR INTERNATIONAL PROGRAMS

The Center for International Programs (CIP) is responsible for the recruitment, admission, enrollment, and retention of international students at CSU-Pueblo. Some of the services provided are: housing placement, airport pick-up, student orientations, cultural activities, Bureau of Citizenship and Immigration Services (BCIS) advising, assistance with academic concerns, and English tutorial services. All services are free of charge.

CIP staff maintains an open door policy, ensuring that every international student has an opportunity to be heard and helped when needed. Typically, there are at least 40 countries represented during any given term. Student academic success within the entire international population is the primary goal.

- **Orientation:** All new international students to CSU-Pueblo are required to participate in a two-day mandatory orientation upon arrival. During orientation, new students will be administered English, math, and reading placement exams. Results will indicate registration into the appropriate course(s) and do not interfere with admission to the University.
- **Activities:** International students are encouraged to participate in all activities offered by CSU-Pueblo. In addition, the CIP hosts individual events throughout the academic year. Annual events include the welcome and graduation parties, the International Extravaganza, holiday celebrations, and other cultural programs.
- **English Language Institute:** The ELI of CSU-Pueblo, an Extended Studies program, offers those lacking English proficiency a way to become proficient for entrance into university level coursework. ELI provides high quality English instruction in a fully-integrated university setting. Students are offered conditional letters of acceptance into regular major programs, pending proof of language proficiency. Contact: intprog@csupueblo.edu for further information.

- *Sports***:** International students are encouraged to participate in collegiate and intramural sports offered at CSU-Pueblo. In addition, the CIP supports and organizes informal sporting teams as desired.
- *English Tutoring:* All international students are able to obtain free tutoring, as needed, in the area of language skill development. Individual and group appointments can be made accordingly in the CIP. Other academic tutoring is available across campus in various academic subjects.

The CIP is also the origination point for those CSU-Pueblo students interested in Study Abroad and Student Exchange Programs. Such opportunities allow CSU-Pueblo students to study in accredited universities throughout the world.

National Student Exchange (NSE)

National Student Exchange (NSE) is a program of over 200 colleges and universities that assist undergraduate students in attending American universities in almost every state and several U.S. territories for up to one year.

Instead of crossing oceans, NSE students cross state, regional, provincial, and culture borders.

Federally-funded financial aid may be used by eligible NSE participants enrolling at U.S. member colleges and universities.

Interested students can contact the Center for International Programs (CIP) and speak with the NSE coordinator, who will assist you in finding the right university with the right combination of courses, facilities, and environment to meet student's academic, personal needs, and interests. The CIP is located in the Psychology Building, Room 152. Phone: (719) 549-2329/or 549-2764.

Study Abroad Programs

Colorado State University-Pueblo values the benefit of an education that includes international experiences. Consequently, the University encourages students with second language proficiency, when appropriate, to enroll in the CSU-Pueblo Study Abroad Program. Students wishing to increase cultural awareness, second language proficiency or competency in subjects offered in international settings, are encouraged to contact the CIP. Study abroad opportunities for CSU-Pueblo students are presently available in accredited universities in: France, Germany, Italy, Korea, Mexico, the Czech Republic and Thailand. Some schools teach in English; therefore, second language proficiency may not be required.

For more information call (719) 549-2329, e-mail: intprog@csupueblo.edu or visit the CIP website at http://www.csupueblo.edu/InternationalPrograms. Contact

may be made directly with the study abroad coordinator by visiting Room 152 in the Psychology Building.

EXTENDED STUDIES

The University makes available a broad array of credit and non-credit courses, seminars and workshops through Extended Studies. Some programs are offered on campus and others at off-campus sites more convenient to persons living outside of Pueblo.

Off-campus instruction sites include the Tower Location in Colorado Springs and Fort Carson.

Both degree- and non-degree seeking students may participate in Extended Studies programs. (Only degree-seeking students are eligible for financial aid.) Persons desiring classification as degree-seeking students in the External Degree Completion Program must fill out the External Degree Completion Application. Credit courses taken through the Colorado State University-Pueblo Extended Studies program have the same credit value as those conducted on campus and may be used in meeting the institutional residency requirement.

A primary aim of Extended Studies is to provide courses to part-time students. A variety of educational methods – classroom instruction, correspondence courses, on-line courses, conferences, workshops and seminars – are utilized to expand educational access and meet the needs of students at convenient times and settings. Students may earn academic credit toward a degree, study for career advancement, or pursue cultural and avocational interests.

Extended Studies courses are of varied lengths. Intensive classes usually are held in the evening or on weekends for the convenience of working students. Independent study courses offer students the opportunity to complete print-based courses at their own pace over a six month time period. Although the majority of course offerings are initiated by the University, courses may originate through requests by individuals and interested groups. Such special request courses may take place either on or off campus.

Extended Studies also administers programs in partnership with high schools through the High School University Bridge (HUB) programs. These programs include Senior to Sophomore and Concurrent Enrollment. The Senior to Sophomore (STS) program enrolls eligible high school students in dual-credit courses which are delivered by highly qualified teachers on the high school campus. The Concurrent Enrollment program enrolls eligible Colorado high school students in college credit courses in accordance with Colorado Concurrent Enrollment policy. These courses may be offered on or off campus. Student enrolled in the High School University

Bridge (HUB) programs are not eligible for Financial Aid, however, some students may receive financial assistance from their home high school.

In-house training programs, administered under the Conference and Short Courses Program, are available to meet the ever-changing needs of business and industry. The programs can be designed to meet the specific needs of an organization and may be presented at the company site or, if requested, at the University. Similar services are available to school districts in partnership with the Teacher Education Program.

For more information contact Extended Studies: phone 1-800-388-6154, or at our website: http://extendedstudies.csupueblo.edu.

CSU-PUEBLO BOOKSTORE

The Colorado State University-Pueblo Bookstore is conveniently located in the Occhiato University Center and is open to the campus community and to the general public throughout the year. The bookstore's essential role is to serve as the primary academic bookseller and provider of supplies for students and the campus in support of the academic programs and events of the University community. Regular bookstore hours are Monday-Friday from 8:00 a.m. to 5:00 p.m. Extended store hours for the Textbook Rush period are posted at the beginning of the Fall and Spring semesters.

The CSU-Pueblo Bookstore carries a variety of products including textbooks and course materials, general books, office and art supplies, laptops, officially licensed ThunderWolves apparel and gifts, and assorted food and snack products. Computer software at educational prices is available to students, faculty, and staff. The CSU-Pueblo Artist Showcase, a cooperative venture between the University Art Department and bookstore, features the art and pottery of students, faculty, and alumni with items displayed available for purchase. Various sales and special events are held in the bookstore throughout the year. ThunderWolves apparel, gifts, and souvenirs are available at the Neta & Eddie DeRose ThunderBowl for all home football games and at the Massari Arena for many other Game Day sports events. Customers may take advantage of convenient 24/7/365 shopping online through the bookstore website at: http://www.csupueblobookstore.com.

To help keep educational expenses down, the bookstore staff aggressively seeks as many used textbooks as possible to offer students for their courses. The store conducts several on-campus buybacks throughout the year and online through its website. Textbook buybacks give students a financial return for their unwanted textbooks, and recycles these books both on campus and in the general college store market.

Dates when students can charge their textbooks to their student accounts are published on the bookstore website and in PAWS. Visa, MasterCard, Discover, debit cards, and charges to Student Accounts may be used at the bookstore and online when making purchases. Current students, faculty, and staff may load their campus ID card with ThunderBucks that can be used at the bookstore and get a 10% discount on many items (textbooks, software, calculators, and markdowns are excluded).

We invite you to visit the bookstore in person, to contact us at (719) 549-2146 during our regular store hours, and to email us anytime at: csu-pueblobookstore@csupueblo.edu.

FOOD SERVICE LOCATIONS

Campus food services are located in several areas on campus for your convenience. They are as follows:

Due to construction and renovation of the Occhiato University Center in 2016-2018, the hours and location of the PackCafé and La Cantina may be adjusted. Please call Auxiliary Services at 719-549-2149, if you have any questions.

PackCafé is located on the main floor of the Occhiato University Center. This location is the main dining operation for residential students dining on a meal plan. It is also open to the public for a one time door rate. It is open for service during the operating hours below.

Monday thru Friday

Breakfast	7:15 a.m. -	9:30 a.m.
Continental	9:30 a.m. -	11:00 a.m.
Lunch	11:00 a.m. -	2:30 p.m.
Late Lunch	2:30 p.m. -	5:00 p.m.
Dinner	5:00 p.m. -	7:15 p.m.

Saturday and Sunday

Brunch	10:30 a.m. -	1:30 p.m.
Dinner	5:00 p.m. -	6:30 p.m.

La Cantina is located on the lower level of the Occhiato University Center and is open during the Fall & Spring semesters while classes are in session. There is a wide variety of retail dining concepts from made-to-order hamburgers, burritos, beverages, and other grab-and-go items. The hours of operation are:

Monday thru Thursday	7:00 a.m. -	6:00 p.m.
Friday	7:00 a.m. -	3:30 p.m.

The Pavilion is located just west of the Hasan School of Business. This location serves as a "grab-and-go" for food and drink. The hours of operation are Monday through Friday, 7:30 a.m. - 1:30 p.m.

The Bistro is located on the main level of the Culebra Residence Hall on the north side of campus. Late night snacks and other grab-and-go favorites are offered daily. The hours of operation are as follows:

Sunday thru Thursday ....6:00 p.m. - 12:00 a.m.
Friday and Saturday ....6:00 p.m. - 10:00 p.m.

Café Libro is located on the main level of the LARC on the west side of campus. They offer made-to-order coffees, drinks, and grab-and-go food items. The hours of operation are as follows:

Monday thru Thursday.............7:00 a.m. -   9:00 p.m.
Friday.......................................7:00 a.m. -   4:00 p.m.
Saturday ....10:00 a.m. -   4:00 p.m.
Sunday ....1:00 p.m.   9:00 p.m.

Café in the General Classroom Building (GCB) is located on the main level of the General Classroom Building (west side of campus). They offer made to order coffees, drinks, and grab-and-go foods. The hours of operation are as follows:

Monday thru Friday..................7:30 a.m. -   1:30 p.m.

ROCKY MOUNTAIN PBS/KTSC-TV

KTSC-TV is a non-commercial, public television station housed in the Buell Communications Center on the campus of Colorado State University-Pueblo. KTSC is the regional affiliate of Rocky Mountain PBS, a statewide PBS-member network serving 99% of Coloradans with stations in Pueblo, Denver, and Grand Junction along with the Tim Gill Center for Public Media in Colorado Springs.
Each year more than 80 hours of local programming is produced out of the studio at CSU-Pueblo. Three hours per week of local programming is produced from September through May with additional productions taking place during the summer months. Through a unique relationship between CSU-Pueblo and Rocky Mountain PBS, students engage in hands-on learning through the production of local educational programs such as Matchwits, Homework Hotline, and Super School News.

MATH LEARNING CENTER

The Math Learning Center (MLC) at CSU-Pueblo gives students a place to work in a collaborative and supportive environment. The MLC, located in PM 132, is open each semester Monday through Friday. At the MLC students receive assistance from fellow students who are also trained tutors. Our tutors can help students in classes ranging from elementary algebra to statistics and calculus. The center is also the home of a computer laboratory dedicated to math students working online homework assignments. The MLC also provides a calculator rental program, where students can rent a graphing calculator for use in their math classes during the semester. The MLC provides CSU-Pueblo students a place and a plan for success in college level and developmental math classes. For more information, call the Math Learning Center Coordinator at 549-2271

OCCHIATO CENTER

Due to the construction and renovation of the Occhiato University Center in 2016-2018, the services provided and hours of operation may be adjusted. Please call auxiliary Services at 719-549-2149, if you have questions.

The Occhiato University Center ascribes to the "Role of the College Union" developed by the Association of College Unions International which states that:

1) The union is the community center for the college, for all members of the college family - students, faculty, administration, alumni, and guests. It is not just a building: it is also an organization and a program. Together they represent a well-considered plan for the community life of the college.
2) As the "living room" or "hearthstone" of the college, the union provides for the services, conveniences, and amenities the members of the college family need in their daily life on campus and for getting to know and understand one another through informal association outside the classroom.
3) The union is part of the educational program of the college. As the center of college life, it serves as a laboratory of citizenship, training students in social responsibility and for leadership in our democracy. Through its various boards, committees, and staff, it provides a cultural, social, and recreational location aiming to make free-time activity a cooperative factor with study in education. In all its processes it encourages self-directed activity, giving maximum opportunity for self-realization and for growth in individual social competency and group effectiveness. Its goal is the development of persons as well as intellects.
4) The union serves as a unifying force in the life of the college, cultivating enduring regard for and loyalty to the college.

The Occhiato University Center (OUC) houses many student service areas. The departments housed in the OUC are: the CSU-Pueblo Bookstore and Copy Center, Auxiliary Services, Student Computer Lab, Dining Services with two different eating areas for you to select from (Columbine Café and La Cantina), Student Affairs, Student Health Center, Center for International Programs, Diversity Resource Center, Associated Student Government, Office of Student Activities, Affirmative Action, Student Conduct/Student Judicial Affairs, Alumni Center, and Veteran's Affairs.

The Occhiato University Center is operated by the department of Auxiliary Services located in OUC, room 102. During the academic year, the OUC is open regularly from 7:00 a.m. to 10:00 p.m. Monday through Thursday and 7:00 a.m. to 8:00 p.m. on Friday with additional hours as required for scheduled events. The OUC is open on Saturday 8:00 a.m. to 8:00 p.m. and Sunday from 8:00 a.m. to 10:00 p.m. with additional hours as required for scheduled events. Hours may vary during summer and when classes are not in session. The OUC hours can be extended to accommodate special events, conferences, and meetings; however, there will be fees associated with this request in order to provide coverage in the building.

Identification Cards

All students enrolled must purchase an ID card also called the ThunderCard in the Auxiliary Services Office located in Room 102 of the Occhiato University Center. The office is open Monday through Friday, from 8:00 a.m. to 5:00 p.m. There is a $10 charge for all new ID's. Please contact Auxiliary Services office for the fee structure for replacement or reactivation of an old ID card. In addition the ThunderCard may be used to add "ThunderBucks" to the card (like a declining balance debit card) which can be purchased and placed on your ThunderCard. Thunderbucks can be used for purchases of food items at any food service location on campus plus you receive a 10% discount and pay no sales tax on the food purchased. In addition you may use your ThunderCard to purchase anything needed in the University Bookstore (there is a 10% discount on all items except textbooks and computer software and sale items), laundry services in the residence halls and some vending machines on campus. The staff in the Auxiliary Services Office would be happy to give you more detailed information on these items.

Lost and Found

Auxiliary Services is the central Lost and Found for the campus. If you have lost something please stop by our office located in the Occhiato University Center, Room 102 or contact us at (719) 549-2149.

Parking Decals

All students needing to park a vehicle on campus are required to purchase an annual parking decal for their vehicle or motorcycle. Students are encouraged to purchase their parking decals at the beginning of each academic year (August) since parking rules are enforced by the Pueblo County Sheriff's Office located on the CSU-Pueblo Campus. Decals can be purchased in the Auxiliary Services Office and the Cashier's window throughout the year. Students living in Belmont Hall, Crestone Hall, Culebra Hall, and Greenhorn Hall will be provided special resident permits. They may park in residence hall parking lots as well as any other General Student Lots. Students

living at University Village at Walking Stick must obtain a permit that allows them to park in the lots at University Village at Walking Stick as well as any other General Student Lots.

THE UNIVERSITY LIBRARY

The University Library supports teaching and learning by providing information services to students, faculty, staff and patrons throughout the city and region.

Library faculty and staff assist patrons in learning how to find and utilize print and electronic books and journals, internet sources, audiovisual materials, and government documents through instruction for individuals, small groups or formal classes. Staff also prepares subject guides for classes and arranges interlibrary loans. Librarians are available by phone, email, text message, or in person to answer questions.

Approximately 300,000 volumes are available, as well as access to over 100,000 periodical titles. The library's website provides access to over 100 online databases with reference information and journal articles, as well as web-based tutorials and help guides.

The University Library is a designated selective depository for U.S. Government documents. Special collections include the University Archives; the Colorado Chicano Movement Archives; the Ruben Archuleta Collection; papers of Vincent Massari, former state senator; the Alva Adams family papers; Tobie Hopkins Black Literature; the Ralph Taylor Southwest collection, and the Edward O'Brien Western collection.

The University Library is located in the Library and Academic Resources Center (LARC) which opened in the spring 2011. The LARC includes technology study rooms and open computer labs that provide access to 100 desktop computers as well as laptops and iPads. Tutoring, advising, and other academic support services are also housed in the LARC.

VEHICLE PARKING PERMITS

Students who park their vehicles on campus must display a valid permit. Permits may be obtained at the Cashier's window or Auxiliary Services (OUC Room 102). Each student should purchase either a University Village at Walking Stick, Resident or General Student permit, depending on his/her housing situation. Students may be eligible to charge a permit to their student accounts prior to financial aid disbursement. Student permits expire on August 31st every year.

GRADUATE POLICIES AND PROCEDURES

GRADUATE ADMINISTRATION

Graduate programs and curricula at Colorado State University-Pueblo are developed by the faculty and administration in the instructional colleges and schools and are administered by graduate program directors or coordinators with the assistance of the Provost/VPAA and the Vice-President of Enrollment Management and Student Affairs. Academic policies affecting graduate programs and courses are reviewed by the University Graduate Studies Board and governed by the Faculty Senate.

GRADUATE DEGREE PROGRAMS

Colorado State University-Pueblo offers selected graduate courses and programs for degree-seeking and non-degree students. Graduate degrees are offered in Biology (MS), Biochemistry (MS), Chemistry (MS), Engineering (MS), Industrial and Systems Engineering (MSISE), Business Administration (MBA), Education (M.Ed.), English (MA) History (MA), and Nursing (MS).

GRADUATE ADMISSIONS POLICIES AND PROCEDURES

A student who has received a baccalaureate degree from an accredited institution and who wishes to begin a graduate program must submit the following items to the Office of Admissions, Colorado State University-Pueblo, 2200 Bonforte Boulevard, Pueblo, Colorado, 81001-4901. The following items shall constitute the admission file for each applicant:

1) A completed application for admission to graduate programs of Colorado State University-Pueblo and an application fee of $35. The fee is non-refundable and is not applicable towards tuition. An application form may be obtained by writing the CSU-Pueblo Office of Admissions, by telephoning (719) 549-2462, or online at http://www.csupueblo.edu.
2) Official transcripts of all college and university work must be sent directly to the Office of Admissions by each institution attended. Records received directly from students may be used for advisement purposes only.
3) An official score from the appropriate standardized admission exam must be provided. See specific programs for required exam(s) and scores.
4) For international students whose native language is not English, a minimum score of 500 on the Test of English as a Foreign Language (TOEFL) paper-based exam, a minimum score of 173 on the TOEFL computer-based exam, a minimum score of 61 on the TOEFL internet-based (iBT) exam, a minimum score

of 80 on the Michigan Test of English Proficiency, or a minimum band score of 5.0 on the International English Language Testing System (IELTS) test is required for admission. However, a minimum score of 550 on the TOEFL paper-based exam, a minimum score of 213 on the TOEFL computer-based exam, a minimum score of 79-80 on the TOEFL internet-based (iBT) exam, or a minimum band score of 6.0 on the IELTS is required for the Master in Business Administration (MBA), and the Master of Science with a major in Nursing. Students who complete an undergraduate degree at an institution in the United States are exempt from this requirement.
5) Specific programs may have additional requirements.

GRADUATE ADMISSION

Admission to graduate studies does not constitute admission to a particular graduate program. Admission to a particular degree program must be approved by the program director/coordinator upon review of the student's credentials.

Regular Status

Regular status will be given to degree-seeking students who meet all of the published requirements of their selected graduate program department. The requirements include:

- A baccalaureate degree from an institution accredited by the regional accreditation agency (or equivalent). Admission to an approved joint degree (3+2) program at CSU-Pueblo does not require a baccalaureate.
- The minimum undergraduate GPA established for all programs is 3.000.
- Submission of satisfactory scores from a standardized admissions test if required by the program department. International students whose native language is not English must also meet the English language proficiency standard set forth in the *Graduate Admissions Policies and Procedures* section.
- A completed admissions file.
- Any additional requirements for the selected program, including completion of leveling courses to correct undergraduate deficiencies. Programs may specify conditions which may include higher grade-point averages, required scores on entrance examinations, or undergraduate major or course requirements. Programs may also limit admissions based on capacity.

Conditional Status

The University provides a conditional status for students who have not satisfied the minimum undergraduate grade-

point average, or the minimum required test score(s), or who have other deficiencies in their preparation.

The Director of Admissions on recommendation of the program director/coordinator will admit the student under conditional status if the student's grade-point average is at least 2.500, but not high enough for regular admission; or if the student has not met a condition specified by the program department. Such special action may be taken if there are positive indicators of graduate success, e.g., high GRE or GMAT scores, solid upper-division academic performance, or outstanding professional achievement.

The program director/coordinator will notify the student of the specific conditions for moving to regular graduate status. Conditions of admission to regular status can include additional course work beyond the degree requirements; specified scores on standardized admissions tests; or other conditions required by the program director/coordinator. A written statement of the conditions and a plan for meeting them will be prepared by the program director/coordinator and filed with the Director of Admissions. The program director will provide a copy of the plan to the student.

If the conditions are met, the program director will notify the Director of Admissions and the student that the student has achieved regular degree-seeking status. If not successful, the student will be notified by the Director of Admissions that conditional status has been terminated and the student has been dismissed from the program. Students on conditional status may count toward the degree a maximum of 12 hours of graduate course work taken in the degree program.

Non-Degree Seeking Students

A student who desires to take graduate courses for personal enrichment, for job advancement, or for transfer to another institution, may do so through either the Non-Degree Status option or through the Guest (for credit) option.

Non-Degree Status

Students seeking non-degree status must complete a full graduate admission application. Non-degree status students are limited to enrolling in a total of twelve graduate hours unless approval is given by the Graduate Studies Board. The approval of the appropriate program director is required to enroll in graduate coursework that is part of the curriculum for a graduate program.

A maximum of twelve graduate hours of CSU-Pueblo credit earned as a non-degree seeking student may subsequently be applied toward a master's degree if approved by the degree-granting program. Individual programs may limit the number of hours applicable to the program.

Guest (For Credit) Student Status

Guest (for credit) student status is reserved for applicants who wish to enroll in courses without seeking a degree and who meet the following criteria. Applicants who wish to register as a guest (for credit) student must be Colorado residents and are required to complete a short application with the Office of Admissions each term that they wish to enroll. Guest (for credit) students are NOT REQUIRED to submit official transcripts, test scores or an application fee; however, guest (for credit) students must obtain approval from the relevant graduate program director/coordinator and the instructor. Tuition and fees are based on the number of credits for which they register and students are INELIGIBLE to receive financial aid. The maximum limit on credit taken as a graduate guest (for credit) student before they need to apply for regular admission is 12 credits.

GRADUATE WORK TAKEN BY SENIORS

CSU-Pueblo students who are in their senior year of undergraduate work may take graduate courses for graduate credit (see information for specific programs) with the approval of the appropriate program director/coordinator.

Graduate level courses (500 level) cannot be used simultaneously to satisfy baccalaureate and graduate degree requirements with the exception of approved joint-degree (3+2) programs.

GRADUATION REQUIREMENTS

Each graduate program at the University has specific graduation requirements, which must be met prior to graduation. In addition, students must fulfill the following requirements for a graduate degree:

1) Have a cumulative graduate GPA of 3.000 or better at graduation. A maximum of six semester hours of course work at the grade of C+ or C may apply toward graduation. A maximum number of nine semester hours of approved transfer credit may be applied to the degree.
2) Have regular student status.
3) Complete the program's minimum number of hours of approved course work.
4) Pass a final comprehensive and/or oral examination in the major area of study, if required by the program.
5) Submit a graduation planning sheet signed by the student's graduate adviser during the semester prior to the term in which graduation is to occur. The deadline for submission is published in the *Semester Notes.*
6) Complete a thesis or directed research project if required by the program. If choosing the thesis option, submit an electronic copy and one unbound paper copy of the approved thesis to the Library.

Reproduction and binding costs are the responsibility of the student. (Individual programs may require additional bound copies.)

NOTE: Enrollment for thesis or directed research credit is required for any academic term during which University resources (e.g., faculty time, computer use, library, etc.) are being used. However, a maximum of six (6) semester hours of thesis or directed research course work will count toward meeting graduation requirements for MS/MA degrees.

ACCEPTANCE OF TRANSFER CREDIT

A maximum of nine semester hours of resident graduate credit from other regionally accredited graduate institutions may be applied to a graduate degree program. Transfer credit from non-United States institutions will be evaluated on a case-by-case basis. Transfer credits must be directly applicable to the degree program and must be approved by the program director/coordinator and sent to the Transfer Credit Evaluator. Graduate credits accepted in transfer must be from a course in which a grade of B- or better was earned. Credits accepted in transfer do not apply to the GPA at CSU-Pueblo. Credits already used for minimum degree requirements at another institution cannot be used toward fulfilling a CSU-Pueblo degree. Individual programs may set additional criteria for acceptance of transfer credit.

CREDIT FOR PRIOR LEARNING

Prior learning is non-college or experienced-based learning that has been attained outside of accredited postsecondary education systems. Credit for Prior Learning includes learning acquired from work and life experiences. It is awarded for graduate-level learning involving knowledge, skills, and competencies that students have obtained. The Graduate Program Director/Coordinator will describe the requirements and the process for obtaining prior learning credits. Individual graduate program may or may not authorize credits for prior learning.

Credit for such experiences may be given if the following conditions are met:

1) The experience must be directly similar to the content of internships, field courses and/or laboratory courses in the regular curriculum;
2) The student must describe in writing the nature of the experience and what he or she learned through it;
3) Evidence documenting the prior learning experience is to be provided by the student. Documentation must include a detailed account of the nature, frequency and duration of the duties; and
4) A paper integrating the experiences with subsequent or concurrent classroom instruction must be submitted and approved.

The maximum number of graduate credit hours allowed for prior learning is six. Credit for prior learning is granted only for experiences gained within 12-years from the date the degree is expected to be awarded. Credit for prior learning experiences is subject to the approval of the program director/coordinator and the dean of the college/school in which credit is requested.

CONTINUOUS REGISTRATION

All students admitted to a graduate program at Colorado State University-Pueblo are required to be continuously registered in the fall and spring semester throughout their degree programs. This policy applies from the time of first enrollment through the graduation term. Students may fulfill this requirement by registering for any graduate credit-bearing course (regular or non-regular). As an alternative, students may opt for a Continuous Registration (CR) status. Registration for CR status is accomplished in the same way as registration for courses. Students registering for CR will be assessed a fee for each semester of CR registration. Students graduating in summer term are required to be registered for at least one credit or CR. See the Graduate Enrollment Requirement.

Subject to the established time limits for the earning of graduate degrees and the various academic requirements, CR registrants need not apply for readmission should they wish to take additional graduate courses. Such students are ensured a place in their graduate programs as long as they remain in good academic standing. However, students who do not register will need to apply for readmission for their next semester of enrollment.

The availability of the CR option shall not supersede any other registration requirements to which students may be subject. For example, a student's advisory committee may require additional course work. Similarly, some departments may require credit-bearing registration until the degree is completed.

GRADUATE ENROLLMENT REQUIREMENT

Graduate degree candidates must either enroll for at least one credit or register for CR during the term (fall, spring, or summer) they will complete their degree.

GRADUATE ADVISING

Each graduate degree area has a program director/coordinator that serves as the initial graduate adviser to all graduate students in the program. The responsibilities of the graduate adviser and the graduate committee include advisement, approval of the degree plan, approval of a thesis or directed research topic and final document (if appropriate), and administration and approval of comprehensive and/or oral examinations and thesis/project defense.

COURSE LOADS

Graduate students enrolled in nine or more graduate credit hours are considered full-time students (six hours, summer); those enrolled for six graduate credit hours are considered half-time students (three hours, summer).

TIME LIMITS

Courses completed six or more years before the date of graduation, either at CSU-Pueblo or at another institution, will not be accepted as satisfying graduation requirements without the written approval of the student's graduate program director/coordinator.

UNDERGRADUATE COURSES

Only graduate courses (500 level or above) will count toward a graduate degree. However, students admitted to graduate study may be required to complete some undergraduate prerequisite or leveling courses in addition to their graduate work.

Courses taken for undergraduate credit by a graduate student (courses 400 level or below) do not enter into the graduate grade-point computation. A graduate program director/coordinator may, however, stipulate a grade point to be achieved in such undergraduate courses.

Graduate programs may include courses which are dually numbered at the undergraduate (400) and graduate (500) level. Students registered for graduate credit are required to perform at the graduate level. Dual-listed courses taken for undergraduate credit will not apply toward a graduate program. Graduate students may not repeat for graduate credit a dual-listed course which was taken in the undergraduate program.

DUAL DEGREE CREDIT

Up to six semester hours of elective credit may be applied to more than one graduate degree program if the degrees are pursued concurrently pending approval of the graduate committees of the programs involved and the and the Graduate Studies Board.

ACADEMIC STANDARDS

Graduate courses are graded in an alphabetical system with the following interpretation:

A   - 4.00   - Excellent
A- - 3.67
B+ - 3.33
B   - 3.00   - Good performance
B- - 2.67
C+ - 2.33
C   - 2.00   - Passing, but below expected performance

D+ - 1.33
D   - 1.00   - Unsatisfactory performance
D- - 0.67
F   - 0.00   - Failing

IN - Incomplete
S   - Satisfactory
IP - In progress
U   - Unsatisfactory
W   - Withdrawal
WN - Withdrawal for nonpayment
NC - No credit

Students may apply no more than six semester hours of work with a grade of C toward graduation requirements. Only grades of A through C, and S fulfill graduation requirements for graduate programs.

ACADEMIC STANDING

The cumulative graduate GPA will be determined from all approved coursework attempted at the 500 level or above. Coursework must be approved by the student's graduate program coordinator or director. To remain in good academic standing, a student's graduate GPA must remain at 3.000 or better. If the graduate GPA falls below 3.000, a graduate student will be placed on probation. Students have one semester to show progress toward good standing as measured by increasing the graduate GPA from the previous semester. Probationary students will be dismissed whenever progress toward good standing is not achieved; after a probationary student has accrued 15 credits; or whenever the graduate GPA falls below 2.500. Graduate students may repeat a maximum of six semester hours of graduate credit. When a course is repeated, both the subsequent grade and the original grade are included in the graduate grade point average.

In addition, students must maintain a cumulative GPA of 3.000 or better in all courses attempted after achieving graduate status. If a student is in the degree plus program or admitted conditionally, all required leveling courses must be completed at a minimum GPA of 3.000. Graduate program directors/coordinators will notify the Director of Admissions if and when there is a change in academic standing for a graduate student based upon required leveling courses for a conditionally admitted student.

A student may appeal dismissal by submitting a written petition to his/her program director/coordinator. This petition must provide a justification for continued registration. The program director/coordinator will forward a recommendation through the appropriate college dean, and the Office of the Provost. The Provost or his/her designee will make a final decision on the appeal and inform the student of that decision. Decisions by the Provost are final.

SAME MASTERS DEGREE (Same Program)

Eligibility

In certain instances, applicants may wish to seek a second master's degree in the same program for which they already hold a master's degree in order to fulfill new career, professional, or specialization requirements. These applicants may seek a second master's degree for the same discipline if they:

1) Meet the University admission requirements; and
2) Meet the master's program admission requirements (individual master's programs may elect not to consider applicants who already hold a master's degree in the same discipline; applicants should consult with the graduate program coordinator of the prospective master's program).

Requirements

The second master's degree must be based on:

1) A different option from the first master's degree (or in a different area of specialization in the case of a master's program without differentiated options); and
2) A curriculum distinct from the first master's degree containing a minimum of 30 semester hours of coursework different from those taken to earn the first master's degree, and
3) At least seventy percent of the coursework must be completed in residence and include a culminating experience.

COMPREHENSIVE EXAMINATIONS

Graduate programs may require a final comprehensive and/or oral examination. Scheduling is made through the graduate adviser. Students who fail a final examination may retake the examination once. A re-examination cannot be scheduled in the same term as the original examination.

NON-THESIS OPTIONS

Some graduate programs offer non-thesis options to students. Details of the requirements are specified in the respective section of this catalog. Students also should consult with the appropriate program director/coordinator for the requirements.

THESIS

Some graduate programs provide an option that includes a thesis and an oral defense of the thesis. Students must submit a research plan prior to the work. The plan must define the topic of study and outline the research design. The plan must have the written approval of all members of the student's graduate committee and the program director/coordinator.

The graduate committee shall consist of at least three faculty members approved by the thesis adviser and the program director/coordinator. At least two members of the committee must be from within the department of the student's graduate program. Changes in membership in the graduate committee may be requested in writing by the student to the program director/coordinator.

The research/thesis plan should be filed as soon as possible after the degree plan is filed and before 18 credit hours of the student's degree plan have been completed.

THESIS INSTRUCTIONS

Students writing a thesis in partial fulfillment of graduation requirements must submit an electronic copy and one unbound paper copy of the approved thesis to the University Library. (Students should contact the Office of the Dean of Library Services for further details.) The student will pay the Library for the binding cost (based upon the fee schedule maintained by the Library) of the required copy plus any additional copy bindings requested by the student. The bound thesis will be submitted to the library. Individual programs may require additional bound copies.

The Thesis Must:

1) Contain a title page;
2) Contain a certificate of acceptance;
3) Conform to the style and form approved by the major department and outlined in the thesis plan;
4) Be printed on high-quality paper with a minimum of 25 percent rag content; and
5) Be bound.

The required University copy of the thesis must be of high-quality printing and must use a paper of the same quality as the original and include color pages wherever appropriate. Other copies of the thesis may be duplicated in any manner the student desires.

It is imperative that the utmost care be taken in the preparation of the final copy of the thesis. The completion of the thesis, including preparation and duplication, is the sole responsibility of the student.

The thesis abstract should consist of no more than five hundred (500) words. The thesis abstract should cover the following items:

1) Purpose of study;
2) Research materials and methods results; and
3) Summary and conclusions.

For additional thesis or directed research requirements, consult your program adviser.

ORAL DEFENSE OF RESEARCH

Upon completion of a master's thesis, an oral defense/final comprehensive examination must be scheduled. Application for the oral defense is made to the graduate adviser.

A report of the outcome of the oral defense must be filed with the program director/coordinator. The report must be signed by all members of the student's graduate committee. Students must pass the oral defense to complete their thesis or directed research requirement successfully.

APPEALS

All graduate policies, procedures, and regulations may be appealed. Appeals must be made in writing first to the appropriate graduate director/coordinator, the Graduate Studies Board, and finally to the Office of the Provost. The academic grade appeals process is the same as is described in the undergraduate section on appeals. See *Grade Change Policy/Academic Appeals* listed in the *Academic Policies* section of this catalog.

PROGRAMS OF STUDY

Graduate Programs in Natural Sciences

The College of Science and Mathematics offers Master of Science degrees in three disciplines within the Natural Sciences: Biology MS, Chemistry MS, and Biochemistry MS. Students completing any of these degrees will develop advanced skills in the general discipline of choice and will apply these skills in the completion of a thesis research project or internship. GRE scores of at least 300 (verbal and quantitative) based on the current GRE exam are required for regular admission to GPNS programs.

BIOLOGY (MS)

Program Director: Dan Caprioglio

The graduate program leading to the degree of Master of Science in Biology prepares students to apply basic scientific principles to the practical biological problems encountered in business, industry, government, and education. Graduates from the program will be able to apply the techniques of scientific research to real-world biological problems. Course work may include several important areas relevant to biology, including biotechnology, bio-fuels, statistics, environmental, molecular, and cellular biology. A unique feature of the program is its 3+2 plan which is described elsewhere in

this catalog. The 3+2 plan allows a student to simultaneously receive a BS and an MS degree in five years. The Master of Science in Biology requires 30 or 32 semester credit hours of approved graduate course work for, respectively, the thesis (30) or the non-thesis option (32).

Expected Student Learning Outcomes

Upon completion of the MS in Biology, students will have achieved the following goals:

- *Mastery of the Scientific Method* - Independent development and mastery of problem solving skills including experimental design, execution, critical analysis, and interpretation of the results of original scientific experimentation (thesis) or experiential learning (internship).
- *Dissemination of Scientific Products* - Persuasive communication and defense of significant results of original scientific investigation presented in both written and oral format at a graduate peer-professional level.
- *Utilization of the Literature* - Critical evaluation of an independently accessed comprehensive body of scientific literature which is project relevant and foundational in supporting and explaining research findings in both written and oral format.
- *Development of a Relevant Knowledge Base* - Development of intrinsically held fundamental field-specific knowledge which will be applied to explain and defend research findings at a level of mastery expected by peer-professionals.
- *Professionalism and Self Responsibility* - Maintain a consistent professional work ethic of independently taking the initiative and motivation to produce tangible products of a quality commensurate with peer-standards in graduate or professional schools or in the career field being pursued.

Outcomes Assessment Activities

The faculty of the GPNS will use a variety of methods for evaluating student learning outcomes. Students completing this degree program will give a public research seminar (BIOL 593) that will be evaluated by cognizant GPNS faculty members. A research thesis or internship project will be designed, conducted, and publically presented in writing and orally prior to defense and evaluation by the student's Graduate Advisory Committee.

Degree Requirements

The course of study requires eight semester credits of work common to all students. Additionally, each student must select an emphasis area with a core of three to four semester credits. Twelve to seventeen credits in elective courses are also required, depending on which option is

chosen. The thesis option requires successful completion of six semester credits of thesis research (BIOL 599) and an approved thesis. The non-thesis option requires successful completion of four semester credits of Internship Seminar. The program of study for each student must be approved by a graduate committee and the Program Director. Thesis option students are required to defend their research results before a thesis defense committee. A non-thesis option student must complete a comprehensive exam, submit a formal written report based on an internship, and defend their internship work before their graduate committee. Program requirements are summarized as follows:

		Plan A (thesis option)	Plan B (non-thesis option)
BIOL	510	3	3
MATH	550	3	3
BIOL	598		4
	OR		
BIOL	599	6	
BIOL	593	1	1
BIOL	588		1
	OR		
BIOL	589	1	

		Plan A (thesis option)	Plan B (non-thesis option)
Core Courses (1 of 4 required)			
BIOL	540/L	3 or 4	3 or 4
	OR		
BIOL	543/L		
	OR		
BIOL	552/L		
	OR		
BIOL	553/L		
Elective Courses		12-13	16-17
TOTAL		30 min.	32 min.

Specific course numbers, course titles, and credit hours for all core requirements, emphasis core requirements, and electives are cited as follows:

Required General Courses

Courses		Titles	Credits
BIOL	510	Foundations in Graduate Studies	3
BIOL	593	Seminar	1
MATH	550	Statistical Methods	3
BIOL	588	Internship Seminar	1
		OR	
BIOL	589	Thesis Defense	1
		TOTAL	8

Required Biological Sciences Core Courses

Students will take **one** of the following courses:

Courses		Titles	Credits
BIOL	540/L	Molecular Genetics/Lab	3
BIOL	543/L	Limnology/Lab	4
BIOL	552/L	Advanced Microscopy/Lab	4
BIOL	553/L	Ecology/Ecology Field Studies	4
		TOTAL	3-4

Elective courses are selected from courses listed below: (others may be added, with permission as new courses are added, or from other areas of study, for example biochemistry).

Courses		Titles	Credits
BIOL	502	Immunology	3
BIOL	503	Virology	3
BIOL	512/L	Cellular Biology/Lab	4
BIOL	513/L	Plant Physiology/Lab	4
BIOL	521/L	Histology/Lab	4
BIOL	532/L	Developmental Biology/Lab	4
BIOL	540/L	Molecular Genetics/Lab	3
BIOL	541/L	Freshwater Invertebrate Zoology/Lab	4
BIOL	543/L	Limnology/Lab	4
BIOL	552/L	Advanced Microscopy/Lab	4
BIOL	553/L	Ecology/Ecology Field Studies	4
BIOL	561	Applied Geospatial Technology (GIS/GPS)	3
BIOL	562	Environmental Management	3
BIOL	565	Environmental Toxicology	3
BIOL	579/L	Ichthyology/Lab	3
BIOL	581/L	Entomology/Lab	3
BIOL	583/L	Mammalogy/Lab	3
BIOL	585/L	Plant Taxonomy/Lab	4
BIOL	591	Special Topics	1-4
BIOL	595	Independent Study	1-4

BIOLOGY 3+2 PLAN (BS/MS)

One feature of the Biology MS program is the 3+2 plan, which is designed to give the opportunity to qualified advanced-level undergraduate students to simultaneously pursue both the Baccalaureate (BS) and Master of Science (MS) degrees. Talented students are thus quickly moved toward expanding their academic and scientific horizons based on an individual student's abilities and motivation.

Specific requirements for the 3+2 program are included in the Biology MS description of the *College of Science and Mathematics*, undergraduate programs section of this catalog.

CHEMISTRY (MS)

Program Director: Richard Farrer

The graduate program leading to the degree of Master of Science in Chemistry prepares students to apply fundamental chemistry principles to more advanced questions encountered in industry, government, business, and education. Graduates from this program will be able to apply techniques of scientific research in the chemical sciences to real-world problems.

Course work may include several important areas in the chemical and natural sciences, including advanced instrumental techniques, and environmental concerns. This program also offers a 3+2 plan described elsewhere, which allows students to simultaneously complete requirements for a BS and MS degree in five years.

The Master of Science in Chemistry requires 30 or 32 semester credit hours of approved graduate course work in either the thesis or non-thesis (internship) option, respectively.

Expected Student Learning Outcomes

Upon completion of the Chemistry MS or BS/MS as part of the Graduate Programs in Natural Sciences (GPNS), students will:

- Be able to understand and evaluate the scientific literature and use it in their courses and their research.
- Be able to effectively communicate scientific research, both their own and information from the research literature, in written and oral fashions.
- Develop and master the scientific problem solving skills required to define and solve basic or applied original scientific questions using the scientific method.
- Actively engage in research/internships and discourse with the faculty in the Chemistry Department and other STEM disciplines.
- Disseminate, in collaboration with faculty, the products of the Chemistry-MS program within the CSU-Pueblo community and with communities outside of the University in activities using their professional expertise.

Outcomes Assessment Activities

The faculty will use a variety of methods for evaluating student learning outcomes. These include required student enrollment in CHEM 510 (Foundations in Graduate Studies), which involves faculty directed instruction and practice in searching, evaluating, and discussing scientific literature, instruction in experimental design, and dissemination of scientific research results.

Students completing this degree program will give a public research seminar (CHEM 593) that will be evaluated by cognizant GPNS faculty members. A written research thesis or internship report will be publically presented and defended by students to demonstrate proficiency in their area of study and these will be evaluated by the student's Graduate Advisory Committee. Students will collaborate with faculty to present the results of their thesis research or internship project within the greater Southern Colorado region, give seminars/posters on campus or at appropriate scientific meetings, publish the results of their research in peer reviewed scientific journals, or disseminate information through other appropriate mediums.

Degree Requirements

The course of study requires five semester credits of course work common to all students. Each student must complete three of the five core courses (9 semester credits). Students are required to complete 10-12 additional credit hours of approved graduate level electives in Chemistry, Biology, Math, or Engineering as outlined in the graduation plan developed with the student's adviser and graduate committee, and approved by the Program Director. The signed graduation plan may be completed at any time, but is a requirement for successful completion of CHEM 510.

Thesis option students are required to defend their research results before their graduate committee. Non-thesis option students must take a written comprehensive examination over courses taken in their program of study. A non-thesis option student must submit a formal written report based on an internship and defend their internship and work before their graduate committee.

Each student must pass qualifying exams in three of five areas of selected chemistry content (analytical, biological, inorganic, organic, or physical chemistry). Students will have two opportunities to pass each area exam. Qualifier examinations are scheduled during the week preceding the beginning of classes each term or in consultation with the program director or department chair. If an examination is failed, the requirement may be satisfied by completing the designated undergraduate coursework in the appropriate subdiscipline, as specified by the program director or department chair, with a minimum grade of "B". Students enrolling into the 3+2 program will be exempt from the requirement to pass qualifying exams if they have completed courses at CSU-Pueblo in analytical, biological, inorganic, organic, or physical chemistry with a grade of "B" or better. Students enrolled in the 3+2 program required to pass qualifying exams will schedule the exams in consultation with the Program Director.

Chemistry program requirements are summarized as follows:

	Plan A (thesis option)	Plan B (non-thesis option)
CHEM 510	3	3
CHEM 588		1
CHEM 589	1	
CHEM 593	1	1
CHEM 598		4
CHEM 599	6*	
Core Courses (3 of 5 required – 9 credits)		
CHEM 501	3	3
CHEM 511	3	3
OR		
CHEM 512	3	3
CHEM 521	3	3
CHEM 529	3	3
CHEM 531	3	3
Elective Courses	10	14
TOTAL	30	32

* Students may only enroll for a total of 6 credit hours of CHEM 599, Thesis Research.

Elective courses may be selected from the following chemistry courses or others may be added with permission of the graduate committee.

Courses	Titles	Credits
CHEM 501/L	Advanced Organic Chemistry/Lab	4
CHEM 503	Polymer Chemistry	3
CHEM 511	Biochemistry I	3
CHEM 512/L	Biochemistry II/Lab	5
CHEM 519/L	Instrumental Analysis/Lab	5
CHEM 521	Advanced Inorganic Chemistry	3
CHEM 525	Environmental Chemistry	3
CHEM 529	Advanced Analytical Chemistry	3
CHEM 531	Advanced Physical Chemistry	3
CHEM 550	Industrial Chemistry	2
CHEM 591	Special Topics	1-4
CHEM 592	Research	1-3
CHEM 595	Independent Study	1-4

CHEMISTRY 3+2 PLAN (BS/MS)

One unique feature of the Chemistry MS program is the 3+2 plan, which is designed to give the opportunity to qualified advanced-level undergraduate students to simultaneously pursue both the Baccalaureate (BS) and Master of Science (MS) degrees. Talented students are thus quickly moved toward expanding their academic and scientific horizons based on an individual student's abilities and motivation. Students are encouraged to enter the program as early as the fall of the junior year but not later than the fall of the senior year.

Specific requirements for the 3+2 program are included in the Chemistry MS description of the *College of Science and Mathematics*, undergraduate programs section of this catalog. Students must meet the requirements of both degrees.

BIOCHEMISTRY (MS)

Program Director: Richard Farrer

The graduate degree program outlined leads to the degree of Master of Science in Biochemistry. The degree program prepares graduates for professional employment or for further advanced studies at the interface of chemistry and biology, and in molecular biosciences, including biochemistry and biotechnology.

Course work for this degree option includes several important classes at the intersection of the biological and chemical sciences, including advanced topics in cellular biology, biochemistry, and laboratory techniques. This program also offers a 3+2 plan, described elsewhere, which allows students to simultaneously complete requirements for a BS and MS degree in five years.

The Master of Science in Biochemistry requires 30 semester credit hours of approved graduate course work in the thesis option.

Expected Student Learning Outcomes

Upon completion of the Biochemistry MS or BS/MS as part of the Graduate Programs in Natural Sciences (GPNS), students will:

- Be able to understand and evaluate the scientific literature and use it in their courses and their research.
- Be able to effectively communicate scientific research, both their own and information from the research literature, in written and oral fashions.
- Develop and master the scientific problem solving skills required to define and solve basic or applied original scientific questions using the scientific method.
- Actively engage in research/internships and discourse with the faculty in the Chemistry Department and other STEM disciplines.
- Disseminate, in collaboration with faculty, the products of the Biochemistry-MS program within the CSU-Pueblo community and with communities outside of the University in activities using their professional expertise.

Outcomes Assessment Activities

The faculty will use a variety of methods for evaluating student learning outcomes. These include required

student enrollment in CHEM 510 (Foundations in Graduate Studies), which involves faculty directed instruction and practice in searching, evaluating, and discussing scientific literature, instruction in experimental design, and dissemination of scientific research results. Students completing this degree program will give a public research seminar (CHEM 593) that will be evaluated by cognizant GPNS faculty members. A written research thesis will be publically presented and defended by students to demonstrate proficiency in their area of study and this will be evaluated by the student's Graduate Advisory Committee. Students will collaborate with faculty to present the results of their thesis research within the greater Southern Colorado region, give seminars/posters on campus or at appropriate scientific meetings, publish the results of their research in peer reviewed scientific journals, or disseminate information through other appropriate mediums.

Degree Requirements

The course of study requires 5 semester credits of course work common to all students, and 6 credits of thesis research. Each student must complete 4 core courses (13 semester credits). Students are required to complete 6 additional credit hours of approved graduate level electives in Biology, Chemistry, Math, or Engineering as outlined in the graduation plan developed with the student's adviser and graduate committee and approved by the program director. The signed graduation plan may be completed at any time, but is a requirement for successful completion of CHEM 510. Students are required to defend their research results before their graduate committee.

Each student must pass a total of three qualifying exams one each in biochemistry and biology (molecular and cellular biology) and one of four other areas of selected chemistry content (analytical, inorganic, organic, or physical chemistry). Qualifier examinations are scheduled during the week preceding the beginning of classes each term or in consultation with the program director or department chair. If an examination is failed, the requirement may be satisfied by completing the designated undergraduate coursework in the appropriate subdiscipline, as specified by the program director or department chair, with a minimum grade of "B". Students enrolling into the 3+2 program will be exempt from the requirement to pass qualifying exams if they have completed courses at CSU-Pueblo in analytical, inorganic, organic, or physical chemistry; as well as cellular biology and molecular biology with a grade of "B" or better. Students enrolled in the 3+2 program required to pass qualifying exams will schedule the exams in consultation with the Program Director.

Biochemistry program requirements are summarized as follows:

(thesis option only)

CHEM	510	3
CHEM	589	1
CHEM	593	1
CHEM	599	6*

Core Courses (4 required – 13 credits)
CHEM	512**	3
BIOL	512**	3
BIOL	540/L	4
CHEM	531	3

Elective Courses	6
TOTAL	30

* Students may enroll for a total of 6 credit hours of CHEM 599, Thesis Research.

** Labs are not required.

Elective courses may be selected from the following courses or others may be added with permission of the graduate committee.

Courses		Titles	Credits
BIOL	502	Immunology	3
BIOL	503	Virology	3
BIOL	550/L	Survey of Genomics and Bioinformatics/Lab	3
BIOL	552/L	Advanced Microscopy/Lab	4
CHEM	501/L	Advanced Organic Chemistry/Lab	4
CHEM	519/L	Instrumental Analysis/Lab	5
CHEM	521	Advanced Inorganic Chemistry	3
CHEM	525	Environmental Chemistry	3
CHEM	529	Advanced Analytical Chemistry	3
CHEM	591	Molecular Basis of Disease (taught under Special Topics)	3
CHEM	591	Special Topics	1-4
CHEM	592	Research	1-3
MATH	550	Statistical Methods	3

BIOCHEMISTRY 3+2 PLAN (BS/MS)

One unique feature of our Biochemistry MS program is the 3+2 plan, which is designed to give the opportunity to qualified advanced-level undergraduate students to simultaneously pursue both the Baccalaureate (BS) and Master of Science (MS) degrees. Talented students are thus quickly moved toward expanding their academic and scientific horizons based on individual student's abilities and motivation.

Specific requirements for the 3+2 program are included in the Biochemistry MS description of the *College of Science and Mathematics*, undergraduate programs section of this catalog. Students are encouraged to enter the program as early as the fall of the junior year but not later than the fall of the senior year.

MASTER OF BUSINESS ADMINISTRATION (MBA)

Program Director: Kristyn White Davis

The goal of the MBA program is to prepare students for high-level general management careers in business and other organizations. Students acquire an understanding of management theory and application, the economic, political and social environment in which businesses function, and behavioral skills that are essential in the manager's role in the implementation of business decisions. The MBA program strives to provide an environment conducive to the development of each student's ability to think in a creative and effective manner. The program makes extensive use of lectures, seminars, group projects, and case studies that are designed to demonstrate the integrative, interdisciplinary nature of business decisions.

The program is open to all applicants with a bachelor's degree, regardless of the undergraduate field of study. Students without prior business course work will be required to take leveling courses in financial accounting, business statistics, microeconomics, finance, management, and marketing. Additionally, a review of GMAT writing sub score will be used to determine if there is a need for developmental work. Students who earn less than a "C" in any leveling course will be dismissed from the program. Generally, graduate students are required to complete all leveling course requirements before enrolling in the first 500-level courses. In some instances, a student will be permitted to enroll in 500-level courses while completing the final leveling courses.

All MBA students are required to take the Graduate Management Admissions Test (GMAT). An admission formula of 200 times the undergraduate GPA (4.000 system) plus the GMAT score will constitute a scaled admission score for each applicant. Students will be required to have at least a 1000 score on the admission formula and at least 400 on the GMAT examination. Students will not be allowed to enroll in more than six hours of graduate-level course work without being fully admitted to the program.

Learning Outcomes Assessment

The Hasan School of Business is committed to continuous improvement through a rigorous assessment program focused on measuring learning outcomes and implementing measures to enhance students' chances of success. Within each individual course, faculty members utilize a variety of assessment techniques including student presentations, projects, peer evaluations, examinations, and student surveys.

Learning Goals for the MBA Program

The Hasan School of Business faculty works diligently to provide graduates with a high-quality education that prepares them for advancement in business. Our program prepares students through achievement of four primary learning goals.

1) **Expression of Thoughts and Ideas**
   - Our graduate students will be able to communicate effectively.
2) **Decision Making and Problem Solving**
   - Our graduate students will be able to analyze problems, identify relevant issues, and craft solutions.
3) **Decision Making in a Global Business Environment**
   - Our graduate students will be able to develop solutions for global business issues.
4) **Ethical Analysis**
   - Our graduate students will be able to evaluate ethical situations and offer appropriate recommendations.

Assurance of Learning

The use of direct measures of student performance in the Hasan School of Business provides a relevant set of performance data. Reviewed by faculty, discipline groups, the School's Assurance of Learning Committee, and administrators, results of these measures are used to make program improvements. In addition to course grades, direct measures of student performance in the Hasan School of Business include:

- **The Educational Testing Service (ETS) Major Field Test in Business**. This test, administered nationwide, assesses what students have learned primarily in courses common to all business majors. Results are compared with those of other business students enrolled at selected peer institutions, as well as nationally.
- **Course-Embedded Measures**. Exams, papers, presentations, and projects are course-embedded measures that can be used to assess student performance related to our MBA learning goals.

The Hasan School of Business compiles information to assess the success of MBA graduates. Information is obtained from the CSU-Pueblo Alumni Office, the Career Center, and other sources.

MBA Standards

A student who earns two "C" or lower grades in graduate-level courses is placed on probation. If a third "C" or lower grade is earned, the student is automatically dismissed from the program.

The MBA degree will be conferred upon students who successfully complete a minimum of 36 hours of approved course work with a minimum GPA of 3.000. The curriculum includes the following 30 credits which are taken by all MBA students.

MBA CORE

Core Courses		Titles	Credits
ACCTG	510	Managerial Accounting	3
BUSAD	502	Business Ethics and Environment	3
BUSAD	575	International Business	3
ECON	510	Economics for Managers	3
FIN	530	Financial Management	3
MGMT	511	Production/Operations Management	3
MGMT	520	Management of Organizational Behavior	3
MGMT	565	Management Information Systems	3
MGMT	585	Management Policy and Strategy	3
MKTG	540	Marketing Management	3
		SUB-TOTAL	30

In addition to the MBA core, each student must complete two approved electives 6

TOTAL PROGRAM REQUIREMENT 36
All graduate courses for the MBA are listed in the appropriate department sections of accounting (ACCTG), business administration (BUSAD), computer information systems (CIS), economics (ECON), finance (FIN), management (MGMT), and marketing (MKTG).

Independent Studies will not be substituted for core or required courses. They may count only as electives.

JOINT BSBA/MBA AND BS-CIS/MBA PROGRAMS

Specific requirements for the joint BSBA/MBA and the BS-CIS/MBA plans are included in the *Hasan School of Business* undergraduate programs section of this catalog.

MASTER OF EDUCATION (M.Ed.)

Interim Associate Dean: Jeff Piquette

Educational researchers and policy makers agree on the fundamental requirements for successful teachers: knowledge of subjects they teach, knowledge of both general and subject-matter specific methods for instruction and assessment; knowledge of student development; and the ability to apply this knowledge with students from diverse backgrounds. The M.Ed. at CSU-Pueblo is planned to impact the quality of teaching and learning in K-12 classrooms by preparing master teachers with expertise in their content disciplines, in the pedagogy of teaching and learning, and in the process of continual professional development and growth. To ensure graduates' application of new knowledge and skills, CSU-Pueblo's program requires application of new knowledge and skills throughout the program and utilizes an assessment model that monitors teacher performance and provides information for ongoing program improvement.

One promising approach that has resulted in significant improvements in teaching practices is the National Board for Professional Teaching Standards (NBPTS) process for National Board Certification. The NBPTS has developed standards for effective teaching in specific subject areas and assessments geared to measure performance against the standards, as well as a process for teachers to demonstrate their performance on these standards. In addition to strengthening classroom teaching, teachers' involvement with the NBPTS program has improved student engagement, motivation, and achievement, including positive impact in low-performing schools.

The Master of Education degree is built on research on teacher change and is designed to prepare teachers to lead school reform, requiring completion of an emphasis area of their choice; of a core of pedagogy courses focusing on literacy, instructional technology, and differentiation of instruction; and of a core of courses focusing on professional growth. The National Board standards and certification process form the heart of the M.Ed. core and assessment process. A unique characteristic of the degree is the collaboration of faculty in teacher education and in content disciplines at the University in the design and implementation of the program.

Relationship to the Mission of Teacher Education

The Teacher Education Program has a primary mission to prepare teachers of quality and distinction through K-16 collaborations. One of the central goals of the program is its commitment to serve the region and state of Colorado through partnerships with school districts and institutions of higher education. An integral aspect of this goal is Teacher Education's formal partnership with school districts in southern and southeastern Colorado. The joint efforts of students, faculty, and administrators across all K-16 partners focus on improving the quality of learning in classrooms in elementary, secondary, and higher education. The Master of Education degree supports this mission, strengthening K-12 teachers' abilities to provide educational opportunities for their students. At Colorado State University-Pueblo, preparing teachers is a campus-wide responsibility, with faculty and administrators involved in support of the program's mission.

Graduate Program Goals and Student Outcomes

As teachers proceed through the program, they will be asked to apply and demonstrate their growth in learning and teaching related to the following goals and outcomes.

Content Knowledge Goal: Master teachers utilize content knowledge to raise the achievement of PK-12 learners.

1) Demonstrate growth in content knowledge related to teaching assignment and the application of content knowledge to classroom instruction and assessment.

Pedagogy Goal: Master teachers utilize best practices in instruction and assessment to raise achievement of PK-12 learners.

1) Understand scientifically-based practices in teaching and learning, including strategies in literacy education, instructional technology, differentiation of instruction, and apply them to raise student achievement.
2) Demonstrate multiple means of assessing and evaluating student learning and use them to change teaching and learning.

Professional Development and School Reform Goal: Master teachers understand the process for professional change in their own practice and in education, including the interpretation of educational research.

1) Locate, interpret, synthesize, and apply educational research in best practices in teaching.
2) Understand models for professional change, including teacher collaboration, professional learning communities, strategies for mentoring and coaching to facilitate change, and effective professional development.
3) Demonstrate understanding of reflective practice that results in improved classroom teaching and learning, including teacher reflection, use of technology in self-assessment, collaboration for change, and self-management of change.
4) Demonstrate understanding of system and organizational change in education, including models for school change and current research and trends in school change.

Leadership and Change Agent Goal: Master teachers apply educational research, including research on school reform and professional development to raise student achievement.

1) Demonstrate responsibility for student learning at high levels.
2) Demonstrate responsibility for school reform and leadership in school change.

Graduate Admission Policies and Procedures

Admission

Regular status will be given to degree-seeking students who meet all of the following requirements:

- A baccalaureate degree from an institution accredited by the regional accreditation agency (or equivalent).
- A minimum 3.000 undergraduate GPA.
- Submission of satisfactory scores from a standardized exam required for teacher licensure in the content area in which the applicant holds a teaching license (e.g., English or Elementary Education). Applicants who have taught successfully for three years may submit alternative evidence of content knowledge. Applicants who have completed the GRE or MAT should submit these scores.
- A current resume.
- A completed admissions file.
- Two letters of recommendation, one from an administrator familiar with applicant's teaching.
- A teaching license.

International students whose native language is not English must also meet the English language proficiency standard set forth in the *Graduate Admissions* section of the CSU-Pueblo Catalog.

Continuation

To continue in the program, students must maintain a cumulative GPA of 3.000.

Program Completion

All students must fulfill the following requirements for a graduate degree:

- A cumulate graduate GPA of 3.000 or better graduation. A maximum of six semester hours of course work at the grade of C+ or C may be applied toward graduation. A maximum number of nine semester hours of transfer credit may be applied to the degree.
- Regular student status.
- The program's minimum number of hours of approved course work (38 semester hours).
- Completion of a final portfolio review and oral examination. The portfolio project includes a directed research project.
- Submission of a graduation planning sheet signed by the student's graduate adviser during the semester prior to the term in which graduation is to occur. The deadline for submission is published in the *Semester Notes*, *University Calendar*, and *CSU-Pueblo Catalog*.

M.Ed. Degree Course Requirements

The degree is designed with three components: (1) core courses in research and professional change; (2) pedagogy courses in literacy, differentiation of instruction, and technology; and (3) courses in an emphasis area chosen by the graduate student. A unique feature of the degree is its alignment with the standards of the National Board for Professional Teaching Standards and participants' opportunity to work towards national board certification as they complete the degree.

Component 1: Core Requirements (11 hours)

Organizational change and school reform, as well as the responsibilities of professional leadership related to educational change, are emphasized in the core. The four courses in Component 1 are developmental, with the first taken within the first nine hours, the third within the last nine hours, and the final course completed as the capstone experience in the program. All courses focus on knowledge and skills related to teacher change and leadership as a change agent in the schools, Emphasis in interpreting and conducting research is included.

Although courses in Components 2 and 3 may be completed by teachers, degree plus or senior students who have been admitted to the Teacher Education Program and meet the 2.600 GPA requirements, admission to all Core courses requires full admission to the graduate program.

Course Requirements

Courses			Titles	Credits
ED	502	Core 1:	Teacher as Change Agent	3
ED	503	Core 2:	Teacher as Researcher	3
ED	504	Core 3:	Leading Change in America's Schools	3
ED	593		Seminar	2
			OR	
ED	581		Practicum & Seminar in Education	2

Component 2: Pedagogy Requirements (choose 3 hours from each category, 9 hours total)

CSU-Pueblo recognizes that *master* teachers demonstrate expertise in understanding and applying current best practices in each of the following areas: literacy education, instructional technology, and differentiation of instruction for all learners. All three were selected because recent research has indicated that application of best practices in these three areas will impact the quality of student achievement in K-12 classrooms, Teachers will select courses based on their development plan, with input from their graduate adviser. Courses cannot be double counted in emphasis areas and the Pedagogy Core.

Instructional Technology

Graduate students may select from instructional technology courses offered by the University, with approval of their faculty advisers. Sample courses include:

Courses		Titles	Credits
ED	520	Educational Media and Technology	3
ED	521	Classroom Integration of Internet	2
ED	523	Teaching and Managing Technology	2
ED	527	Productivity Tools for Classroom	1
ED	528	Integration of Educational Software	1
ED	534	Multimedia Design	3
ED	536	Technology & Assessment Tools	3
ED	591	Special Topics	1-3

Differentiation of Instruction

Graduate students may select from any differentiation course, including the following:

Courses		Titles	Credits
BBE	503	Content Instruction for EL Learners	3
ED	512	Teaching Diverse Learners	3
ED	531	Diverse Learners & Technology	3

Literacy Education

Graduate students may select from any literacy course, including the following:

Courses		Titles	Credits
BBE	520	Literacy for EL Learners	3
ED	529	Literacy & Technology	3
RDG	535	Content Area Literacy	3
RDG	550	Diagnosis and Remediation of Reading Problems	3

Component 3: Emphasis Area Requirements (18 hours in one area)

The more deeply teachers grasp content, the more they tend to emphasize conceptual, problem solving, and inquiry aspects of their subjects. The less knowledgeable teachers are of the content they are teaching, the more they tend to emphasize facts and procedures. The purpose of Component 3 of the program is the development of teachers' content expertise related to their area of responsibility, with candidates choosing among a number of different K-12 emphasis areas. Some areas require prerequisites, and an emphasis area should be chosen with the advisement of their graduate adviser.

M.Ed. (Art Education)
Graduate Coordinator: Victoria Hansen, Art Department

It is the philosophy of the Art Education emphasis that exceptional art educators continue to perfect their skills as

practicing artists. Students completing this area should confer with their adviser in Art Education to select courses that will expand their understanding of current issues and techniques in the field of art education as well as their knowledge and skills in art processes and production. The emphasis requires completion of eighteen hours of graduate level art courses including one graduate level course in art history.

M.Ed. (Early Learning)
Graduate Coordinator: Jeff Piquette, Teacher Education Department

Courses		Titles	Credits
ED	510	Collaboration in Education	3
ED	524	Advanced Techniques of Teaching Elementary Social Studies	2
ED	525	Advanced Techniques of Teaching Elementary Science and Health	2
ED	580	Integrated Methods	3
RDG	510	Foundations of Reading Instruction	3
RDG	511	Teaching Elementary Language Arts	2
RDG	550	Diagnosis and Remediation of Reading Problems	3

Additional courses with an elementary or early childhood focus may be added with approval of the graduate adviser.

M.Ed. (Foreign Language)
Graduate Coordinator: Alegria Ribadeneira, English and Foreign Languages Department

The emphasis in Foreign Language supports teachers' growth as language teachers by expanding their proficiency in the language as well as their understanding of culture, literature, linguistics, and issues in foreign language instruction. In addition to traditional campus-base courses, the emphasis will include opportunities for foreign language immersion and foreign travel.

M.Ed. (Health & Physical Education)
Graduate Coordinator: Christine Rochester, Exercise Science, Health Promotion, and Recreation Department

Courses	Titles	Credits
EXHP 500	Workshop (methods of various physical activities)	1-5
EXHP 522	Methods of Elementary Physical Education	3
EXHP 529	Curriculum in Physical Education	2
EXHP 532	Applied Sport & Exercise Psychology	3
EXHP 536	Community Health	3
EXHP 549	Facilitation of Adventure Education	3
EXHP 562	Contemporary Issues in HPE	3
EXHP 565	Adapted Physical Education	3
EXHP 570	Methods of Coaching	3
EXHP 578	Methods of Secondary School PE	3
EXHP 585	Methods in Health Promotion	3

EXHP 591	Special Topics	1-3
EXHP 594	Field Experience	1-6
EXHP 595	Independent Study	1-6
REC 550	Leadership and Ethics	3
REC 560	Outdoor Education	3
REC 569	Outdoor Leadership I	2
REC 570	Outdoor Leadership II	2
REC 584	Outdoor Resources and Management	3
REC 594	Field Experience	1-6
REC 595	Independent Study	1-6

Students completing this area should confer with their adviser in Health and Physical Education to select courses that will expand their skills and knowledge of advanced teaching methods, professional leadership, instructional programs, research, and theories related to health and physical education.

M.Ed. (Instructional Technology)
Graduate Coordinator: Jeff Piquette, Teacher Education Department

Courses		Titles	Credits
ED	521	Classroom Integration of Internet	2
ED	523	Teaching and Managing Technology	2
ED	527	Productivity Tools for Classroom	1
ED	528	Integration of Educational Software	1
ED	529	Literacy & Technology	3
ED	531	Diverse Learners & Technology	3
ED	532	Hardware & Networking for Educators	3
ED	533	Instructional Theory & Tech Design	3
ED	534	Multimedia Design	3
ED	536	Technology & Assessment Tools	3
ED	570	The Technology Coordinator	3
ED	571	Distance Learning	3
ED	591	Special Topics	1-3

Students completing this area should confer with their adviser if they wish to select courses leading to completion of the Colorado endorsement for K-12 Instructional Technology Teachers and K-12 Instructional Technology Specialists.

M.Ed. (Linguistically Diverse)
Graduate Coordinator: Jeff Piquette, Teacher Education Department

Courses		Titles	Credits
BBE	501	Teaching English Language Learners	3
BBE	503	Content Instruction for EL Learners	3
BBE	520	Literacy for EL Learners	3
BBE	541	Survey of Research in Bilingual Education	2
BBE	560	ELL Assessment & Administration	3
BBE	571	Teaching Listening & Speaking	3
ENG	523	Syntax for ESL/EFL	3
ENG	553	Language in the USA	3
ENG	560	Language Acquisition & Linguistics	3
BBE	581	Practicum with English Learners	1-6

Additional courses in linguistics and foreign language may be completed with the approval of the graduate adviser. Students completing this area should confer with their adviser if they wish to select courses leading to completion of the Colorado endorsement for K-12 Linguistically Diverse Education.

M.Ed. (Music Education)
Graduate Coordinator: Contact Music Department

18 hours of MUS 500-level credit must be earned to complete the Music Emphasis portion of the Master of Education degree. No more than 4 hours of 500-level ensemble credit or applied music credit may be applied toward the Master of Education-Music Emphasis. In addition to 18 hours of 500 level MUS credit completed, students must demonstrate completion of the following courses or the comparable undergraduate course listed below:

MUS Courses		Titles
MUS	530	Marching Band
		(1-2 semesters as required by instrument)
		[or MUS 135, 230, 330, or 430]
MUS	579	Graduate Recital
		[or MUS 345 or Junior Recital]
MUS 550 or		
	560	Instrumental or Choral Conducting
		[or MUS 359]
MUS	513	Advanced Vocal Pedagogy
		[or MUS 113]
MUS	523	Advanced Percussion Pedagogy
		[or MUS 223]
MUS	533	Advanced String Pedagogy
		[or MUS 243]
MUS	543	Advanced Woodwind Pedagogy
		[or MUS 233]
MUS	553	Advanced Brass Pedagogy
		[or MUS 253]
MUS	580	Advanced General Music Methods
		[or MUS 340]
MUS	581	Advanced Choral Methods
		[or MUS 440]
MUS	582	Advanced Instrumental Methods
		[or MUS 441]

M.Ed. (Space Studies for Educators)
Graduate Coordinator: Jeff Piquette, Teacher Education Department

Courses		Titles	Credits
ED	574	Early Childhood Space Exploration	3
ED	575	Lunar/Mars Exploration	3
ED	576	Rocketry: The Future of Exploration	3
ED	577	Astronomy for the Classroom	3
ED	578	Long Term Space Travel	3
ED	579	Earth Systems Science	3

Additional courses with a Space Studies focus may be added with approval of the graduate adviser.

M.Ed. (Special Education)
Graduate Coordinator: Jeff Piquette, Teacher Education Department

Courses		Titles	Credits
ED	512	Teaching Diverse Learners	3
ED	531	Diverse Learners & Technology	3
RDG	550	Diagnosis and Remediation of Reading Problems	3
ED	506	Behavioral Support	3
ED	507	Levels of Support I	3
ED	508	Levels of Support II	3
ED	509	Levels of Support III	3
ED	545	Assessment & Data Driven Instruction	3
ED	510	Collaboration in Education	3
ED	581	Practicum & Seminar in Education	1-6

Students completing this area should confer with their adviser if they wish to select courses leading to completion of the endorsement for K-12 Special Education Generalist.

Program Assessment

The assessment plan for Colorado State University-Pueblo's M.Ed. ensures that the program 1) monitors individual student progress necessary to support success, 2) provides summative information on student proficiency on all performance-based standards, and 3) provides reliable and valid information on the program's successes and weaknesses to ensure continuous program improvement.

The assessment design has four components:

1) Benchmarks, student outcomes and tasks aligned with the Colorado Department of Education standards for content areas leading to endorsements (Special Education, Linguistically Diverse Education, and Instructional Technology) and the National Board of Professional Teaching Standards, forming the basis for both monitoring of student success and program evaluation.
2) A series of evaluation tools that are used by faculty within courses and at program completion to assess student performance in meeting all standards.
3) A system for documenting and monitoring student progress using the student's electronic portfolio.
4) A system to identify program strengths and weaknesses resulting in continual program improvement.

Performance Standards, Program Alignment and Evaluation Criteria

A range of tasks aligned to program standards, curriculum and instructional activities throughout the program provide

multiple sources of evidence to assess performance on each program standard. These tasks include a range of examples of teaching and learning, most of them authentic teaching performance, including all of the following:

- Curriculum plans: lesson plans and unit planning.
- Self evaluations and peer evaluations of teaching.
- Measures of achievement of PK-12 students: student work samples, pre-post data, and a range of assessment results.
- Standardized test scores (e.g., the PLACE exam for Special Education), as well as teacher-constructed exams and quizzes.
- Materials and artifacts from activities with parents, colleagues, and classroom teachers included in the master's portfolio.
- Evidence of ability to understand and utilize research to improve practice.
- Evidence of inquiry (e.g., action research, case studies) to change practice.
- Video case studies of teaching.
- Evidence of program and school change, including activities in coaching, mentoring, and professional learning communities.

Graduate students begin developing their M.Ed. portfolio with their first master's course. The portfolio is a web-based database system that is linked with a system for faculty to review materials and communicate their feedback to the student. Documents that demonstrate their performance on specific standards are added throughout the program.

Program Completion. During the final capstone course, students submit the portfolio for review by a group of three faculty. In addition to the portfolio materials, graduate students participate in an oral review of portfolio contents.

Program Completer Self-Evaluation. At the end of their final course, students will complete their own self-evaluation of their performance across program standards and an evaluation of the quality of the master's program.

Follow-up Assessments. One year after graduating from the program, teacher education will conduct a survey, requesting feedback from each graduate about his/her teaching and about the quality of preparation at CSU-Pueblo. Survey forms will be aligned with the program standards. A similar survey will be sent to each graduate's supervisor (building principal), requesting information about teaching performance.

ENGINEERING (MS) and INDUSTRIAL AND SYSTEMS ENGINEERING (MS)

Program Directors: Neb Jaksic (Engineering)
Leonardo Bedoya Valencia
(Industrial and Systems Engineering)

The Department of Engineering offers two distinct MS degrees: the MS in Engineering (MSE) and the MS in Industrial and Systems Engineering (MSISE).

The MSE program provides advanced education in engineering, currently in two emphasis areas: mechatronics and railroad engineering. Mechatronics combines mechanical and electrical engineering with computers to create devices that make our lives better. Electrical and mechanical systems, controlled by computers, are at the core of a wide range of processes and products. Robots, the Mars Rover, a heart-lung machine, a computer controlled telescope, and a nano-scale microscope are all examples of mechatronics. Railroad engineering combines civil, mechanical, electrical, and industrial engineering in solving engineering problems for the railroad industry.

Industrial and systems engineering deals with the design and analysis of complex, human/machine systems. Industrial and systems engineers use a "big picture" or systems-oriented viewpoint to serve as management and operations analysts, focusing on the people, materials, equipment and procedures needed for the most efficient and effective systems performance. Industrial and systems engineers analyze and evaluate systems against specified performance criteria, including efficiency, quality and safety, before new systems are created or old ones are modified. Industrial and systems engineering techniques can be applied in manufacturing and service industries, health care systems, governmental agencies and non-profit organizations.

Regular admission to the MSE or MSISE program requires an undergraduate GPA of at least 3.0 on a 4.0 scale and total GRE score (verbal plus quantitative) of 300.

Expected Student Learning Outcomes

Each MSE and MSISE graduate will be able to:

- Demonstrate advanced understanding of the fundamental knowledge which serves as the basis for practice in their chosen specialization.
- Apply those principles in the design and analysis of a system or process to meet specified needs.
- Communicate effectively in writing and orally.

By applying the following rules, the MSE and MSISE programs are designed to ensure these additional learning outcomes:

- Each student who does not have the required prerequisites in the chosen specialization takes the necessary leveling courses.
- Every MSE or MSISE graduate must demonstrate knowledge of material in the core courses in the chosen specialization.

Assessment Activities

The MSE and MSISE programs are assessed by periodically reviewing the results of various metrics such as final course exams, homework assignments, projects, project report evaluations, presentations, paper evaluations, student surveys, and exit interviews with MSE and MSISE graduated. Assessment results are used to improve the two programs.

ENGINEERING (MS)

Mission

The MSE program prepares students from diverse educational backgrounds to function as engineers in advanced projects in mechatronics and railroad engineering areas and to continue their studies and obtain other advanced degrees especially at the doctoral level.

Degree Requirement Components

The MSE program consists of three components:

Component	Credit Hours
Core Component	14
Track Component	9
Elective Component for non thesis option	10
Elective Component for thesis option	7

TOTAL Non thesis	33
TOTAL Thesis	30

When considered as a cohesive whole, these three components constitute the student's program of study, totaling at least 33 credit hours for the non thesis option and 30 credit hours for the thesis option. Any course that is applied to one of these three components is said to count towards graduation.

The Core Component

The Core Component consists of 14 credit hours in topics relevant to the emphasis area.

Mechatronics Emphasis Core

Core Courses		Titles	Credits
EN	507	Virtual Reality	3
EN	513	Artificial Intelligence	3

EN	561	Advanced Controls	3
EN	563	Intelligent Robotics	3
EN	593	Graduate Seminar	2

TOTAL	14

Railroad Engineering Emphasis Core

Core Courses		Titles	Credits
EN	511	Structural Engineering	3
EN	531	Railroad Power Systems	3
EN	551	Fleet Management	3
EN	552	Vehicle Dynamics	3
EN	593	Graduate Seminar	2

TOTAL	14

The Track Component

The Track Component consists of 9 credit hours of coursework selected by the student and his or her adviser to advance the professional and/or educational goals of the student. In the MSE program, individualized tracks are tailored to the needs of the student. An individualized track must consist of 9 credit hours of graduate coursework subject to the approval of the adviser and department.

In order to count towards graduation, any Special Projects, Special Topics, Graduate Projects or Independent Study course must consist of content appropriate for the track selected. The determination of an appropriate topic is at the discretion of the adviser and department.

The Elective Component

For the **non thesis** option, the Elective Component consists of 10 credit hours of coursework of courses approved as electives by the department.

For the **thesis** option the Elective Component consists of 6 credit hours of thesis and 1 credit hour of coursework of courses approved as electives by the department.

Prerequisites for the MS in Engineering
(CSU-Pueblo Course Equivalents)

Note that some of the courses listed below may have prerequisites not listed here.

Problem Solving for Engineers (EN 103)
Engineering Economy (EN 343)*
Stochastic Systems Engineering (EN 375)–railroad engineering emphasis only
Calculus I and II (MATH 126 and 224)
Calculus-Based Physics I and II (PHYS 221 and 222)
Engineering mechanics (statics and dynamics) (EN 211 and 212)
Circuits (EN 231 and 231L)

Controls (EN 360)
Electromechanical devices (EN 263)

*Any material substituted for EN 343 must include the time
value of money topic.

INDUSTRIAL AND SYSTEMS ENGINEERING (MS)

Mission

The MSISE program prepares students from diverse
educational backgrounds to function as engineers in
advanced projects in industrial engineering and operations
research and to continue their studies and obtain other
advanced degrees especially at doctoral level.

Degree Requirement Components

The MSISE Program consists of three components:

Component	Credit Hours
Core Component	15
Track Component	9
Elective Component for non thesis option	9
Elective Component for thesis option	6

TOTAL Non thesis	33
TOTAL Thesis	30

The Core Component

The Core Component consists of 15 credit hours in five
fundamental industrial engineering topics. These core
courses include content that is necessary for success as
an industrial engineer working in industry or continuing in
graduate study. The Core Component topic areas are
Simulation, Operations Research, Facility Design,
Operations Planning, and a seminar on conducting
academic research as a graduate student.

Core Courses		Titles	Credits
EN	520	Simulation Experiments	4
EN	571	Operations Research	3
EN	575	Facilities Planning and Design	3
EN	577	Operations Planning & Control	3
EN	593	Graduate Seminar	2
		TOTAL	15

If the student has an undergraduate degree in industrial
engineering or a related field, some or all of the core
(except EN 593) may be waived; additional electives will
replace the waived courses.

The Track Component

The Track Component consists of 9 credit hours of
coursework selected by the student and his or her adviser
to advance the professional and/or educational goals of
the student. Currently available tracks include the
Industrial Engineering and Engineering Management
tracks.

Alternately, any student may pursue an Individualized
Track tailored to the needs of the student. An
Individualized Track must consist of 9 credit hours of
graduate coursework, subject to the approval of the
adviser and department.

In order to count towards graduation, any Special Projects,
Special Topics, Graduate Projects or Independent Study
course must consist of content appropriate for the track
selected. The determination of an appropriate topic is at
the discretion of the adviser and department.

The Industrial Engineering Track

Select at least 9 hours from:

Courses		Titles	Credits
EN	503	Ergonomics	3
EN	504	Scheduling and Sequencing	3
EN	530	Project Planning and Control	3
EN	541	Engineering of Manufacturing Processes	3
EN	541L	Engineering of Manufacturing Processes Lab	1
EN	543	Quality Control and Reliability	3
EN	544	Advanced Engineering Economics	3
EN	573	Computer Integrated Manufacturing	2
EN	573L	Computer Integrated Mfg Lab	1
EN	588	Graduate Projects	3
EN	590	Special Projects	1-3 VAR
EN	591	Special Topics	1-3 VAR
EN	595	Independent Study	1-5 VAR
EN	598	Internship	1-6 VAR

The Engineering Management Track

The Engineering Management Track consists of 9 credit
hours of graduate level coursework in Accounting,
Business Administration, Computer Information Systems,
Economics, Finance, Management and/or Marketing.
These credit hours must represent a coherent plan of
study as approved by the adviser and department.

The Elective Component

For the **non thesis** option, the Elective Component
consists of 9 credit hours of coursework of courses
approved as electives by the department.

For the **thesis** option the Elective Component consists of
6 credit hours of thesis.

Prerequisites for the MS in Industrial and Systems Engineering (CSU-Pueblo Course Equivalents)

Note that some of the courses listed below may have prerequisites not listed here.

Problem Solving for Engineers (EN 103)
Engineering Economy (EN 343)*
Stochastic Systems Engineering (EN 375)
Calculus I and II (MATH 126 and 224)
Calculus-Based Physics I and II (PHYS 221 and 222)

*Any material substituted for EN 343 must include the time value of money topic.

The Thesis Option

MS and MSISE Students choosing the Thesis Option will apply 6 credit hours of EN 599 (Thesis Research) to the Elective Component. A program of study may include more than 6 credit hours of EN 599, but no more than 6 may count towards graduation.

Additional Program of Study Requirements for the MSE and MSISE Programs

For a student to be awarded the MSE or MSISE degree, the student's program of study must also satisfy the following requirements. Additionally, the program of study must be approved by the MSE/MSISE Program Director.

- At least 21 credit hours must be in graduate level engineering courses.
- No more than 9 credit hours of graduate coursework may be accepted as transfer credit from another institution.
- Any course taken as a prerequisite to engineering graduate study at CSU-Pueblo may not be counted towards graduation and must be taken for credit (i.e., not audited).

Advising

Each term, a student must meet with his or her adviser and be advised before the student can register for classes. Students are generally advised by the MSE/MSISE Program Director, unless the student is working on a thesis. Students working on a thesis are typically advised by their thesis advisers. A candidate for the MSE or MSISE degree must work with the adviser to design a program of study. The program of study must be approved by the adviser and department. This process is formalized by submitting a graduation planning sheet to the MSE/MSISE Program Director before the semester prior to graduation.

Admission Requirements

A successful applicant will have a quantitatively based baccalaureate degree from a regionally accredited college or university. Students with non-quantitatively based baccalaureate degrees may be admitted conditionally, but additional prerequisites may be required. Admission to the MSE program or MSISE program requires prior admission to graduate study at CSU-Pueblo. Regulations governing graduate studies are contained in the *Graduate Policies and Procedures Guide* available from the Office of Admissions.

Prerequisite Requirements for Admission

Prior to being admitted to regular status, a student is required to demonstrate preparation for graduate study in the chosen emphasis (for the MSE) or in industrial and systems engineering (for the MSISE). This is done either by completing prerequisite background courses at CSU-Pueblo, by documenting satisfactory completion of equivalent coursework elsewhere, or by demonstrating equivalent work and/or life experience.

Students who do not possess a satisfactory prerequisite background may be admitted conditionally but be required to complete prerequisites. A plan for completing prerequisite requirements in a timely fashion is developed by the student and adviser and must be approved by the MSE/MSISE Program Director.

Graduate Assistantships

Full-time student admitted to the program with regular status are eligible to apply for merit-based, competitive graduate assistantships. Graduate assistants receive financial support from the department in the form of a stipend and/or remission of tuition and fees for one year (two semesters). A graduate assistant who is supported at a funding level equivalent to full-time tuition and fees is required to choose the Thesis Option.

An assistantship is renewable for a second academic year provided the student remains in good academic standing and makes satisfactory progress towards completion of the MSE or MSISE. An award made to a student who does not perform adequately in his or her duties may be rescinded after the first semester of the award period. In extreme circumstances, an award may be rescinded before the end of a semester.

An application for assistantship consists of a résumé and letter of interest addressed to the department chair. For the following academic year, the deadline for application for an assistantship beginning in the Fall semester is April 1. Subject to availability of funds, assistantships may be granted to begin in the Spring semester.

ENGLISH (M.A.)

Program Director: Iver Arnegard

The Department of English and Foreign Languages offers a general program of study leading to a Master of Arts (M.A.) in English.

Program Goals

The general goals of the English M.A. program are to prepare students for success and advancement in careers in teaching, writing, and scholarship, and to develop their knowledge and skills in the discipline of English studies to professional levels in the following areas:

- The in-depth study of literature.
- Aspects of literary history and cultural studies.
- Literary criticism and theories of reading and interpretation.
- Theories of writing and rhetoric.
- Practical writing skills in a range of professional and creative genres.
- Research techniques for and understanding of the discipline of English studies.
- Pedagogical theories and techniques for various aspects and levels of English studies.

Expected Student Learning Outcomes

- Demonstrates professional level of competency in the study of literature.
- Incorporates theories and strategies of literary and rhetorical criticism at a professional level.
- Reveals professional-level writing skills appropriate to the genre(s) of the work.
- Employs research strategies for English studies in a professional manner.
- Manifests professional understanding of pedagogical theories and strategies appropriate to English.
- Speaks in informed and articulate ways about a range of theory, research, and resources relevant to literature, language, rhetoric, and composition studies.

Additional SLOs for Students Writing a Creative Thesis:

- Produces writing competitive at a publishable level, which reflects an understanding of the creative writing genres, the business of writing, and the drafting and revision process for individual and collections of works.
- Demonstrates a working vocabulary for critical analysis through theoretical venues as well as in-depth study of terminology and form within creative works to develop strong critiquing skills in the workshop.

Outcomes Assessment Activities

The following measures of learning outcomes will be employed:

- Students' M.A. theses or independent research project essays are evaluated by the thesis director and committee members against a set of rubrics keyed to the program goals.
- All audience members at the oral defenses of theses or independent research project papers are asked to comment in writing on the student's skills and knowledge as evidenced in their performance, and their responses are tabulated cumulatively.

Admission Requirements

General requirements for admission to graduate school at CSU-Pueblo are specified in the Colorado State University-Pueblo Catalog. For English, requirements include a minimum of 3.0 undergraduate grade point average on a 4.0 scale and a Bachelor's degree in English or a related field, with advanced coursework in British and American literature. The Graduate Record Examination is recommended, but not required. Because of necessary enrollment limitations, admission will be competitive; deferred admission is possible.

1. Fill out a copy of the CSU-Pueblo Application for Graduate Admission. This is a two-page form available from the Office of Admissions and on-line. If you need help getting a copy, e-mail to the address given below.
2. Order official copies of **all** transcripts and send to the Graduate coordinator at the postal address below.
3. Write an application statement that gives a detailed account of your background and qualifications and your purpose in seeking the M.A. in English, both practical and intellectual. The Graduate Committee in English understands that students who apply to our graduate program share our dedication and passion for literature and language. In this application statement, we ask that candidates focus on their intellectual life, professional history, and scholarly background in order to demonstrate their potential for success in a rigorous graduate program.
4. Also submit a writing sample of at least 10 pages, such as a paper written for previous English course or another analytic or argumentative essay. If you wish to submit creative work for your writing sample, it should be accompanied by a 5-page commentary.
5. Solicit three letters of recommendation from references able to evaluate your preparation and likelihood of success in graduate study in English. For those who have recently been undergraduate students, former professors are ideal reverences. For those long past their undergraduate studies, recommendations from supervisors, colleagues, and

others familiar with your work and intellectual abilities can serve as well. If you have been out of school for awhile, but have old letters of recommendations on hand, you may submit them, but please be sure to include at least one current letter. You may collect the letters and submit them with your other application materials, or, if your references prefer, you may have them sent directly to the address below.

6. Prepare a check for the application fee of $35 made out to Colorado State University-Pueblo and enclose it with your other application materials.

7. Send, or have sent, all these materials (the application form, the check for $35, the application statement, the writing sample, the three letters of recommendation, and the official transcripts) to:

Graduate Coordinator
Department of English and Foreign Languages
Colorado State University-Pueblo
2200 Bonforte Blvd.
Pueblo, CO 81001-4901

If you have any questions, please fee free to phone (719-549-2143) or send an email to:
joann.pisciotta@csupueblo.edu.

Financial aid in the form of student loans and perhaps some need-based grants may be available. You may apply for it only after your admission to the program is official, but you may inquire about the application process, eligibility, etc. at any time by contacting Financial Aid at (719) 549-2753 or on-line at:
http://www.csupueblo.edu/FinancialAid.

We accept applications once a year, for fall admission to the program. Please submit your application materials as early as possible–no later than April 1.

Graduation Requirements

Students must maintain an overall grade-point average of 3.00 or higher in courses taken after admission to the degree program. A minimum of 24 credits must be earned at Colorado State University-Pueblo, 21 of which must be earned after admission to the graduate program. Courses from other institutions must be approved by the Graduate Coordinator and officially transferred and appear on the transcript.

Major Requirements

PLAN A:

Nine or ten courses (27-30 credits) at the 500 level, plus a thesis (ENG 599) for 3-6 credits and oral defense of the thesis–for a minimum of 32 credits

PLAN B:

Eleven or twelve courses (33-36) at the 500 level, plus an Independent Study project (ENG 595) for 3-6 credits and an oral presentation of the project–for a minimum of 35 credits.

HISTORY (M.A.)

Program Director: Matthew Harris

The Department of History offers a general program of study leading to a Master of Arts (M.A.) in History.

Program Goals

The goals of the History Program at Colorado State University are:

- To provide students with a general knowledge of history and historical methodology.
- To introduce students to the theoretical works that serve as the foundation of historical scholarship.
- To prepare students, through training in communication skills and in research methods, to gain knowledge of certain areas of history.
- To prepare students to continue independent personal study and learning about specific subject areas.
- To prepare students to engage in critical thinking.

Expected Student Learning Outcomes

- Be able to draw conclusions about the historiography of the subjects they have studied.
- Be able to read and interpret secondary sources from any discipline of history concerning any area of the world.
- Be able to read and interpret primary source documents from a wide range of time periods.
- Be able to demonstrate skills in historical research and analysis and to defend their conclusions in well-written papers.
- Be able to compete successfully in appropriate job markets or gain admission to history PhD programs.

Outcomes Assessment Activities

Faculty members in the MA program in History at CSU-Pueblo use several measures to gauge student learning. These include the Documents Based Questions (DBQ) papers, in which students write 8-12 page papers critically appraising a set of primary source documents. Students are also required to take a written or oral examination at the end of their study, demonstrating mastery over the content they learned. Faculty will use the results of these assessment measures to enhance and invigorate student learning.

Application Instructions

Submit the Colorado State University-Pueblo Application for Graduate Admission form, available from the Office of Admissions. Submit the $35.00 Application Fee. Also send a curriculum vitae or resume, a letter of intent and official college transcripts from all colleges/universities attended. Students may also submit a 10-15 page writing sample for consideration. No standardized test of any kind is required for admittance into the program.

Submit requested information to:

> Graduate Director
> Department of History
> Colorado State University-Pueblo
> 2200 Bonforte Boulevard
> Pueblo, CO 81001-4901

The deadline for applications will be May 1 of each year for admission the next fall. Students wishing to begin coursework in the spring must submit all admissions materials but will be admitted only on a provisional basis until the next cycle.

Degree Requirements

All students must fulfill the following requirements for a graduate degree in History.

- A cumulative graduate GPA of 3.000 or better at graduation. There will be a maximum limit of 12 credits transferable from other graduate institutions or 12 credits from courses taught at CSU-Pueblo before start of M.A. Program. It will be the responsibility of the Graduate Director to determine which credits will be accepted. Once students reach the thesis or exam stage, students will be required to take at least three credits each fall and spring semester in order to consult with faculty with respect to their thesis or exam. Those who do not will be dropped from the program.
- Have regular student status.
- Complete the program's minimum number of hours of approved course work (30 semester hours).
- Successful completion of either thesis or examination option as required by the selected emphasis area. (Please note that if a student fails the exam, he or she will be allowed to retake the exam one time in the following fall semester for a total of two attempts.)
- Submit a Graduation Planning Sheet as advised by your program by the deadline listed on the Masters Graduate Planning Sheet.

Specific Requirements

Students can choose to take an examination or choose the thesis option. Students will be encouraged to take an examination instead of the thesis option.

Exam Option

HIST 588	Historiography and Theory	3
HIST 593	Seminar	3
HIST	Electives selected in consultation with graduate adviser	21
HIST 589	Directed Study for Prelim Exams (last term)	3
	TOTAL	**30**

Thesis Option

Courses	Titles	Credits
HIST 588	Historiography and Theory	3
HIST 593	Seminar	3
HIST	Electives selected in consultation with graduate adviser	18
HIST 599	Thesis Research	6
	TOTAL	**30**

GRADUATE PROGRAMS WITH A MAJOR IN NURSING (MS)

Interim Associate Dean: Joe Franta

Acting Graduate Coordinator: Susan Belport

Faculty: Coram

The Department of Nursing offers a Master of Science (MS) with a major in Nursing in the following emphasis areas:

- Adult/Gerontology Acute Care Nurse Practitioner (AGACNP)
- Adult/Gerontology Acute Care/Family Nurse Practitioner (AGACNP/FNP)
- Psychiatric-Mental Health Nurse Practitioner (PMHNP)
- Nurse Educator

Graduate programs are delivered using a hybrid format (on/off campus and on-line). In order to register for graduate nursing courses students must have unconditional acceptance into the nursing program and follow the degree plan, or register by permission of the graduate nursing program coordinator.

Accredited by:

Accreditation Commission for Education in Nursing (ACEN)
3343 Peachtree Road NE, Suite 850
Atlanta, Georgia 30326
Phone: (404) 975-5000
Fax: (404) 975-5020

Department Mission

The mission of the Department of Nursing is to prepare graduates for professional positions as safe, competent and caring nurses to meet the health care needs of diverse populations.

Program Outcomes

1. Eighty percent of graduates will:

   - Complete the program within one and one half times the length of the program.
   - Express satisfaction with the program.
   - Pass national certification exam the first time.
   - Be employed in role related professional practice within to one year.

2. Eighty percent of employers will express satisfaction with graduates' job performance.

Expected Student Learning Outcomes for Nurse Practitioner Programs

At the completion of the program, graduates will be able to:

1. Integrate evidence-based practice, ethical decision making and technology into advanced nursing practice.
2. Utilize interprofessional collaboration to provide safe, quality patient-centered care.
3. Lead quality improvement initiatives that affect delivery of advanced nursing practice and health care services.

Adult/Gerontology Acute Care Nurse Practitioner Emphasis (AGACNP)

This program prepares students to provide evidence-based, safe, quality patient-centered care in a variety of chronic, acute, and emergent care settings. The graduate will be eligible to take the Adult/Gerontology Acute Care Nurse Practitioner certification examination. The following courses are required.

Fall (Year 1)

Courses	Titles	Credits
NSG 504	NSG Writing & Presentation Skills	1*
NSG 506	Roles, Ethics & Issues	3**
NSG 508	Advanced Practice Theory	3
NSG 551	Health Promotion	2

Spring

Courses	Titles	Credits
NSG 552	Advanced Pathophysiology	3
NSG 562	Advanced Assessment	2
NSG 562/L	Advanced Assessment Lab	1

| NSG 570 | Advanced Evidence Based Practice | 3 |
| NSG 571 | Healthcare Informatics | 2 |

Summer

Courses	Titles	Credits
NSG 550	Health Policy & Finance	3
NSG 561	Advanced Pharmacology	3
NSG 610	Diagnostic Reasoning	2

Fall (Year 2)

Courses	Titles	Credits
NSG 612L	Acute Care Skills Lab	2
NSG 620	Acute Care Adult/Gerontology I	2
NSG 620L	Acute Care Adult/Gero Practicum I	4

Spring

Courses	Titles	Credits
NSG 621	Acute Care Adult/Gerontology II	4
NSG 621L	Acute Care Adult/Gero Practicum II	4

Summer

Courses	Titles	Credits
NSG 622	Acute Care Adult/Gerontology III	4
NSG 622L	Acute Care Adult/Gero Practicum III	4

Total Lab Hours..90
Total AGACNP Clinical Semester Hours...................570
Total Program Credits 51
Optional Elective..1

* NSG 504 is an optional elective to assist students in graduate writing.
**NSG 506 students must complete 30 contact hours of observational clinical related to their emphasis (30 hours Acute Care).

Adult/Gerontology Acute Care/Family Nurse Practitioner Emphasis (AGACNP/FNP)

This program prepares students to provide evidence-based, safe, quality patient-centered care in a variety of chronic, acute, and emergent care settings. Students will also be prepared for primary care practice across the lifespan. The graduate will be eligible to take the Adult/Gerontology Acute Care Nurse Practitioner certification examination and Family Nurse Practitioner certification examination. The following courses are required:

Fall (Year 1)

Courses	Titles	Credits
NSG 504	NSG Writing & Presentation Skills	1*
NSG 506	Roles, Ethics & Issues	3**
NSG 508	Advanced Practice Theory	3
NSG 551	Health Promotion	2

Spring

Courses		Titles	Credits
NSG	552	Advanced Pathophysiology	3
NSG	562	Advanced Assessment	2
NSG	562L	Advanced Assessment Lab	1
NSG	570	Advanced Evidence-Based Practice	3
NSG	571	Healthcare Informatics	2

Summer

Courses		Titles	Credits
NSG	550	Health Policy & Finance	3
NSG	561	Advanced Pharmacology	3
NSG	610	Diagnostic Reasoning	2

Fall (Year 2)

Courses		Titles	Credits
NSG	612L	Acute Care Skills Lab	2
NSG	620	Acute Care Adult/Gerontology I	2
NSG	620L	Acute Care Adult/ Gero Practicum I	4
NSG	631	Family I	2
NSG	638L	Family Practicum	(Var 1-11)***

Spring

Courses		Titles	Credits
NSG	621	Acute Care Adult/Gerontology II	4
NSG	621L	Acute Care Adult/Gero Practicum II	4
NSG	632	Family II	2
NSG	638L	Family Practicum	(Var 1-11)***

Summer

Courses		Titles	Credits
NSG	622	Acute Care Adult/Gerontology III	4
NSG	622L	Acute Care Adult/Gero Practicum III	4
NSG	633	Family III	2
NSG	638L	Family Practicum	(Var 1-11)***

Fall (Year 3)

Courses		Titles	Credits
NSG	638L	Family Practicum (option as needed)	(Var 1-11)***

Total Required Family Clinical Hours **510**
Total AGACNP Clinical Hours **555**
Total Clinical Hours **1065**
Total Lab Hours **90**
Total Required Credit Hours **68**
Optional Elective **1**

* NSG 504 is an optional elective to assist students in graduate writing.
** NSG 506 students must complete 30 contact hours of observational clinical related to their emphasis (15 hours Family, 15 hours Acute Care).
*** NSG 638L students must complete a total of 11 semester hours of Family Practicum, the recommended sequence to graduate in six semesters is: Fall (Year 2) NSG 638L – 4 semester hours, Spring (Year 2) NSG 638L – 4 semester hours and Summer (Year 2) NSG 638 – 3 semester hours.

Psychiatric-Mental Health Nurse Practitioner Emphasis (PMHNP)

This program will prepare students to provide advanced evidence-based patient-centered care psychiatric and mental health patients across the lifespan. The graduate will be eligible to take the Psychiatric-Mental Health Nurse Practitioner certification examination. The following courses are required:

Fall (Year 1)

Courses		Titles	Credits
NSG	504	NSG Writing & Presentation Skills	1*
NSG	506	Roles, Ethics & Issues	3**
NSG	508	Advanced Practice Theory	3
NSG	551	Health Promotion	2
NSG	676	Theoretical Mental Health Models	2

Spring

Courses		Titles	Credits
NSG	552	Advanced Pathophysiology	3
NSG	562	Advanced Assessment	2
NSG	562L	Advanced Assessment Lab	1
NSG	570	Advanced Evidence-Based Practice	3
NSG	571	Healthcare Informatics	2

Summer

Courses		Titles	Credits
NSG	550	Health Policy & Finance	3
NSG	561	Advanced Pharmacology	3
NSG	678	Psychiatric Assessment & Evaluation	2
NSG	679	Psychiatric Differential Diagnosis	2

Fall (Year 2)

Courses		Titles	Credits
NSG	677	Psychopharmacology	2
NSG	681	Psych Mental Health I	2
NSG	681L	PMH Practicum I	4

Spring

Courses		Titles	Credits
NSG	682	Psych Mental Health II	4
NSG	682L	PMH Practicum II	4

Summer

Courses		Titles	Credits
NSG	683	Psych Mental Health III	4
NSG	683L	PMH Practicum III	4

Total Lab Hours **30**
Total Clinical Practice Hours **570**
Total Required Program Credits **55**
Optional Elective **1**

* NSG 504 is an optional elective to assist students in graduate writing.
**NSG 506 students must complete 30 contact hours of observational clinical related to their emphasis (30 hours Psychiatric Mental Health).

Nurse Educator Emphasis

Expected Student Learning Outcomes for Nurse Educators

At the completion of this program, graduates will be able to:

1. Implement evidence-based teaching techniques and scholarly inquiry in educational settings with diverse learners.
2. Participate in curriculum design and evaluation of outcomes.
3. Participate in interdisciplinary efforts to address educational needs in local, regional, state, national and international forums.
4. Assume a leadership role in shaping and implementing change.

This program prepares the nurse to practice as faculty in colleges, universities, hospital-based schools of nursing or technical schools, or as staff development educators in health care facilities. The graduate will be eligible to take the National League for Nursing Certified Nurse Educator Examination. Master's-prepared nurses may complete a post graduate certificate in the nurse educator emphasis. The following courses are required:

Fall (Year 1)

Courses	Titles	Credits
NSG 504	NSG Writing & Presentation Skills	1*
NSG 506	Roles, Ethics & Issues	3**
NSG 508	Advanced Practice Theory	3
NSG 551	Health Promotion	2

Spring

Courses	Titles	Credits
NSG 552	Advanced Pathophysiology	3
NSG 562	Advanced Assessment	2
NSG 562/L	Advanced Assessment Lab	1
NSG 571	Healthcare Informatics	2
NSG 570	Advanced Evidence-Based Practice	3

Summer

Courses	Titles	Credits
NSG 561	Advanced Pharmacology	3

Fall (Year 2)

Courses	Titles	Credits
NSG 575	Curriculum Development	2
NSG 576	Instructional Strategies	3
NSG 577	Assessment & Evaluation	2

Spring

Courses	Titles	Credits
NSG 583	Nurse Educator Seminar	3
NSG 583L	Nurse Educator Practicum	6
NSG 593	Thesis Seminar	3

Summer

Courses	Titles	Credits
NSG 599	Thesis Research	3-6

Total Required Program Credits 44
Optional Elective 1

* NSG 504 is an optional elective to assist students in graduate writing.
**NSG 506 students must complete 30 contact hours of observational clinical related to their emphasis (30 hours Nursing Education).

Admission Criteria

ADN RN to MS Pathway

Associate degree RNs may apply for a continuous pathway to receive the BSN and the MS in one of the 4 graduate emphasis areas offered. Admission requirements for both and ADN RN-BSN and MS programs must be met to enter this pathway with two exceptions:

1. CSU-Pueblo RN-BSN program must be satisfactorily completed in order to *continue* into the MS program.
2. Required RN practice hours must be completed *prior to continuing* into the MS program. (Curriculum and admission requirements for the RN-BSN may be found in the undergraduate nursing portion of this catalog.)

BSN to MS

Students are responsible for following all admission policies and procedures as outlined in the *Graduate Programs* section of the University catalog.

1. Baccalaureate degree in nursing from an institution accredited by a regional accreditation agency (or equivalent).
2. 4000 hours (2 years full-time) experience as a registered nurse (Nurse Educator emphasis only).
3. 2000 Hours (1 year full-time) experience as a registered nurse (AGACNP, AGACNP/FNP and PMHNP emphases only).
4. Undergraduate BSN cumulative GPA of 3.0.
5. Undergraduate statistics course with a grade of C or higher.
6. Application for admission to graduate programs in the Office of Admission (admission to graduate programs does not constitute admission to the nursing graduate program).
7. Application for admission to nursing graduate program in the Department of Nursing.
8. Proof of active, unrestricted Colorado Registered Nurse license.
9. Background check per Colorado Law (see application).

10. Current immunizations as stated on application.
11. Current certification in CPR (Health Care Provider – C or equivalent).
12. Three letters of recommendation:
    a. Professional or Academic
    b. Clinical
    c. Other
13. Letter of intent that includes:
    a. Brief history of self
    b. Reason for pursuing advanced degree
    c. How applicant will manage work, home, and study
14. Curriculum Vitae
    (Use the template located under *Graduate Nursing Student Application Instructions on the website*)

Preference for acceptance will be given to applicants who have:

1. More than 2 years of practice experience
2. One year or more of experience as a clinical adjunct instructor (Nurse Educator only)
3. Residency in Southern Colorado
4. Graduate from CSU-Pueblo

If accepted into the MS program, requirements prior to attending first class include:

1. Drug screen
2. Physical exam within last 12 months

Graduation Requirements for MS

The graduate degree will be granted to candidates who meet all of the University catalog requirements plus the following:

1. Graduate cumulative GPA of 3.0 or better.
2. All courses must be passed with a B or better.
3. Completed comprehensive exam or thesis.

Acceptance of Transfer Credits

Transfer credit will be awarded per the published Graduate Programs section of the University catalog. Nine semester hours of transfer credits from an accredited institution may be applied to the degree with approval of the graduate program coordinator.

Time Limits

Courses completed 6 or more years before the date of graduation will not be accepted as satisfying graduation requirements without the approval by the graduate nursing program coordinator.

POST MASTERS CERTIFICATION

- Adult/Gerontology Acute Care Nurse Practitioner
- Adult/Gerontology Acute Care/Family Nurse Practitioner
- Psychiatric-Mental Health Nurse Practitioner
- Nurse Educator

Students seeking post masters certification in the program who already have a nursing graduate degree are evaluated on an individual basis. Their plan of study is based on their academic credentials. The Colorado State University-Pueblo requirements state a student must complete a minimum of 15 postgraduate credit hours to be eligible for a post masters certification. Core courses must be completed to meet the mandates of the Colorado State Board of Nursing for Advanced Nursing Practice. A total of 500 clinical hours must be documented for each nurse practitioner emphasis. The student's plan is developed based on the academic course work already completed. Post masters certification can be earned in all emphasis areas.

COLLEGE OF EDUCATION, ENGINEERING, AND PROFESSIONAL STUDIES

Dr. Sylvester A. Kalevela, Dean

Academic Departments

Engineering Technology, Construction and Automotive Industry Management

Majors: Automotive Industry Management (BS)
Civil Engineering Technology (BSCET)
Construction Management (BS)

Minor: Automotive Industry Management

Engineering

Majors: Engineering (BSE) –Specialization: Mechatronics
Engineering (MS)
(See *Graduate Programs* section of catalog)
Emphasis Areas:
Mechatronics
Railroad Engineering
Industrial Engineering (BSIE)
Industrial and Systems Engineering (MS)
(See *Graduate Programs* section of catalog)

Minors: Engineering
Industrial Engineering
Sustainability

Certificates: Lean Green Belt
Six Sigma Green Belt

Exercise Science, Health Promotion, and Recreation

Major: Athletic Training (BS)
Exercise Science, Health Promotion and Recreation (BS)
Emphasis Areas:
General Exercise Science
Health Promotion/ Wellness
K-12 Physical Education Teacher
Preparation
Recreation
Strength & Conditioning

Minors: Coaching
Exercise Science and Health Promotion
Fitness and Recreational Sports Management
Outdoor Physical Education
Recreation

Nursing

Major: Nursing (BSN)
Nursing (MS)
(See *Graduate Programs* section of catalog)
Emphasis Areas for MS Nursing:
Adult/Gerontology Acute Care Nurse
Practitioner
Adult/Gerontology Acute Care/Family
Nurse Practitioner
Nurse Educator
Psychiatric-Mental Health Nurse
Practitioner
Post Masters Certification

Teacher Education

Major: Liberal Studies (BS)
Education (M.Ed.)
(See *Graduate Programs* section of catalog)
Emphasis Areas:
Art Education
Early Learning
Foreign Language
Health & Physical Education
Instructional Technology
Linguistically Diverse Education
Music Education
Space Studies for Educators
Special Education

Licensure Areas: Elementary
Secondary
K-12

Minors: Education
Reading

Mission

The College of Education, Engineering, and Professional Studies degree programs reflect Colorado State University-Pueblo's professional focus and are designed to prepare graduates for positions in industry, education, business, and governmental agencies.

The mission of the College is to offer a career-oriented education that efficiently and effectively prepares students to excel as professionals.

Mission objectives:

- To be the premier educational institution in Southern Colorado that provides professional programs.
- To be the preferred source in Southern Colorado for consulting services, research effort, service learning, and other linkages to the public schools, industry, and the community.
- To be recognized for effectiveness in the professional development of faculty, staff, and students.

The College embraces the model of continuous improvement through the use of assessment in evaluating and improving student learning.

DEPARTMENT OF ENGINEERING TECHNOLOGY, CONSTRUCTION AND AUTOMOTIVE INDUSTRY MANAGEMENT

Department Chair: Michael A. Mincic

AUTOMOTIVE INDUSTRY MANAGEMENT PROGRAM

Program Coordinator: Cathi J. Robbe

Faculty: Bencini, Robbe

The major in Automotive Industry Management (AIM) leads to a Bachelor of Science (BS) Degree with a Business Administration minor. The AIM program also offers an AIM minor to complement other CSU-Pueblo degrees. The AIM degree is designed to prepare students for automotive industry management careers by providing automotive management skills, supported by the business and technical background requisite for success in the automotive industry. The curriculum emphasizes personnel supervision, financial analysis, customer relations, warranty administration, sales promotions and techniques of technical problem-solving, service management, marketing, merchandising and distribution methods used by the automotive aftermarket, automotive manufacturer and import industries.

Program Goals

- Prepare students with the appropriate knowledge and skills to enter the workforce as productive, accountable and responsible employees.
- To provide students with theoretical and hands-on laboratory experiences designed to develop the knowledge and skills for success in automotive management careers.

- To utilize an advisory committee of automotive business leaders to advise and support the AIM program on a range of issues, which includes keeping the curriculum current with industry needs.

Student Learning Outcomes

Students in the AIM Program will be able to:

- Analyze financial profitability, efficiency and productivity of an automotive industry business;
- Manage and implement retail inventory control systems;
- Demonstrate knowledge and ability to apply automotive industry health, safety, and environment regulations;
- Demonstrate critical thinking and problem solving in the diagnosis and service of automotive systems;
- Demonstrate professional writing and oral presentation skills; and
- Develop employment seeking skills required to obtain an entry level management position in the automotive industry.

General Requirements for the AIM Program

- AIM majors are required to complete an approved curriculum with a minimum grade of C earned in all courses having an AIM prefix.
- AIM majors are required to demonstrate intellectual skills and knowledge in related business courses to satisfy the minor and institutional requirements.
- AIM minors are required to complete the approved curriculum with a minimum grade of C earned in all minor courses having an AIM prefix.

Requirements for the AIM Major

AIM Courses		Titles	Credits
AIM	105	Intro to the Parts & Service Industry	1
AIM	115	Automotive Engine Design, Operation and Repair	5
AIM	125/L	Automotive Suspension & Brake Systems/Lab	4
AIM	155	Automotive Parts Operations	4
AIM	165/L	Automotive Power Trains & Drive Lines/Lab	4
AIM	235/L	Automotive Fuel Systems & Exhaust Emissions/Lab	4
AIM	245/L	Automotive Electrical Systems I/Lab	4
AIM	255/L	Automotive Electrical Systems II/Lab	4
AIM	265	Automotive Parts Management Systems	4
AIM	305	Regulatory, Enviro, Health Issues	3
AIM	325	Fuels and Lubricant Production, Marketing and Conservation	3
AIM	335	Automotive Shop Practices	5
AIM	345	Advanced Automotive Systems	5

| AIM | 405 | Personal Selling Methods & Techniques..4 |
| AIM | 425 | Automotive Financial Management ....5 |

TOTAL   59

Other Required Major Courses*

Courses		Titles	Credits
BUSAD	302	Ethics in Business.................................3
CIS	xxx	Course(s) Guided Electives 2
MGMT	311	Operations and Quality Management ...3
MGMT	318	Human Resource Management............3
MATH	156	Introduction to Statistics.......................3
COMR	103	Speaking and Listening 3

TOTAL   17

*Students must complete these required major courses with a cumulative grade point average of 2.0 or better.

Specific Business Administration Minor Courses*

Courses		Titles	Credits
ACCTG	201	Principles of Financial Accounting 3
ACCTG	202	Principles of Managerial Accounting.....3
ECON	201	Principles of Macroeconomics 3
ECON	202	Principles of Microeconomics 3
FIN	330	Principles of Finance 3
MGMT	201	Principles of Management 3
MKTG	340	Principles of Marketing 3

TOTAL   21

*A cumulative grade point average of 2.000 is required in the BUSAD minor courses.

Institutional and General Education

Please refer to the *General Education Requirements* in the Undergraduate Programs section of this catalog or refer to your individual program's curriculum sheet.

Requirements for the AIM Minor

AIM Courses		Titles	Credits
AIM	115	Automotive Engine Design, Operation and Repair 5
AIM	235/L	Automotive Fuel Systems and Exhaust Emissions/Lab 4
AIM	245/L	Automotive Electrical Systems I/Lab.....4
Approved AIM Electives (min) 7			

TOTAL   20

Outcomes Assessment Activities

- Graduating students complete an exit survey that provides feedback on the quality and usefulness of the coursework for professional preparation.
- Employer surveys are collected every three years.
- The AIM Advisory Committee meets every fall semester to review the three year cycle report and make suggestions for program improvement. The committee also meets with current AIM students for an open discussion regarding the AIM program.
- Assessment materials are collected yearly, (except the employer survey) and analyzed and reported on a three year cycle.

CIVIL ENGINEERING TECHNOLOGY PROGRAM

Program Coordinator: Michael Mincic

Faculty: Kalevela, Mincic

The major in civil engineering technology leads to a Bachelor of Science in Civil Engineering Technology (BSCET) Degree. This program is accredited by the Engineering Technology Accreditation Commission of ABET, http://www.abet.org

Program Education Objectives

The objective of the Civil Engineering Technology (CET) program at Colorado State University-Pueblo is to provide an integrated educational experience so that its graduates are:

- Prepared to apply established engineering principles and standards of practice in developing solutions to civil engineering problems, and
- Prepared for successful careers in civil engineering by providing them with the ability to contribute to engineering teams in various practice areas including (a) engineering analysis and design, (b) construction planning and management, (c) experimentation, (d) technical documentation, and (e) systems operations or maintenance.

Program Emphasis

The CET major is designed to produce civil engineering technologists who (a) are capable of performing engineering surveys; (b) can perform standard analysis and design of elements of structures, water systems, and transportation systems; (c) are capable of conducting standard laboratory and field tests for construction materials and soils; and (d) can manage a construction project.

The civil engineering technology curriculum places emphasis on hands-on experience obtained through laboratory activities that include: (a) testing engineering/ construction materials; (b) developing technical solutions to problems using established engineering analysis and design principles; (c) performing cost and economic analysis of technical solutions; and (d) developing plans and schedules for construction projects.

Student Learning Outcomes

Students who complete the CET program at CSU-Pueblo will have the ability to:

- Apply knowledge, techniques, skills, and tools of the civil engineering discipline to engineering technology activities;
- Select and apply a knowledge of mathematics, science, engineering, and technology to civil engineering technology problems;
- Conduct standard tests and measurements, analyze and interpret experimental data, and apply experimental results to improve processes;
- Design systems, components, or processes for civil engineering technology problems;
- Function effectively as members or leaders on a technical team;
- Identify, analyze, and solve broadly-defined engineering technology problems;
- Communicate effectively regarding subjects related to engineering technology activities;
- Demonstrate a disposition to engage in self-directed continuing professional development;
- Demonstrate an understanding of professional and ethical responsibilities;
- Demonstrate an understanding of the impact of engineering technology solutions to society; and
- Demonstrate commitment to quality, timeliness, and continuous improvement.

In addition, in order to enable graduates to attain the CET program educational objectives, CET students are trained to acquire specific skills and the ability to:

- Utilize principles and appropriate technology to produce drawings, reports, quantity estimates, and other documents related to civil engineering;
- Conduct standardized field and laboratory tests related to civil engineering;
- Utilize surveying methods and equipment to perform land measurement or construction layout;
- Apply fundamental computational methods and elementary analytical techniques to solve civil engineering technology problems;
- Plan and prepare documents appropriate for design and construction;

- Perform economic analyses and cost estimates related to design, construction, operations and maintenance of systems associated with civil engineering;
- Select appropriate engineering materials and practices; and
- Perform standard analysis and design of elements for structures, hydraulic and hydrologic systems, construction operations, and transportation systems.

The Civil Engineering Technology Curriculum

The CET curriculum consists of courses listed under the following major categories:

Math, Science and Computer Courses

Courses		Titles	Credits
CIS	100	Intro to Word and Windows	1
CIS	103	PowerPoint and Web Publishing	1
CIS	104	Excel Spreadsheets	1
CHEM	111/L	Principles of Chemistry/Lab	4
MATH	121	College Algebra	4
MATH	124	Pre-Calculus Math	5
MATH	126	Calculus & Analytic Geometry I	5
PHYS	201/L	Principles of Physics I/Lab	4
		TOTAL	**25**

Technical Sciences for Civil Engineering Technology

Courses		Titles	Credits
CET	202	Statics	3
CET	206	Strengths of Materials	4
CET	222	Dynamics	3
CET	226	Engineering Problem Solving	2
		TOTAL	**12**

Civil Engineering Technology Courses

Courses		Titles	Credits
CET	101	Intro to Civil Engineering Technology	2
CET	102	Surveying I	3
CET	103	Surveying II	3
CET	115	Civil Drafting I	3
CET	116	Civil Drafting II	3
CET	207	Construction Materials & Methods	3
CET	208	Concrete & Asphalt Materials	3
CET	305	Heavy/Highway Cost Estimating	3
CET	315	Soil Mechanics Technology	3
CET	316	Structural Analysis	3
CET	317	Hydraulics	3
CET	372	Traffic Analysis and Control	3
CET	404	Structural Steel Design	3
CET	405	Reinforced Concrete Design	3
CET	412	Hydrology	3
CET	415	Water & Sewer Systems Design	3

CET	455	Senior Project Seminar	1
CET	456	Senior Project	3
CET	473	Highway Design	3

TOTAL 54

Civil Engineering Technology Elective Courses
(Select two courses for a total of 6 credits.)

Courses		Titles	Credits
CET	303	Construction Management	3
CET	304	Building Cost Estimating	3
CET	312	Route Surveying	3
CET	401	Land Surveying	3
CET	414	Bridge Design	3
CET	475	Engineer-in-Training Preparation	3
CET	491	Special Topics	1-3 Var
CET	495	Independent Study	1-3 Var

TOTAL 6

Technical Elective

Course	Title	Credits
Technical Elective (3 credit hours)		3

Graduation Requirements

CET Program Requirements

- Students are required to complete an approved program of study with a cumulative GPA of 2.000 or better in the CET major courses.
- Students are required to demonstrate skill and knowledge in the areas of quantitative analysis and science by having a cumulative GPA of 2.000 or better in the required mathematics and physics courses.
- Civil Engineering Technology majors are required to demonstrate the ability to solve problems appropriate to their discipline and to complete a final senior-year technical project requiring a written report and an oral presentation.

Institutional and General Education

To complete the General Education requirements, students are required to take a total of 35 credit hours consisting of the skills and knowledge components as specified under the undergraduate *General Education Requirements* section of this catalog. Civil Engineering Technology (CET) students take 11 of the 35 credit hours of the general education requirements under the required math and physical science courses.

Therefore, the CET majors are expected to take 24 credit hours to complete the skills and knowledge components of the general education requirements. The skills and knowledge components include (a) Written

Communication (6 credit hours), (b) Humanities and Speech Communication (9 credit hours), (c) History (3 credit hours) and (d) Social Sciences (6 credit hours). Please refer to the undergraduate *General Education Requirements* section of this catalog for actual courses required to fulfill the skills and knowledge components.

General Education Requirements in Written
Communication, Humanities, History and
Social Sciences 24

Co-curricular Activities

The CET faculty supports and encourages the involvement of civil engineering technology majors in at least one technical organization relevant to the civil engineering discipline.

Outcomes Assessment Activities

- To be eligible for graduation, all civil engineering technology majors are required to take an exit examination. The results of the exit examination are used in the evaluation of the program but have no effect on student's GPA.
- Graduates and their employers are surveyed on program satisfaction and job performance following their graduation.

Civil Engineering Technology Typical Schedule of Courses

Freshman - Fall

Courses		Titles	Credits
CET	101	Intro to Engineering Technology	2
CET	102	Surveying I	3
CET	115	Civil Drafting I	3
CIS	100	Intro to Word & Windows	1
CIS	103	PowerPoint and Web Publishing	1
CIS	104	Excel Spreadsheets	1
MATH	121	College Algebra	4

TOTAL 15

Freshman – Spring

Courses		Titles	Credits
CET	103	Surveying II	3
CET	116	Civil Drafting II	3
ENG	101	Composition I	3
MATH	124	Pre-Calculus Math	5
General Education: Humanities			3

TOTAL 17

Sophomore - Fall

Courses		Titles	Credits
CET	202	Statics	3
CET	207	Construction Materials & Methods	3
CET	226	Engineering Problem Solving	2
MATH	126	Calculus & Analytic Geometry I	5
PHYS	201/L	Principles of Physics I/Lab	4
		TOTAL	17

Sophomore - Spring

Courses		Titles	Credits
CET	206	Strength of Materials	4
CET	208	Concrete and Asphalt Materials	3
CET	222	Dynamics	3
ENG	102	Composition II	3
General Education: Social Science			3
		TOTAL	16

Junior - Fall

Courses		Titles	Credits
CET	305	Heavy/Highway Cost Estimating	3
CET	316	Structural Analysis	3
CET	317	Hydraulics	3
CHEM	111/L	Principles of Chemistry/Lab	4
COMR	103	Speaking and Listening	3
		TOTAL	16

Junior - Spring

Courses		Titles	Credits
CET	315	Soil Mechanics Technology	3
CET	372	Traffic Analysis and Control	3
CET	412	Hydrology	3
General Education: Humanities			3
General Education: Social Science			3
		TOTAL	15

Senior - Fall

Courses		Titles	Credits
CET	405	Reinforced Concrete Design	3
CET	415	Water & Sewer System Design	3
CET	455	Senior Project Seminar	1
CET	473	Highway Design	3
CET Elective			3
General Education: History			3
		TOTAL	16

Senior - Spring

Courses		Titles	Credits
CET	404	Structural Steel Design	3
CET	456	Senior Project	3
Technical Elective			3
CET Elective			3
		TOTAL	12

Total required credit hours 124

CONSTRUCTION MANAGEMENT PROGRAM

Program Coordinator: Michael A. Mincic

Faculty: Kalevela, Mincic, Trujillo

The major in construction management leads to the Bachelor of Science (BS) degree in Construction Management. Graduates of the Construction Management (CM) program enter the industry as project superintendents, field supervisors, project managers, or owner's representatives for a variety of construction related firms such as general contractors, specialty subcontractors, construction managers, designers, developers, consultants, or owners.

Program Goals

The goal of the Construction Management program is to prepare baccalaureate degree graduates who have the necessary skills to plan, organize, staff, lead and exercise control in the directing and coordinating of resources to achieve construction project objectives. Therefore, the objective of the program is to produce graduates who have the technical grounding in construction processes for infrastructure and have managerial skills to plan and direct projects.

Student Learning Outcomes

Students who successfully complete the CM program are expected to have the ability to:

- Apply knowledge, techniques, skills, and tools of the construction industry in construction activities;
- Select and apply knowledge of mathematics, science, and technology to construction problems;
- Perform standard tests, organize and interpret test data, and apply test results to improve construction processes;
- Function effectively as members or leaders on construction teams;

- Communicate effectively regarding subjects related to construction activities; and
- Demonstrate an understanding of professional and ethical responsibilities.

Construction Management Curriculum

The CM curriculum consists of courses listed under the major categories listed below.

Skills Component

Courses		Titles	Credits
ENG	101	Composition I	3
ENG	102	Composition II	3
		TOTAL	6

Knowledge Component

Courses		Titles	Credits
COMR	103	Speaking and Listening	3
General Education: History			3
General Education: Humanities			6
Social Sciences (6 hours listed under Business**)			
		TOTAL	12

Math and Sciences

Courses		Titles	Credits
MATH	121	College Algebra	4
MATH	156	Introduction to Statistics	3
CHEM	111/L	Principles of Chemistry/Lab OR	
GEOL	101/L	Earth Science/Lab	4
PHYS	201/L	Principles of Physics/Lab	4
		TOTAL	15

Business and Management

Courses		Titles	Credits
ACCTG	201	Principles of Financial Accounting	3
BUSAD	270	Business Communications	3
BUSAD	302	Ethics in Business	3
ECON	201**	Principles of Macroeconomics	3
ECON	202**	Principles of Microeconomics	3
MGMT	201	Principles of Management	3
		TOTAL	18

** ECON 201 and 202 are also counting for the Social Science General Education Requirement.

Introduction to Computers

Courses		Titles	Credits
CIS	100	Introduction to Word and Windows	1
CIS	103	PowerPoint & Web Publishing	1
CIS	104	Excel Spreadsheets	1
		TOTAL	3

Major Courses

Courses		Titles	Credits
CET	102	Surveying I	3
CET	103	Surveying II	3
CET	115	Civil Drafting I	3
CET	207	Construction Materials & Methods	3
CET	208	Concrete and Asphalt Materials	3
CET	303	Construction Management	3
CET	304	Building Cost Estimating	3
CET	305	Heavy/Highway Cost Estimating	3
CM	101	Intro to Construction Management	2
CM	231	Statics and Structures	4
CM	320	Soils in Construction	3
CM	330	Wood Structural Systems	3
CM	341	Concrete and Steel Structures	4
CM	351	Construction Planning & Scheduling	3
CM	445	Construction Safety	2
CM	451	Mechanical & Electrical Systems	4
CM	461	Construction Law	3
CM	465	Construction Accounting & Finance	3
CM	475	Senior Project	3
		TOTAL	58

Technical and Management Electives

Select from ACCTG, BUSAD, CET, CM, EN, FIN, MGMT or MKTG..5

Upper Division Technical and Management Electives

Select from ACCTG, BUSAD, CET, CM, EN, FIN, MGMT or MKTG..3

Total required credit hours..120

Graduation Requirements

Construction Management Program Requirements

- Students are required to complete an approved program of study with a cumulative GPA of 2.000 or better in the CM major courses.
- Students are required to demonstrate skills and knowledge in the areas of quantitative analysis and science by having a cumulative GPA of 2.000 or better in the required mathematics and physical science courses.

- Construction management majors are expected to demonstrate the ability to solve problems pertinent to the construction industry by completing a senior-year capstone activity that requires a packaged submittal and an oral presentation.

Institutional and General Education Requirements

To complete the General Education requirements, students are required to take a total of 35 credit hours consisting of the skills and knowledge components as specified under the undergraduate *General Education Requirements* section of this catalog. Construction Management (CM) students will take 17 of the 35 credit hours of the general education requirements under the required math and physical science courses and the required business and management component.

Therefore, the CM majors are expected to take 18 credit hours to complete the remaining skills and knowledge components in Written Communication (6 credit hours), Humanities and Speech Communication (9 credit hours), and history (3 credit hours). Please refer to the undergraduate *General Education Requirements* section of this catalog for the list of courses that can be taken to fulfill the skills and knowledge components.

General Education Requirements in Written
Communication, Humanities, and History 18

Outcomes Assessment Activities

- To be eligible for graduation, all construction management majors are required to take an exit examination. The results of the exit examination are used in the evaluation of the program but have no effect on the student's GPA.
- Graduates and their employers are surveyed on program satisfaction and job performance following their graduation.
- The CM Advisory Committee meets every year to review the three year cycle report and make suggestions for program improvement. The committee also meets with current CM students for an open discussion regarding the CM program.

Co-curricular Activities

The CM faculty supports and encourages the involvement of construction management majors in at least one technical organization relevant to the construction enterprise.

DEPARTMENT OF ENGINEERING

Department Chair: Jane M. Fraser

Faculty: Bedoya Valencia, DePalma, Fraser, Jaksic, Wollega, Yuan

The Department of Engineering offers the following engineering programs.

- The Bachelor of Science in Engineering with a Mechatronics specialization (BSE)
- The Bachelor of Science in Industrial Engineering (BSIE)
- The Master of Science in Engineering (MS)
- The Master of Science in Industrial and Systems Engineering (MS)
- The Pre Engineering program
- The Minor in Engineering
- The Minor in Industrial Engineering
- Lean Green Belt Certificate
- Six Sigma Green Belt Certificate

The Department of Engineering also offers the following minor that is open to all students in all majors:

- The Minor in Sustainability

The BSE is a 4-year program that can be completed at CSU-Pueblo. The program is accredited by the Engineering Accreditation Commission of ABET, http://www.abet.org. The BS in Engineering with specialization in mechatronics is a flexible, broad degree that prepares graduates to work in many industries. Mechatronics combines mechanical and electrical engineering with computers to create devices that make our lives better. Electrical and mechanical systems, controlled by computers, are at the core of a wide range of processes and products. Robots, the Mars Rover, a heart-lung machine, a computer controlled telescope, and a nano-scale microscope are all examples of mechatronics.

The BSIE is a 4-year program that can be completed at CSU-Pueblo. The program is accredited by the Engineering Accreditation Commission of ABET, http://www.abet.org. As defined by the Institute of Industrial Engineers, "industrial engineering is concerned with the design, improvement and installation of integrated systems of people, materials, information, equipment, and energy. It draws upon specialized knowledge and skill in the mathematical and physical sciences, together with the principles and methods of engineering analysis and design, to specify, predict and evaluate the results to be obtained from such integrated systems." Industrial engineering is a major branch of engineering with applications in manufacturing, service, governmental, and non-profit organizations. Industrial engineers are

productivity and quality specialists who deal with the human aspects of work in addition to the advanced technologies of computer software and production related hardware.

A student can receive the BSE and BSIE degree simultaneously by taking 30 additional credit hours over one degree alone, including a second senior design project.

For more information on the MS degree with a major in Industrial and Systems Engineering or the MS degree with a major in Engineering, see the *Graduate Studies* section of this catalog.

In the Pre-Engineering program, students seeking to major in some area of engineering other than industrial engineering or engineering with a mechatronics specialization (for example, civil, electrical, or mechanical engineering) can complete at least 60 credits that will transfer to other engineering schools.

The minors in Engineering and Industrial Engineering are not available to majors in the department.

The Department of Engineering has found that transfer students are very successful in our programs and we welcome transfer students. About half our graduates began their degrees at other institutions.

Undergraduate Admission Requirements

Applying as an incoming freshman

In order to be considered for admission to the BSE or BSIE as an incoming freshman, a student must:

- Be placed into MATH 126, Calculus and Analytic Geometry I, or higher.
- Have a high school GPA of 3.25 or higher on a 4.0 scale.

The number of students admitted to the BSE or the BSIE as incoming freshmen is limited. Priority is given to students with the highest GPA's and ACT/SAT scores. A student admitted as an incoming freshman may continue in the BSE or BSIE program as a sophomore if he or she completes the required first year engineering courses (EN 101, 103, and 107) with a B or better in each course. If a student admitted as an incoming freshman does not meet the requirements to continue in the program as a sophomore, he or she is eligible to apply as a sophomore, as described below.

Applying after completing the required first year courses

A student (including a transfer student) who does not receive admission as a freshman must complete the required first year courses (EN 101, 103, 107, ENG 101, 102, MATH 126, 224, and PHYS 221, 221L) with a grade of C or better in each course in order to be eligible to apply for admission to the BSE or BSIE as a sophomore. Admission is not guaranteed as priority is given to students with the highest GPA's.

BACHELOR OF SCIENCE IN ENGINEERING (BSE) WITH A MECHATRONICS SPECIALIZATION

The BSE program has the following educational objectives and outcomes, which have been approved and are reviewed regularly by the BSE Advisory Board.

BSE Program Outcomes

The BSE program is designed so that students graduate from the program with the following abilities and knowledge:

- An ability to apply knowledge of mathematics, science, and engineering;
- An ability to design and conduct experiments, as well as to analyze and interpret data;
- An ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability;
- An ability to function on multi-disciplinary teams;
- An ability to identify, formulate, and solve engineering problems;
- An understanding of professional and ethical responsibility;
- An ability to communicate effectively;
- The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context;
- A recognition of the need for, and an ability to engage in life-long learning;
- A knowledge of contemporary issues; and
- An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

BSE Educational Objectives

During the first few years after graduation, BSE graduates should be able:

- Conduct low-level designs and modifications of mechatronic systems;

- Trouble shoot and support existing mechatronic systems;
- Work directly with suppliers and customers of mechatronic systems;
- Manage small and support large engineering projects;
- Assume ownership and accountability for engineering projects;
- Function well on teams of engineers with different skill levels;
- Implement basic quality control principles;
- Write sound technical documents such as requests for proposals, grant applications, project specifications and technical reports;
- Continue their education at the graduate level; and
- Obtain additional engineering certifications.

Specific Requirements for the BSE Degree

Students are required to have earned a cumulative GPA of 2.000 or better in required EN courses.

Courses		Titles	Credits
EN	101	Introduction to Engineering	2
EN	103	Problem Solving for Engineers	3
EN	107	Engineering Graphics	2
EN	211	Engineering Mechanics I	3
EN	212	Engineering Mechanics II	3
EN	231/L	Circuit Analysis I/Lab	5
EN	260	Basic Electronics	2
EN	263	Electromechanical Devices	3
EN	321	Thermodynamics	3
EN	324/L	Materials Science and Engineering/Lab	4
EN	343	Engineering Economy	3
EN	360/L	Control Systems I/Lab	3
EN	361/L	Digital Electronics/Lab	4
EN	362/L	Introduction to Mechatronics/Lab	3
EN	363/L	Virtual Machine Design/Lab	3
EN	375	Stochastic Systems Engineering	4
EN	430	Project Planning and Control	3
EN	441/L	Engineering of Manufacturing Processes/Lab	4
EN	443	Quality Control and Reliability	3
EN	460/L	Control Systems II/Lab	3
EN	462/L	Industrial Robotics/Lab	3
EN	473/L	Computer Integrated Manufacturing/Lab	3
EN	486	Senior Seminar	2
EN	487	Engineering Design	3
Math/Science Electives			3
Technical Electives			3

TOTAL   80

Other Required Courses

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	337	Differential Equations I	3
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
ENG	101	Composition I	3
ENG	102	Composition II	3
COMR	103	Speaking and Listening	3
General Education			15

TOTAL   49

DEGREE TOTAL 129

Technical electives must be chosen from an approved list or have the approval of an Engineering adviser.

Typical Schedule of Courses for the BSE Degree

Freshman Year

Courses		Titles	Credits
EN	101	Introduction to Engineering	2
EN	103	Problem Solving for Engineers	3
EN	107	Engineering Graphics	2
ENG	101	Composition I	3
ENG	102	Composition II	3
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
PHYS	221/L	General Physics I/Lab	5
General Education			3

TOTAL   31

Sophomore Year

Courses		Titles	Credits
EN	211	Engineering Mechanics I	3
EN	212	Engineering Mechanics II	3
EN	231/L	Circuit Analysis I/Lab	5
EN	260	Basic Electronics	2
EN	263	Electromechanical Devices	3
EN	324/L	Materials Science and Engineering/Lab	4
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	337	Differential Equations I	3
PHYS	222/L	General Physics II/Lab	5

TOTAL   30

Junior Year

Courses		Titles	Credits
EN	321	Thermodynamics	3
EN	343	Engineering Economy	3
EN	360/L	Control Systems I/Lab	3
EN	361/L	Digital Electronics/Lab	4
EN	362/L	Introduction to Mechatronics/Lab	3

EN	363/L	Virtual Machine Design/Lab	3
EN	375	Stochastic Systems Engineering	4
EN	441/L	Engineering of Manufacturing Processes/Lab	4
EN	443	Quality Control and Reliability	3
EN	460/L	Control Systems II/Lab	3

TOTAL   33

Senior Year

Courses		Titles	Credits
EN	430	Project Planning and Control	3
EN	462/L	Industrial Robotics/Lab	3
EN	473/L	Computer Integrated Manufacturing/Lab	3
EN	486	Senior Seminar	2
EN	487	Engineering Design	3
Math/Science Electives			3
Technical Electives			3
COMR	103	Speaking and Listening	3
General Education			12

TOTAL   35

BACHELOR OF SCIENCE IN INDUSTRIAL ENGINEERING (BSIE)

The BSIE program has the following educational objectives and outcomes, which have been approved and are reviewed regularly by the BSIE Advisory Board.

BSIE Program Outcomes

The BSIE program is designed so that students graduate from the program with the following abilities and knowledge:

- An ability to apply knowledge of mathematics, science, and engineering;
- An ability to design and conduct experiments, as well as to analyze and interpret data;
- An ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability;
- An ability to function on multi-disciplinary teams;
- An ability to identify, formulate, and solve engineering problems;
- An understanding of professional and ethical responsibility;
- An ability to communicate effectively;
- The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context;

- A recognition of the need for, and an ability to engage in life-long learning;
- A knowledge of contemporary issues; and
- An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.

BSIE Educational Objectives

During the first few years after graduation, BSIE graduates should be able to:

- Identify root causes of symptoms and fix problems in situations where data and resources may be lacking and multiple problems may exist;
- Function well on teams of engineers with different skill levels;
- Obtain jobs of increasing responsibility applying industrial engineering skills and knowledge to a wide range of problems in a wide range of industries;
- Continue their education, for example, in MS, PhD, and MBA programs;
- Obtain additional certifications, such as Professional Engineer, Six Sigma Black Belt, or Certified Manufacturing Engineer; and
- Achieve management positions.

Specific Requirements for the BSIE Degree

Students are required to have earned a cumulative GPA of 2.000 or better in required EN courses.

EN Courses		Titles	Credits
EN	101	Introduction to Engineering	2
EN	103	Problem Solving for Engineers	3
EN	107	Engineering Graphics	2
EN	211	Engineering Mechanics I	3
EN	212	Engineering Mechanics II	3
EN	215	Introduction to Industrial and Systems Engineering	3
EN	231/L	Circuit Analysis I/Lab	5
EN	321	Thermodynamics	3
EN	324/L	Materials Science & Engineering/Lab	4
EN	343	Engineering Economy	3
EN	375	Stochastic Systems Engineering	4
EN	420	Simulation Experiments	4
EN	430	Project Planning and control	3
EN	439	Time and Motion Studies	2
EN	440	Safety Engineering	3
EN	441/L	Engineering of Manufacturing Processes/Lab	4
EN	443	Quality Control and Reliability	3
EN	471	Operations Research	3
EN	473/L	Computer Integrated Manufacturing/Lab	3
EN	475	Facility Planning and Design	3
EN	477	Operations Planning and Control	3
EN	486	Senior Seminar	2
EN	488	Industrial Engineering Design	3

Math/Science Electives 3
Technical Electives...3

> TOTAL 77

Other Required Courses

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	337	Differential Equations I	3
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
ENG	101	Composition I	3
ENG	102	Composition II	3
COMR	103	Speaking and Listening	3
General Education			15

> TOTAL 49

DEGREE TOTAL 126

Technical electives must be chosen from an approved list or have the approval of an Engineering adviser.

Typical Schedule of Courses for the BSIE Degree

Freshman Year

Courses		Titles	Credits
EN	101	Introduction to Engineering	2
EN	103	Problem Solving for Engineers	3
EN	107	Engineering Graphics	2
ENG	101	Composition I	3
ENG	102	Composition II	3
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
PHYS	221/L	General Physics I/Lab	5
General Education			3

> TOTAL 31

Sophomore Year

Courses		Titles	Credits
EN	211	Engineering Mechanics I	3
EN	212	Engineering Mechanics II	3
EN	215	Introduction to Industrial and Systems Engineering	3
EN	231/L	Circuit Analysis I/Lab	5
EN	324/L	Materials Science and Engineering/Lab	4
PHYS	222/L	General Physics II/Lab	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	337	Differential Equations I	3

COMR 103 Speaking and Listening 3
General Education 3

> TOTAL 34

Junior Year

Courses		Titles	Credits
EN	321	Thermodynamics	3
EN	343	Engineering Economy	3
EN	375	Stochastic Systems Engineering	4
EN	420	Simulation Experiments	4
EN	439	Time and Motion Studies	2
EN	441/L	Engineering of Manufacturing Processes/Lab	4
EN	443	Quality Control and Reliability	3
EN	471	Operations Research	3
General Education			3
Math/Science Elective			3

> TOTAL 32

Senior Year

Courses		Titles	Credits
EN	430	Project Planning and Control	3
EN	440	Safety Engineering	3
EN	473/L	Computer Integrated Manufacturing Lab	3
EN	475	Facility Planning and Design	3
EN	477	Operations Planning and Control	3
EN	486	Senior Seminar	2
EN	488	Industrial Engineering Design	3
Technical Electives			3
General Education			6

> TOTAL 29

PRE-ENGINEERING PROGRAM

Students seeking to specialize in some area of engineering other than mechatronics or industrial engineering (for example, civil, electrical, or mechanical engineering) can complete at least 60 credits (two years) of courses that will transfer to other engineering schools. The courses should be selected in consultation with an Engineering faculty member and an adviser at the school to which the student plans to transfer. Generally recommended courses for a student planning to transfer to another engineering school include:

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
MATH	337	Differential Equations I	3
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
EN	103	Problem Solving for Engineers	3

EN	211	Engineering Mechanics I 3
EN	212	Engineering Mechanics II 3
EN	231/L	Circuit Analysis I/Lab 5
EN	321	Thermodynamics 3
EN	324/L	Materials Science and Engineering/Lab....................................4

Humanities, Social Sciences & History courses

A student who intends to transfer elsewhere and then decides to stay at CSU-Pueblo will be able to count all of the above courses toward the BSE or the BSIE.

MINOR IN ENGINEERING

The Engineering minor is appropriate for students who want to add knowledge of engineering to their study of a technical field, such as chemistry, mathematics, or physics. The courses in the minor have prerequisites (calculus and physics) that are not listed below. This minor is not available to students majoring in Engineering or Industrial Engineering.

Specific Requirements for the Minor in Engineering

Courses		Titles	Credits
EN	101	Introduction to Engineering...................2
EN	103	Problem Solving for Engineers 3
EN	107	Engineering Graphics 2
EN	211	Engineering Mechanics I 3
EN	212	Engineering Mechanics II 3
EN	231/L	Circuit Analysis I/Lab 5
EN	321	Thermodynamics 3
EN	343	Engineering Economy...........................3

TOTAL   24

MINOR IN INDUSTRIAL ENGINEERING

The minor in Industrial Engineering is appropriate for students who want to add considerations of efficiency, quality, and safety to their study of a technical field, such as chemistry, mathematics, or physics. Some of the courses in the minor have prerequisites (calculus and physics) that are not listed below. This minor is not available to students majoring in Engineering or Industrial Engineering.

Specific Requirements for the Minor in Industrial Engineering

Courses		Titles	Credits
EN	101	Introduction to Engineering...................2
EN	103	Problem Solving for Engineers 3
EN	107	Engineering Graphics 2
EN	215	Introduction to Industrial and Systems Engineering............................3
EN	343	Engineering Economy...........................3

PLUS three of the following:

EN	420	Simulation Experiments........................4
EN	439	Time and Motion Studies......................2
EN	440	Safety Engineering 3
EN	441/L	Engineering of Manufacturing Processes/Lab.......................................4
EN	443	Quality Control and Reliability...............3
EN	471	Operations Research............................3
EN	473/L	Computer Integrated Manufacturing/Lab................................3
EN	475	Facility Planning and Design 3
EN	477	Operations Planning and Control..........3

TOTAL   21-24

Outcomes Assessment Activities

The BSE and BSIE programs and the courses in each program are designed to support the Program Outcomes listed for each degree. Each program has an Advisory Board that meets annually and the input from those Boards is used to revise the programs. The Department also uses the following assessment activities:

- During the final term of study, all engineering students are required to demonstrate their ability to apply and integrate the skills and knowledge learned in the program by producing a capstone engineering design project. This project must incorporate subject material covered in two or more courses in the student's major, involve knowledge or skill not learned in a class thus demonstrating the student's ability to engage in life long learning, involve reflection on the impact of the proposed solution in a global and societal context, and be presented in written and oral reports to demonstrate the student's communication skills.
- All senior engineering studies are encouraged to take the Fundamentals of Engineering (FE) exam administered by the Colorado State Board of Registration for Professional Engineers. The Department periodically sets goals for and reviews the section-by-section performance of students on the FE. The results are used to identify areas of the curriculum that may need improvement.

MINOR IN SUSTAINABILITY

Attention to sustainability is a global trend. Sustainability promotes systems thinking and challenges the student to take the long view of any subject by considering the environmental, social and economic effects. Moreover, sustainability has played and will play a critical role in the future workforce. This minor provides students with the opportunity to position themselves strategically in the ever-changing workforce. It challenges students to think systemically and globally, while shaping them to become leaders.

Three core concepts in sustainability shape the minor: science and technology, economics, and social and cultural perspectives. These three are interconnected and serve as guides for the curricular pathways selected by the students in the minor.

Student Learning Outcomes

The student learning outcomes are differentiated by the six levels of Bloom's taxonomy:

KNOWLEDGE

- Identify the principles and core concepts of sustainability and its role within local and global contexts.

COMPREHENSION & SYNTHESIS

- Explain the socio-cultural, economic, scientific and technological implications of sustainability problems and solutions from a systemic perspective.
- Synthesize the scientific and technological foundations and socioeconomic impacts of different sustainable alternatives within a local and global context to become agents of change who champion sustainable skills and principles in their communities and organizations.

APPLICATION

- Demonstrate the ability to formulate technical, operational and strategic frameworks for sustainability problems and solutions within local and global contexts.

ANALYSIS

- Develop critical and rational thinking skills to understand systems interdependencies and emergent aspects associated with sustainability.

EVALUATION

- Use the scientific method and knowledge transfer processes to assess and select different solutions for sustainability related problems, with local and global contexts.

Outcome Assessment Activities

The assessment plan for the minor consists of a two-step process initiated in the introductory courses.

1. **Pre and Post Literacy Assessment:** A questionnaire designed to measure sustainability literacy is administered at the beginning of the EN 109 course. The same questionnaire is applied at the beginning of the Sustainability capstone Project Course and gains in knowledge are assessed.
2. **Skills and Competencies:** During the Sustainability Capstone Experience, students are required to design and deploy a sustainability related project that will be used to assess the student learning objectives.

Specific Requirements for the Sustainability Minor

The minor In Sustainability is open to students in all majors.

Courses		Titles	Credits
EN	109	Introduction to Sustainability	2
CHEM	125	Environmental Science	3
EN	489	Senior Capstone in Sustainability	1
		Sustainability Electives	15**
		TOTAL	21

**Sustainability electives are to be selected, with approval of the student's adviser, from a list of approved sustainability electives. The electives must include three courses from outside the college of the student's major and two courses from inside the college of the student's major.

Senior Capstone Experience

This course allows the student to bring together interdisciplinary knowledge to:

- Synthesize and apply sustainability principles and concepts to the student's major;
- Synthesize and apply sustainability principles and concepts to disciplines outside of the student's area of study or interest;
- Enhance professional skills as applied to the student's major and the sustainability discipline by demonstrating competencies including research techniques, team building, oral presentations, strategy and policy analysis and development; and
- To prepare to obtain professional certifications and future jobs.

It is expected that the student will apply the acquired knowledge, competencies and skill set in a community-based setting (through experiential education) and demonstrate the ability to effect positive change around a sustainability issue.

Sustainability Capstone Project Prerequisites

The Capstone Project will be open to students who have declared a minor in Sustainability and have completed the core requirements and at least 75% of the minor's electives. It is preferred that this capstone experience be taken in the senior year, after all other minor requirements have been met.

CERTIFICATE PROGRAMS

Lean Green Belt Certificate

The Lean Green Belt Certificate Program is a 5-credit hour certificate program housed in the Department of

Engineering. A lean company views itself as a part of an extended value chain, focusing on the elimination of waste between the company and its suppliers and the company and its customers. Lean is a management philosophy derived mostly from the Toyota Production System (TPS). Upon completion of this certificate, a student will have developed a deep understanding of the principles of lean manufacturing and will be able to apply these principles in manufacturing or service organizations.

The University does not transcript certificates, so records of the Lean Green Belt Certificate Program and the issuance of the certificate are administered by the Chair of the Department of Engineering.

Student Learning Outcomes

Students who successfully complete the Lean Green Belt Certificate Program are expected to have the ability to:

- Identify waste and propose ways to eliminate such waste; and
- Compute and apply measures related to lean processes.

Outcomes Assessment Activities

Within the department's existing assessment structures, the performance of Certificate students in the specific courses will be evaluated separately from other students.

Specific Requirements for the Lean Green Belt Certificate

Students will receive a Lean Green Belt Certificate after completing the following courses with required grades of B or better.

Undergraduate Student

Courses		Titles	Credits
EN	439	Time and Motion Studies	2
EN	477	Operations Planning and Control	3
		TOTAL	5

Graduate Student

Courses		Titles	Credits
EN	539	Time and Motion Studies	2
EN	577	Operations Planning and Control	3
		TOTAL	5

Students do not need to apply to the program. The certificate will be issued upon completion of the required courses as the required level.

Six Sigma Green Belt Certificate

The Six Sigma Green Belt Certificate Program is a 7-credit hour certificate program housed in the Department of Engineering. Six Sigma is a method of continuous process improvement. First developed at Motorola in the 1980s, the systematic approach of Define, Measure, Analyze, Improve, and Control (DMAIC) and the associated tools (such as the fishbone diagram, the Pareto chart, and ANOVA) have been widely and successfully applied. Upon completion of this certificate, a student will be able to play a major role in process improvement and will be prepared to achieve the Black Belt and Master Black Belt certifications through their company.

The University does not transcript certificates, so records of the Six Sigma Green Belt Certificate Program and the issuance of the certificate are administered by the Chair of the Department of Engineering.

Student Learning Outcomes

Students who successfully complete the Six Sigma Green Belt Certificate Program are expected to have the ability to:

- Collect and analyze data, using appropriate statistical tools; and
- Select and apply appropriate Six Sigma tools to improve a process.

Outcomes Assessment Activities

Within the department's existing assessment structures, the performance of Certificate students in the specific courses will be evaluated separately from other students.

Specific Requirements for the Six Sigma Green Belt Certificate

Students will receive a Six Sigma Green Belt Certificate after completing the following:

Undergraduate Student (7 credits)

- EN 275 or EN 375 with grade of B or better, or evidence of completion of a course equivalent to EN 275 or EN 375.
- EN 443 with grade of B or better.

Graduate Student (7 credits)

- EN 375 with grade of B or better, or evidence of a course equivalent to EN 275 or EN 375.
- EN 543 with grade of B or better.

Students do not need to apply to the program. The certificate will be issued upon completion of the required courses at the required level.

EXERCISE SCIENCE, HEALTH PROMOTION, AND RECREATION DEPARTMENT

Department Chair: Steve McClaran

Faculty: Bowen, L. Clark, R. Clark, Conroy, Dallam, Foust, Hostetter, Marley, Rochester

The mission of the Department of Exercise Science, Health Promotion, and Recreation is to prepare students for professional positions and leadership roles in Athletic Training and Exercise Science, Health Promotion, and Recreation through experiential educational opportunities that promote wellness and healthy lifestyles. The EXHPR department awards two degrees:

- A Bachelor of Science degree in Athletic Training (AT) Or
- A Bachelor of Science degree in Exercise Science, Health Promotion, and Recreation (EXHPR). The BS in Exercise Science, Health Promotion, and Recreation (EXHPR) program currently includes five emphasis of study:

  - General Exercise Science
  - Health Promotion/Wellness
  - Physical Education K-12 Teacher Preparation
  - Recreation
  - Strength & Conditioning

Department Vision

The EXHPR Department's vision is to provide students with a broad-based theoretical foundation supported by laboratory and field experiences that allow individual observations, inferences, and hands-on mastery of skills related to the promotion of wellness and healthy lifestyles. This vision is accomplished by creating effective professional learning opportunities based on the following conceptual hierarchy of learning skills: Information Retrieval, Conceptual Understanding, Information Analysis, Critical Thinking, Development of Relevant Skill, and Practical Application of Ideas. In so doing we prepare student to become productive, accountable, ethical, and responsible professionals.

General Requirements

All departmental Majors are required to:

- Complete an EXHPR emphasis of study with a cumulative GPA of 2.50 or higher or the Athletic Training major with a cumulative GPA of 2.75 or higher;

- Earn a 2.0 overall GPA to enroll in 300 or 400 level courses in the department;
- Earn a minimum grade of a "C" in all prerequisite and major courses;
- Repeat prerequisite and major courses with a grade of "D" or lower until a grade of "C" or higher is achieved; and
- Earn a cumulative GPA of 2.0 or higher in required English and speech communication courses.

ATHLETIC TRAINING

http://ceeps.csupueblo.edu/EXHPR/AthleticTraining/Pages/default.aspx

Student Learning Outcomes

Athletic Training major graduates will be able to demonstrate:

- Evidence-based practice.
- Prevention and health promotion.
- Clinical examination and diagnosis.
- Acute care of injury and illness.
- Therapeutic interventions.
- Psychosocial strategies and referral.
- Health care Administration.
- Professional development and responsibility.

The student outcomes are measured and assessed through several techniques:

- Direct measure through the Board of Certification (BOC) examination which assesses the proficiency of each of the previous listed student outcome areas.
- Indirect measure through graduate, alumni and employer surveys.

Specific Requirements for the Athletic Training Major

Required Major Courses

Courses		Titles	Credits
AT	101	Introduction to Athletic Training	2
AT	232	First Aid	2
AT	233	Emergency Care in Athletic Training	1
AT	260	Care and Prevention of Athletic Injuries	3
AT	279	Practicum in Athletic Training I	2
AT	323	Functional Exercise Training	2
AT	330	Lower Extremity Evaluation	3
AT	331	Upper Extremity Evaluation	3
AT	332	Head, Neck and Spine Evaluation	3
AT	339	Clinical Pathology & Assessment	3
AT	379	Practicum in Athletic Training II	1
AT	389	Practicum in Athletic Training III	1
AT	419	Athletic Training Field Experience	12

AT 430 Therapeutic Modalities.........................3
AT 431 Therapeutic Exercise 3
AT 443 Administration in Athletic Training.........3
AT 479 Practicum in Athletic Training IV 1
AT 489 Practicum in Athletic Training V 1
AT 488 BOC Test Prep 1

TOTAL 50

Other Required Courses

Courses		Titles	Credits
BIOL	112	Nutrition	3
BIOL	223	Human Physiology & Anatomy I	3
BIOL	223L	Human Physiology & Anatomy I Lab	1
BIOL	224	Human Physiology & Anatomy II	3
BIOL	224L	Human Physiology & Anatomy II Lab	1
CIS	100	Intro to Word and Windows	1
CIS	103	PowerPoint and Web Publishing	1
CIS	104	Excel Spreadsheets	1
COMR	103	Speaking and Listening	3
EXHP	162	Personal Health	3
EXHP	162L	Personal Health Lab	1
EXHP	222	Behavior Facilitation	3
EXHP	343	Research and Statistics	3
EXHP	344	Exercise Physiology	3
EXHP	344L	Exercise Physiology Lab	1
EXHP	364	Kinesiology	3
MATH	121	College Algebra	4
PSYCH	151	Human Development	3
		OR	
PSYCH	100	General Psychology	3
PSYCH	205	Introduction to Sport Psychology	3

General Education: English................................6
General Education: History 3
General Education: Humanities..........................6
General Education: Social Science 3

TOTAL 62
Hours outside the Major 8

Total credit hours..120

Accreditation

The Colorado State University-Pueblo Athletic Training Program is accredited by the Commission on Accreditation of Athletic Training Education (C.A.A.T.E.).

Competitive Admission Policy

The Athletic Training Program is highly competitive. Entry into the upper division courses and the clinical portion of the curriculum is not guaranteed upon completion of the pre-professional phase (the first two years of coursework). The determining factors include the success of the pre-professional experience, meeting all academic prerequisites, and number of students enrolled in the program. The number of students admitted into the program varies from year to year.

Application Criteria/Procedure

The following criteria must be met to be considered for admission into the upper division courses and the clinical portion of the Colorado State University-Pueblo Athletic Training Program (AT Program)

- Completion of the Colorado State University-Pueblo Athletic Training Application. The student can obtain the application form from the program director. Completed applications are due to the program director by March 1st;
- Completion of AT 101, 232, 233, 260, 279, BIOL 223, 223L and BIOL 224, 224L. (AT 101, 232, 233, 260 and 279 with a B or higher, all others with a C or higher grade);
- An overall grade point average of 2.75 or higher;
- A declared Athletic Training major;
- Proof of current Red Cross First Aid and CPR/AED for the Professional Rescuer Certification;
- Letter of recommendation from a BOC-Certified Athletic Trainer;
- Complete interview with ATEP Director, faculty, and clinical Instructors; and
- NATA membership is highly recommended but not required.

The Athletic Training Program faculty/staff will make the final decisions regarding acceptance into the upper division courses and the clinical portion of the program based upon the student's total rankings on the admission criteria and available slots in the program. All applying students will receive written notification from the program director indicating their acceptance or denial into the upper division courses and clinical portion of the Athletic Training Program.

Transfer Students

Students wishing to transfer to the Colorado State University-Pueblo Athletic Training Program must satisfy the above criteria. According to accreditation guidelines any courses containing competency or proficiency evaluation cannot be accepted as transfer credits, unless an affiliate site agreement exists between the institution and CSU-Pueblo. Transfer students must understand that application to the upper division courses and the clinical portion of the athletic training education program occurs once a year during the spring semester only. Once accepted into the upper division courses and the clinical portion of the program students must complete 4 terms in order to be eligible for graduation.

Requirements upon Program Acceptance

The following are required at the student's expense:

- Completion of program approved physical exam;
- Completion of the program's Technical Standards Form;
- Completion of a yearly Tuberculosis skin test and Hepatitis B vaccination and documentation or Hepatitis B declination form;
- Purchase of athletic training student liability insurance;
- Proof of medical insurance;
- Completion of "Background Check" will be required prior to going to any affiliated sites for clinical experience; and
- The athletic training student will need their own personal transportation for travel to get to off-campus clinical sites.

Retention Criteria

In order to remain in the Athletic Training Program the student must:

- Maintain a 2.75 or higher overall GPA;
- Earn grades of no less than a B in all Athletic Training (AT) courses;
- Maintain athletic training student liability insurance; and
- Maintain Red Cross First Aid and CPR/AED for the Professional Rescuer Certification.

Outcome Assessment Activities for Athletic Training

In addition to assessment, which is inherent in the core/major requirements, prior to receiving clearance for graduation, each Athletic Training major must complete:

- Departmental exit survey and alumni surveys,
- All NATA educational competencies and proficiencies,
- Practicum and fieldwork evaluations,
- Employer surveys, and
- An exit comprehensive examination and assessment of the pass rate for the Board of Certification (BOC) exam if taken.

EXERCISE SCIENCE, HEALTH PROMOTION AND RECREATION

http://ceeps.csupueblo.edu/EXHPR/Pages/default.aspx

The BS degree in EXHPR prepares program graduates for professional positions in worksite, clinical, school, fitness government and community settings.

- Graduates of the General Exercise Science coursework are prepared for exercise and fitness related professional positions. This emphasis is an excellent selection for students preparing for advanced study in fields such as exercise physiology, allied health, or sport administration.
- Graduates of the Health Promotion/Wellness emphasis are eligible to sit for the National Commission for Health Education Credentialing exam to become a Certified Health Education Specialist. Health Promotion/Wellness graduates can find employment in worksite health promotion, community health, government and volunteer health agencies, clinical and managed care settings.
- Graduates of the Physical Education K-12 Teacher Preparation emphasis who also complete the Teacher Education program, and receive a passing score on the Colorado Department of Education P.L.A.C.E. test are eligible to receive Teacher Licensure in the State of Colorado. Licensed graduates can find physical education teaching positions in both the public and private school settings.
- Graduates of the Recreation emphasis are prepared for careers in City and County Recreation Departments, YMCAs, Intramural Sports, Resort & Travel destinations, Rafting Trips, Wilderness Experiences, Youth Camps and Developmental Programs.
- Graduates of the Strength and Conditioning emphasis are prepared to take the National Strength and Conditioning Association certification. Graduates can find employment in fitness and recreation facilities, high school and college athletics and allied health industries.

Student Learning Outcomes

General Exercise Science, Health Promotion, Physical Education, and Recreation students will:

- Possess content knowledge and skills necessary for their perspective fields of study;
- Exhibit the ability to read and interpret scientific research with application of the scientific methods, statistics, study design, and reporting;
- Evaluate and integrate critical concepts and skills acquired in the EXHPR program to common professional problems in the fields of interest;
- Exhibit effective oral and written communication regarding subjects related to EXHPR in an individual and group setting; and
- Apply and demonstrate knowledge, skills and critical problem solving in a field-based setting.

Assessment of EXHPR Student/Program Outcomes

The student outcomes are measured and assessed through several techniques:

- End of program case study assessment and end of program examination;
- Fieldwork, internship and student teaching portfolios and projects;
- Internship and student teaching site supervisor evaluations;
- Student exit surveys; and
- Employer surveys and Advisory Committee

End of program exams will be, or will be representative of, the professional certification exams in each emphasis area. Case study questions will be developed by the faculty and EXHPR Advisory Committee (made up of professionals in the EXHPR field). The end of program exam will be completed during an appropriate field based course at the end of the course of study but before graduation. The EXHPR curriculum map details the specific types of assessments used in the capstone and experiential end of program courses to assess the Program's Student Outcomes.

Upon completion of the EXHP core program requirements, students will be eligible to sit for a variety of nationally recognized certification exams including those offered by the American College of Sports Medicine ("Health/Fitness Instructor", "Personal Trainer", and Exercise Leader"), the American Council on Exercise ("Personal Trainer", and "Aerobics Instructor"), the Aerobics and Fitness Association of America ("Personal Trainer", and "Aerobics Instructor"), and the National Strength and Conditioning Association ("Certified Strength and Conditioning Specialist").

Specific Requirements for the Exercise Science, Health Promotion Emphases:

- General Exercise Science
- Health Promotion/Wellness
- Physical Education K-12 Teacher Preparation
- Strength & Conditioning

Core Course Requirements for EXHP Emphasis Areas

Courses		Titles	Credits
EXHP	101	Introduction to EXHPR	2
BIOL	112	Nutrition	3
EXHP	162	Personal Health	3
EXHP	162L	Personal Health Lab	1
EXHP	222	Behavior Facilitation	3
AT	232	First Aid	2
EXHP	343	Research and Statistics	3
EXHP	344	Exercise Physiology	3
EXHP	344L	Exercise Physiology Lab	1
EXHP	364	Kinesiology	3
EXHP	461	Managing Programs in EXHPR	3
		TOTAL	**27**

Emphasis Area Course Requirements

GENERAL EXERCISE SCIENCE EMPHASIS

Required EXHP Core Courses...27

Required Emphasis Courses

Courses		Titles	Credits
EXHP	201	Drugs and Healthy Lifestyles	3
AT	260	Care and Prevention of Athletic Injuries	3
EXHP	436	Exercise Assessment	3
EXHP	494	Field Experience	6
		OR	
EXHP	498	Internship	12

The choice of Internship or Fieldwork in the above area will determine the hours in area below.

13-19 credits from the following with a minimum of 4-10 upper division:

Courses		Titles	Credits
REC	100L	Wilderness Technical Skills	1
REC	102	Mountain Orientation	2
REC	103	Winter Orientation	2
REC	104	Desert Orientation	2
REC	105	Canyon Orientation	2
EXHP	103L	Triathlon	1
EXHP	104L	Personal Fitness	1
EXHP	105L	Snow Sports	1
EXHP	106L	Martial Arts and Self-Defense	1
EXHP	108L	Yoga	1
EXHP	109L	Volleyball	1
EXHP	110L	Weight Training	1
EXHP	111	Commitment to Academic Excellence	1
REC	112L	Rock Climbing	1
REC	113L	Whitewater Boating	1
REC	114L	Basic Mountaineering Techniques	1
REC	116L	Camping	1
REC	117L	Backpacking	1
EXHP	118L	Jogging	1
EXHP	120L	Aerobics	1
EXHP	123L	Zumba	1
EXHP	124L	Tai Chi	1
EXHP	175L	Racquetball	1
EXHP	176L	Life Guard Training	2
PSYCH	205	Intro to Sports Psychology	3
EXHP	205L	Snow Sports II	1
EXHP	208L	Yoga II	1
EXHP	233	History and Principles of Physical Education and Recreation	2
REC	240	Recreation Program Design	3
EXHP	243	Methods of Rhythmic Activities	2
EXHP	245	Motor Learning and Development	3
REC	249	Challenge Course Leadership	2
REC	270	Outdoor Leadership I	2
AT	279	Practicum in Athletic Training I	2
EXHP	288	Health Promotion Practicum	3

EXHP	301	Dartfish Training	1
EXHP	310L	Adv. Methods Strength & Conditioning	1
REC	322	Wilderness First Aid	2
AT	323	Functional Exercise Training	2
EXHP	345	Methods of Physical Activities & Games I	2
EXHP	346	Methods Physical Activities & Games II	2
EXHP	347	Methods of Fitness Instruction	1
EXHP	348	Methods of Individual and Dual Sports	3
REC	350	Leadership and Ethics	3
REC	360	Outdoor Education	3
REC	375	Research and Evaluation of Recreation	3
EXHP	382	Lifestyle Disease Risk Reduction	3
EXHP	432	Applied Sport & Exercise Psychology	3
EXHP	440	Biomechanics	3
EXHP	464	Adapted Physical Education	3
EXHP	469	Coaching and Officiating Track & Field	2
EXHP	470	Methods of Coaching	3
EXHP	472	Coaching and Officiating Basketball	2
EXHP	475	Coaching and Officiating Volleyball	2
EXHP	482	Coaching and Officiating Wrestling	2
EXHP	483	Coaching and Officiating Baseball	2
EXHP	484	Coaching and Officiating Soccer	2
REC	485	Recreation Facility Design/Management	3
EXHP	492	Research	1-3

TOTAL 34

Other Required Courses

Courses		Titles	Credits
BIOL	223	Human Physiology & Anatomy I	3
BIOL	223L	Human Physiology & Anatomy I Lab	1
BIOL	224	Human Physiology & Anatomy II	3
BIOL	224L	Human Physiology & Anatomy II Lab	1
CIS	100	Intro to Word and Windows	1
CIS	103	PowerPoint and Web Publishing	1
CIS	104	Excel Spreadsheets	1
COMR	103	Speaking and Listening	3
MATH	121	College Algebra	4
PSYCH	151	Human Development	3
		OR	
PSYCH	100	General Psychology	3
General Education: English			6
General Education: History			3
General Education: Humanities			6
General Education: Social Science			3

TOTAL 39

Courses Outside the Major 20
(Must include 8 upper division hours if 19 were taken
 in emphasis.)

Total credit hours 120

HEALTH PROMOTION/WELLNESS EMPHASIS

Course Requirements for Health Promotion/Wellness Emphasis

Required EXHP Core Courses 27

Required Emphasis Courses

Courses		Titles	Credits
EXHP	201	Drugs and Healthy Lifestyles	3
EXHP	288	Health Promotion Practicum	3
EXHP	336	Community Health	3
EXHP	362	Evaluation of Current Health Issues	2
EXHP	382	Lifestyle Disease Risk Reduction	3
EXHP	436	Exercise Assessment	3
EXHP	485	Methods in Health Promotion	3
EXHP	487	Health Promotion Program Planning/Evaluation	4
EXHP	498	Internship	12
MCCNM	210	Intro to Integrated Communication	3
		OR	
MKTG	340	Principles of Marketing	3

TOTAL 39

Other Required Courses

Courses		Titles	Credits
BIOL	223	Human Physiology & Anatomy I	3
BIOL	223L	Human Physiology & Anatomy I Lab	1
BIOL	224	Human Physiology & Anatomy II	3
BIOL	224L	Human Physiology & Anatomy II Lab	1
CIS	100	Intro to Word and Windows	1
CIS	103	PowerPoint and Web Publishing	1
CIS	104	Excel Spreadsheets	1
COMR	103	Speaking and Listening	3
MATH	121	College Algebra	4
PSYCH	151	Human Development	3
		OR	
PSYCH	100	General Psychology	3
General Education: English			6
General Education: History			3
General Education: Humanities			6
General Education: Social Science			3

TOTAL 39

Courses outside the Major 15

Total credit hours 120

PHYSICAL EDUCATION K-12 TEACHER PREPARATION EMPHASIS

Students in the Physical Education Teacher Education Program (K-12) will be able to:

- Meet Colorado State University-Pueblo Teacher Education Goals and Beginning Physical Education Teacher Standards (in the areas of knowledge, dispositions, and performance). See links for detail: http://ceeps.csupueblo.edu/TEP/StandardsAndGoals/Pages/default.aspx.
- Be prepared to develop safety plans, teach and adapt lessons in a progressive manner, and meet the needs of diverse learners in the following activities: 1) Rhythmic Activities, 2) Tumbling, 3) Individual Sports, 4) Dual Sports, 5) Team Sports, 6) Fitness Education, 7) Adventure education, and 8) Team Sports.

Course Requirements for Physical Education K-12 Teacher Preparation Emphasis

Required EXHP Core Courses.......................................27

Required Emphasis Courses

Courses		Titles	Credits
AT	260	Care & Prevention of Athletic Injuries	3
EXHP	233	History and Principles of Physical Education and Recreation	2
EXHP	243	Methods of Rhythmic Activities	2
EXHP	245	Motor Learning and Development	3
EXHP	345	Methods of Physical Activities & Games I	2
EXHP	346	Methods Physical Activities & Games II	2
EXHP	347	Methods of Fitness Instruction	1
EXHP	348	Methods of Individual and Dual Sports	3
EXHP	351	Methods of Teaching Elementary Physical Ed	3
EXHP	470	Methods of Coaching	3
		OR	
EXHP	485	Methods in Health Promotion	3
EXHP	478	Methods of Teaching Secondary Physical Education	3

Two credits from the following:

EXHP	105L	Snow Sports	1
REC	102	Mountain Orientation	2
REC	103	Winter Orientation	2
REC	104	Desert Orientation	2
REC	105	Canyon Orientation	2
REC	112L	Rock Climbing	1
REC	113L	Whitewater Boating	1
REC	114L	Basic Mountaineering Techniques	1
REC	116L	Camping	1
REC	117L	Backpacking	1
EXHP	205L	Snow Sports II	1
REC	249	Challenge Course Leadership	2

One class from the following:

EXHP	103L	Triathlon	1
EXHP	104L	Personal Fitness	1
EXHP	106L	Martial Arts and Self-Defense	1

EXHP	108L	Yoga	1
EXHP	109L	Volleyball	1
EXHP	110L	Weight Training	1
EXHP	119L	Walking for Fitness	1
EXHP	120L	Aerobics	1
EXHP	121L	Aerobic Instructor Training	1
EXHP	123L	Zumba	1
EXHP	124L	Tai Chi	1
EXHP	174L	Tennis	1
EXHP	175L	Racquetball	1
EXHP	208L	Yoga II	1
EXHP	470	Methods of Coaching	3
EXHP	485	Methods in Health Promotion	3

One credit from the following:

EXHP	146L	Beginning Swimming	1
EXHP	176L	Life Guard Training	2
EXHP	246L	Methods of Swimming	1
EXHP	276L	Water Safety Instructor Certification	2

TOTAL   31

Other Required Courses

Courses		Titles	Credits
BIOL	223	Human Physiology & Anatomy I	3
BIOL	223L	Human Physiology & Anatomy I Lab	1
COMR	103	Speaking and Listening	3
ED	202	Foundation of Education	3
ED	280	Educational Media and Technology	3
ED	301	Frameworks of Teaching	4
ED	485	Capstone Seminar in Education	1
ED	489	Student Teaching K-12	12
EXHP	465	Adapted Physical Education	3
		OR	
ED	412	Teaching Diverse Learners	3
MATH	121	College Algebra	4
PSYCH	151	Human Development	3
		OR	
PSYCH	251	Childhood and Adolescence	
		OR	
PSYCH	342	Educational Psychology	
RDG	435	Content Area Literacy	4
General Education: English			6
General Education: History			3
General Education: Humanities			6
General Education: Social Science			3

(Providing either PSYCH 151 or 251 was taken above)

TOTAL   62

Total credit hours...120

Please see the *Teacher Education Program* section of this catalog for admission to the Teacher Education Program.

STRENGTH & CONDITIONING EMPHASIS

Course Requirements for Strength & Conditioning Emphasis

Required EXHP Core Courses.......................................27

Required Emphasis Courses

Courses		Titles	Credits
EXHP	110L	Weight Training.....................................1
EXHP	201	Drugs and Healthy Lifestyles 3
PSYCH	205	Introduction to Sport Psychology 3
AT	260	Care and Prevention of Athletic Injuries...3
EXHP	301	Dartfish Training 1
EXHP	310L	Adv. Methods Strength & Conditioning .1
EXHP	320	NSCA Test Preparation 2
AT	323	Functional Exercise Training 2
REC	350	Leadership and Ethics 3
EXHP	382	Lifestyle Disease Risk Reduction..........3
EXHP	432	Applied Sport & Exercise Psychology...3
EXHP	436	Exercise Assessment 3
EXHP	440	Biomechanics 3
EXHP	494	Field Experience...................................6

TOTAL   37

Other Required Courses

Courses		Titles	Credits
BIOL	223	Human Physiology & Anatomy I 3
BIOL	223L	Human Physiology & Anatomy I Lab 1
BIOL	224	Human Physiology & Anatomy II 3
BIOL	224L	Human Physiology & Anatomy II Lab ...1
CIS	100	Intro to Word and Windows 1
CIS	103	PowerPoint and Web Publishing...........1
CIS	104	Excel Spreadsheets..............................1
COMR	103	Speaking and Listening 3
MATH	121	College Algebra 4
PSYCH	151	Human Development..............................3
		OR
PSYCH	100	General Psychology..............................3
General Education: English................................6
General Education: History 3
General Education: Humanities.........................6
General Education: Social Science 3

TOTAL   39

Courses Outside the Major...17

Total credit hours..120

RECREATION EMPHASIS

The Recreation Emphasis offers two concentration areas to choose from:

- Outdoor Leadership and Wilderness Education
- Recreation Management

Completion of the Recreation emphasis prepares graduates to work in positions of leadership in a variety of recreational service agencies. Prospective employers include parks and recreation departments at the city, county, district, and state levels as well as voluntary youth agencies such as the YWCA/YMCA, boys' and girls' clubs and scouting. Other areas of employment include recreation programs in the military, hospital, commercial, and worksite settings as well as hospital and therapeutic settings. Students completing the Recreation Management concentration are eligible to sit for the Certified Park and Recreation Professional (CPRP). Students who participate in the Outdoor Leadership and Wilderness Education concentration have the opportunity to be certified through the Wilderness Education Association as an outdoor leader. This process requires the student to take specific outdoor adventure education courses at CSU-Pueblo, go on at least five extended trips, be a Wilderness First Responder, and lead at least two trips as a student leader.

Specific Requirements for the Recreation Emphasis

Core Course Requirements for the Recreation Emphasis

Courses		Titles	Credits
EXHP	101	Introduction to EXHPR 2
REC	100L	Wilderness Tech Skills 1
REC		take 2 credits from 102-117L...............2
REC	240	Recreation Program Design 3
REC	249	Challenge Course Leadership 2
REC	250	Commercial Recreation and Tourism ...3
REC	280	Foundations of Therapeutic Recreation 3
AT	232	First Aid 2
		OR
REC	322	Wilderness First Aid (OL/WE required).2
MCCNM	210	Intro to Integrated Communication 3
REC	350	Leadership and Ethics 3
REC	360	Outdoor Education................................3
REC	375	Research and Evaluation of Recreation..3
REC	389	Community/Commercial Rec Practicum ..3
EXHP	461	Managing Programs in EXHPR 3
REC	493	Seminar 2
REC	485	Recreation Facility Design/Management .3
REC	498	Internship...12
		OR
REC	489	Internship in Therapeutic Rec.............12
CIS	100	Introduction to Word and Windows.......1
CIS	103	PowerPoint and Web Publishing 1
CIS	104	Excel Spreadsheets..............................1

TOTAL   56

Concentration Course Requirements

Students pursuing the Recreation emphasis are required to select a concentration area in either Outdoor Leadership and Wilderness Education or Recreation Management.

OUTDOOR LEADERSHIP AND WILDERNESS EDUCATION CONCENTRATION REQUIRMENTS

Courses		Titles	Credits
Required Recreation Core Courses 56			
REC	102	Mountain Orientation 2	
REC	104	Desert Orientation...............................2	
REC	103	Winter Orientation OR	
REC	105	Canyon Orientation..............................2	
REC	270	Outdoor Leadership I...........................2	
REC	370	Outdoor Leadership II..........................2	
REC	484	Outdoor Resources and Management ..2	

TOTAL   68

Hours outside the Major 17
(at least 2 upper division credits)

General Education Requirements 35

Courses		Titles	Credits
COMR	103	Speaking and Listening 3	
MATH		3	
Social Sciences		3	
PSYCH	151	Human Development.....................3 OR	
PSYCH	100	General Psychology.......................3	
General Education: English.......................................6			
Humanities		6	
History		3	
Natural and Physical Science....................................4			
BIOL	121	Environmental Conservation..........3	
BIOL	121L	Environmental Conservation Lab...1	

Total credit hours..120

RECREATION MANAGEMENT CONCENTRATION

Courses		Titles	Credits
Required Recreation Core Courses 56			
MGMT	201	Principles of Management 3	
MGMT	318	Human Resource Management............3	
MKTG	340	Principles of Marketing 3	
MKTG	342	Promotional Strategy ....3 OR	
MKTG	345	Retail Management OR	
MKTG	348	Consumer Behavior	

TOTAL   68

Hours outside the Major 17

General Education Requirements 35

Courses	Titles	Credits
MATH	3	
Social Sciences	3	
PSYCH 151	Human Development....................3 OR	
PSYCH 100	General Psychology 3	
General Education: English.......................................6		
Humanities	6	
COMR 103	Speaking and Listening 3	
History	3	
Natural and Physical Science 8		

Total credit hours... 120

EXHPR MINORS

Five minors are available in Exercise Science, Health Promotion and Recreation:

- The Exercise Science and Health Promotion minor is available to all non-EXHP majors. This minor is ideal for Biology majors in the pre-physical therapy, pre-medicine, or pre-chiropractic emphasis areas of study or any student interested in Exercise Science and Health Promotion.
- The Coaching minor is available to all students and is a great choice for students aspiring to coach.
- The Outdoor Physical Education minor is for students who want to teach adventure education, outdoor skills and lead trips within the structure of K-12 schools and other educational settings.
- The Recreation minor is available to all non-REC majors. The minor is ideal for those majoring in EXHPR, social work, sociology, and biology as well as for students aspiring to teach in public/private schools.
- The Fitness and Recreational Sports Management minor is ideal for business students, community/ commercial recreation students or any student interested in managing fitness and recreational sports facilities.

EXHPR minors will:

- Complete the credit hour requirement of the minor;
- Complete all required coursework with a cumulative GPA of 2.5 or higher;
- Earn a minimum grade of a "C" in all minor courses;
- Repeat minor courses with a grade of "D" or lower until a grade of "C" or higher is achieved;
- Possess content knowledge and skills necessary for their perspective fields of study;

- Evaluate and integrate critical concepts and skills acquired in the EXHPR program to common professional problems in the fields of interest; and
- Exhibit effective oral and written communication regarding subjects related to EXHPR in an individual and group setting.

Coaching

Courses		Titles	Credits
BIOL	112	Nutrition	3
PSYCH	205	Introduction to Sport Psychology	3
AT	260	Care and Prevention of Athletic Injuries	3
EXHP	301	Dartfish Training	1
EXHP	310L	Adv. Methods Strength and Conditioning	1
EXHP	432	Applied Sport & Exercise Psychology	3
EXHP	470	Methods of Coaching	3
EXHP		Methods of coaching courses and/or	3
EXHP	494	Field Experience	(1-3 VAR)

TOTAL   20

Exercise Science and Health Promotion
(for Non-EXHPR Majors)

Courses		Titles	Credits
EXHP	101	Introduction to EXHPR	2
BIOL	112	Nutrition	3
EXHP	162	Personal Health	3
EXHP	162L	Personal Health Lab	1

Two credits from the following list 2

REC	102	Mountain Orientation	2
REC	103	Winter Orientation	2
REC	104	Desert Orientation	2
EXHP	104L	Personal Fitness	1
EXHP	106L	Martial Arts and Self-Defense	1
EXHP	108L	Yoga	1
EXHP	109L	Volleyball	1
EXHP	110L	Weight Training	1
REC	112L	Rock Climbing	1
REC	113L	Whitewater Boating	1
REC	114L	Basic Mountaineering Techniques	1
REC	116L	Camping	1
REC	117L	Backpacking	1
EXHP	119L	Walking for Fitness	1
EXHP	120L	Aerobics	1
EXHP	123L	Zumba	1
EXHP	174L	Tennis	1
EXHP	175L	Racquetball	1
EXHP	176L	Life Guard Training	1
EXHP	205L	Snow Sports II	1
EXHP	208L	Yoga II	1
EXHP		300 or higher level student electives	9

TOTAL   20

Outdoor Physical Education

REC	100L	Wilderness Technical Skills	1
REC	249	Challenge Course Leadership	2
REC	270	Outdoor Leadership I	2
REC	322	Wilderness First Aid	2
		OR	
EXHP	176L	Life Guard Training	2
REC	360	Outdoor Education	3

Choose one of the following: 2

REC	102*	Mountain Orientation	2
REC	103	Winter Orientation	2
REC	104	Desert Orientation	2
REC	105	Canyon Orientation	2

Six additional credit hours from the following: 6

EXHP	105L	Snow Sports	1
REC	112L	Rock Climbing	1
REC	113L	Whitewater Boating	1
REC	117L	Backpacking	1
EXHP	205L	Snow Sports II	1
EXHP	276L	Water Safety Instructor Certification	2
REC	114L	Basic Mountaineering Techniques	1
REC	350	Leadership and Ethics	3
REC	484	Outdoor Resources and Management	2
EXHP	549	Facilitation of Adventure Education	3

TOTAL   20

*Students pursuing the WEA Outdoor Leadership Certification must enroll in REC 102 (Mountain Orientation) and complete additional leading experiences as per the certification requirements.

Fitness and Recreational Sports Management Minor

Courses		Titles	Credits
ACCTG	201	Financial Accounting	3
MGMT	201	Principles of Management OR	
EXHP	461	Managing Programs in EXHPR	3
MGMT	318*	Human Resources Management OR	
MGMT	349*	Management of Service Businesses	3
REC	240	Recreation Program Design	3
REC	485	Recreation Facility Design/Management	3

Choose two of the following: 5-6

REC	250	Commercial Recreation and Tourism	3
REC	484	Outdoor Resources and Management	2
MGMT	349*	Management of Service Businesses	3
MGMT	365*	Management Information Systems	3

| MKTG | 342* | Promotional Strategy | 3 |
| MKTG | 348* | Consumer Behavior | 3 |

TOTAL   20-21

*These courses require prerequisites to be taken prior to taking course.

Recreation Minor
(for Non-REC Majors)

Courses		Titles	Credits
EXHP	101	Introduction to EXHPR	2
EXHP	461	Managing Programs in EXHPR	3
REC	240	Recreation Program Design	3
REC	280	Foundations of Therapeutic Recreation	3
REC	360	Outdoor Education	3
REC	375	Research and Evaluation of Recreation	3
REC	389	Community/Commercial Rec Practicum	3

TOTAL   20

NURSING DEPARTMENT

Interim Associate Dean: Dr. Joe Franta

Undergraduate Coordinator: Ruth DePalma

Graduate Coordinator: Susan Belport

Faculty: Cerankowski, Coram, Heintzelman

Department Mission

The mission of the Department of Nursing is to prepare graduates for professional positions as safe, competent and caring nurses to meet the healthcare needs of diverse populations.

Program Outcomes

1. Eighty percent of graduates will:

   - Complete the program within one and one half times the length of the program.
   - Express satisfaction with the program.
   - Pass national licensure exam the first time.
   - Be employed in role related professional practice within six months to one year.

2. Eighty percent of employers will express satisfaction with graduates' job performance.

Department Goals

The Nursing Department will:

- Provide quality learning experiences for nursing students that prepare graduates for entry level baccalaureate nursing practice or advanced nursing practice in a culturally diverse community.
- Provide multiple degree entry paths based on previous education and academic entrance criteria that support student achievement at a professional level.
- Serve as a regional nursing education center for southern Colorado, by collaborating with local and regional health care agencies to provide nursing programs.
- Maintain educational excellence demonstrated by program status consistent with the Colorado Board of Nursing, national accrediting agency criteria and educational emphases on professional nursing standards.
- Provide a supportive and caring learning environment to address the learning needs for a diverse student population.
- Support role development responsive to the changing health care environment by redefining and maintaining competencies throughout one's practice.

National Accreditation

The CSU-Pueblo Department of Nursing baccalaureate educational program is fully accredited by the Accreditation Commission for Education in Nursing (ACEN), 3343 Peachtree Rd NE, Suite 850 Atlanta, GA 30326.

State Board Approval

The CSU-Pueblo Department of Nursing baccalaureate educational program is fully approved by the Colorado Board of Nursing.

The Bachelor of Science in Nursing Program

The Colorado State University-Pueblo Department of Nursing offers an undergraduate program that confers a Bachelor of Science in Nursing (BSN). The undergraduate program offers several options for the basic nursing student (Basic BSN), the registered nurse (RN-BSN), licensed practical nurse (LPN-BSN), degree plus students to BSN (Accelerated-BSN), and the paramedic (Paramedic-BSN) to obtain their BSN degree. The Basic BSN is an option developed for the student who has completed prerequisite courses and has no degree, certificate or license. The RN-BSN option is developed for an associate degree or diploma nurse with a license to complete their BSN. The student with another baccalaureate or masters degree may apply to the Degree

Plus to BSN option or the Basic BSN. Licensed practical nurses that have a nursing license or completed an accredited program may apply for the LPN-BSN or Basic BSN option. The paramedic may elect to apply for the Paramedic-BSN or Basic BSN option.

Expected Student Learning Outcomes

- Demonstrate caring through advocacy for patients by providing compassionate care based on respect for patient's preferences, values, and needs.
- Collaborate effectively within health care team, to achieve safe, quality patient care in a variety of health care settings.
- Use nursing judgment based on best current evidence to ensure optimal outcomes for patients and families.
- Demonstrate professional identity, integrity, and leadership as the coordinator of patient care.

Outcome Assessments

The outcome assessments will be evaluated through or by:

- Assessment of clinical competencies through multiple strategies including simulations and clinical evaluation tools.
- Individual and course evaluations including the standardized testing program.
- Survey of nursing graduates and their employers.
- National Certification and/or Licensure Examination (NCLEX) required of graduates prior to professional nursing practice as a registered nurse.
- A survey of graduate employment and graduation rates.

Undergraduate Admission Policies and Procedures

Students are responsible for all undergraduate admissions policies and procedures as outlined in the *Academic Policies* section of this catalog.

Undergraduate Admission Requirements

There are two ways to apply for admission to the Nursing Program.

Admission as a High School Senior to Nursing Program as a Freshman

Slots for admission as a freshman are limited. Admission is not guaranteed as students with the highest GPA's and ACT/SAT scores will have priority selection. Preference is given to students graduating from Southern Colorado high schools and/or Health Academy programs. In order to be admitted directly in to the program as a freshman, students must:

- Demonstrate proof of high school diploma. Students must show proof of 3 years of science, including biology and chemistry and proof of algebra or equivalent.
- Have a cumulative high school GPA of 3.25 or higher on a 4.0 scale.
- Have minimal scores: ACT 22 or SAT 1040.
- Remain a full-time CSU-Pueblo student and maintain a 3.0 cumulative average and 3.0 nursing prerequisite average while taking courses at CSU-Pueblo.
- Have prerequisites and general education completed by the start of the second semester sophomore year.

If students do not have these requirements, they will lose their opportunity to progress directly into the nursing program.

Students denied admission as freshman are eligible to apply as second semester sophomores.

Admission as a Second Semester Sophomore from CSU-Pueblo or Transfer from an Accredited School

Admission to the University does not imply acceptance to the nursing program. The undergraduate program is very competitive and applicants are ranked based on their GPA for the general education and prerequisites required by the program. Fifty percent of the prerequisites and general education courses must be completed by the application deadline. Special consideration will be given to students completing all of their prerequisite and general education coursework at CSU-Pueblo. For the basic nursing student admission:

- Requirements are a minimum GPA of 3.00 for all required general education and prerequisites. All prerequisites must be passed with a C or better (C- is not acceptable) and be completed prior to the term of entrance into the nursing program. Students receiving a grade less than C in a nursing prerequisite course are not eligible for admission. Prerequisite courses may be repeated one (1) time only for admission eligibility.
- All general education must be completed prior to the term of entrance into the nursing program.
- The student needs to be admitted to CSU-Pueblo first, and then submit a separate application to the nursing program the year prior to the spring (traditional) or summer (accelerated) term they plan to start the program. During the pre-nursing phase of the application process, students will be advised by the pre-nursing adviser.

Students will be notified in writing of their admission status to the program. Those students who are accepted to the program must return receipt of acceptance by the stated deadline or the admission status will be revoked.

Students for whom English is a second language must have a TOFEL of 550 or have completed the University requirements of English and Speech skills.

Undergraduate Nursing Program Application Process

Applications to the nursing program may be obtained at http://ceeps.csupueblo.edu/nursing or in the nursing department. The completed applications must be submitted to the nursing department by the scheduled deadline. Incomplete applications will not be processed. Applicants should contact the department with questions regarding applications.

Post Acceptance Requirements

Before a student starts the nursing program they must attend a mandatory orientation.

The following must be submitted through the nursing tracking system after receiving a personal identification number from the University and instructions from the Department of Nursing prior to orientation. Failure to do so by the stated deadline will result in loss of admission status.

- Background check per Colorado Law. (House bill 97-1084).
- A urine drug screen.
- Current certification in CPR (Health Care Provider-C or equivalent).
- Current physical examination within the last year and current immunizations including, hepatitis B series, TB test or two step if necessary, measles, mumps, rubella, influenza, tetanus and varicella titers.
- Proof of current health insurance.

The following must be submitted to the Department of Nursing prior to orientation by the stated deadline:

- Current unofficial transcripts showing completion of all prerequisite and general education classes.
- Return receipt for program acceptance.

In order to register for undergraduate nursing courses with the exception of NSG 207, NSG 305, NSG 307, and NSG 431, students must have unconditional acceptance into the nursing program and follow the degree plan, or register by permission of the nursing undergraduate program coordinator.

Acceptance of Transfer Credit

Transfer credit will be awarded per the published *Academic Policies* section of this catalog. Credit will be awarded for a course in which a grade of C or better was earned. Grades of C- are not accepted for any nursing or nursing prerequisite course. Requests for transfer of nursing credit are evaluated on an individual basis.

Time Limits

For applicants to all options (except the RN to BSN), Anatomy & Physiology I & II, Intro to Human Development, and Pathophysiology completed (5) years or more before applying to the nursing program will not be accepted as satisfying the prerequisite requirement.

Nursing courses completed five (5) or more years before the date of graduation, either at CSU-Pueblo or at some other institution, will not be accepted as satisfying graduation requirements without the approval of the nursing admissions committee.

Academic Standards

Students are responsible for all academic standards policies per the published *Academic Policies* section of this catalog. In addition to those policies, the following applies:

- Students must complete all nursing courses with a grade of B or better. Failure of any nursing courses will result in dismissal from the program. The student may be eligible for re-admission on a one-time basis only. If readmission is granted, subsequent failure will make the student ineligible for re-admission.
- Students must follow their appropriate program option nursing course sequence plan.
- All nursing courses with corresponding labs must be completed in the same semester. Exceptions are only by permission of the undergraduate nursing program coordinator.

Graduation Requirement

The BSN degree will be granted to undergraduate nursing degree-seeking students who meet all of the published requirements plus the additional requirements below:

- Have a cumulative nursing GPA of 3.00 or better at graduation. All required prerequisite courses must be passed with a C or better. All nursing courses must be passed with a B or better or satisfactory (S).
- Complete the program's minimum number of hours of approved nursing course work within five years.

Licensure Examination

Students must complete all of the Bachelor of Science in Nursing requirements and required national standardized exams in order to be qualified to sit for the National Certification Licensure Examination.

The Basic Bachelor of Science in Nursing Option (Basic BSN)

The Basic BSN program assists the new student who has completed their prerequisite courses to enter a dynamic ever-changing profession of nursing by completing their BSN degree requirements. The program is based on a philosophical approach to nursing that includes the caring and the Quality and Safety Education for Nursing (QSEN) competencies. The Colorado State University-Pueblo offers the ideal foundation for the development of the professional nurse.

Program of Study

The pre-nursing adviser is notified once the student has declared their major. The student must contact their pre-nursing adviser to develop their program plan as soon as possible. The plan will include 46 credit hours of required prerequisite courses and 74 credit hours of nursing courses for a total of 120 credit hours.

Hybrid Courses

A **hybrid course** is a combination classroom/on-line course. Students meet in a classroom at a regularly-scheduled time and place, the rest of the time is spent online. Both parts of the course, classroom attendance and online work, are mandatory.

General Education and Prerequisites Courses

Courses		Titles	Credits
ENG	101	Composition I	3
ENG	102	Composition II	3
COMR	103	Speaking and Listening	3
BIOL	206/L	Introduction to Microbiology/Lab	4
BIOL	223/L	Human Physiology & Anatomy I/Lab	4
BIOL	224/L	Human Physiology & Anatomy II/Lab	4
CHEM	111/L	Principles of Chemistry/Lab	4
MATH	156	Introduction to Statistics	3
NSG	207	Nursing Pathophysiology	3
PSYCH	151	Human Development	3
History		Per Gen. Ed. Requirement	3
Foreign Language			3
Humanities		Per Gen. Ed. Requirement	3
Social Science		Per Gen. Ed. Requirement	3
		TOTAL	46

NSG Courses		Titles	Credits
NSG	231	Concepts for Professional Nursing	2
NSG	232/L	Fundamentals of Nursing Care/Lab	7
NSG	302/L	Health Promotion & Assessment/Lab	3
NSG	308	Pharmacology in Nursing Practice	3
NSG	312/L	Caring for Childbearing Family/Lab	6
NSG	322/L	Caring for Adults I/Lab	8
NSG	331	Healthy Aging	2

NSG	332/L	Caring for Children/Families/Lab	6
NSG	351	Evidence Based Nursing Practice	3
NSG	371	Healthcare Informatics	2
NSG	382/L	Dynamics of Behavioral Health/Lab	6
NSG	420/L	Caring for Adults II/Lab	8
NSG	442/L	Global Public Health/Lab	6
NSG	451	Nursing Leadership & Issues	3
NSG	452/L	Comprehensive Nursing Practice/Lab	9
		TOTAL	74

Elective Concentrated Clinical Practicum

The elective concentrated clinical practicum allows the student enrolled in the Basic options to choose an area of clinical concentration during their progression through the program. The student will meet with their adviser and course coordinator to develop their plan. The elective concentrated clinical practicum is not an option for students enrolled in the degree plus to BSN accelerated or Paramedic to BSN options.

Summer - Junior
NSG	372	Clinical Practicum I	3

Spring - Senior
NSG	472	Clinical Practicum II	3

Basic BSN Option Program Plan

Freshman - Fall

Courses		Titles	Credits
ENG	101	Composition I	3
BIOL	223/L	Human Physiology & Anatomy I/Lab	4
PSYCH	151	Human Development	3
COMR	103	Speaking and Listening	3
Foreign Language			3
		TOTAL	16

Freshman - Spring

Courses		Titles	Credits
ENG	102	Composition II	3
BIOL	224/L	Physiology & Anatomy II/Lab	4
MATH	156	Introduction to Statistics	3
Humanities		Per Gen. Ed. Requirement	3
Social Science		Per Gen. Ed. Requirement	3
		TOTAL	16

Sophomore - Fall

Courses		Titles	Credits
BIOL	206/L	Introduction to Microbiology/Lab	4
CHEM	111/L	Principles of Chemistry/Lab	4

NSG 207 Nursing Pathophysiology 3
History Per Gen. Ed. Requirement 3
_____
TOTAL 14

Sophomore - Spring

Courses		Titles	Credits
NSG	231	Concepts for Professional Nursing	2
NSG	232/L	Fundamentals of Nursing Care/Lab	7
NSG	302/L	Health Promotion & Assessment/Lab	3
NSG	331	Healthy Aging	2
NSG	371	Healthcare Informatics	2

_____
TOTAL 16

Junior - Fall

Courses		Titles	Credits
NSG	308	Pharmacology in Nursing Practice	3
NSG	312/L	Caring for Childbearing Family/Lab OR	
NSG	332/L	Caring for Children/Families/Lab	6
NSG	382/L	Dynamics of Behavioral Health/Lab	6

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TOTAL 15

Junior - Spring

Courses		Titles	Credits
NSG	322/L	Caring for Adults I/Lab	8
NSG	312/L	Caring for Childbearing Family/Lab OR	
NSG	332/L	Caring for Children/Families/Lab	6
NSG	351	Evidence Based Nursing Research	3

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TOTAL 17

Senior - Fall

Courses		Titles	Credits
NSG	420/L	Caring for Adults II/Lab	8
NSG	442/L	Global Public Health/Lab	6

_____
TOTAL 14

Senior - Spring
(Graduation Contract Due)

Courses		Titles	Credits
NSG	451	Nursing Leadership & Issues	3
NSG	452/L	Comprehensive Nursing Practice/Lab	9

_____
TOTAL 12

Licensed Practical Nurses Bachelor of Science in Nursing Option (LPN-BSN)

Licensed practical nurses who wish to obtain their Bachelor of Science in Nursing degree may do so through the LPN-BSN option. To qualify for this option the student must apply thru the regular nursing application process.

LPN-BSN Option Admission Requirements

In addition to the undergraduate program admission requirements, the applicant for this option will:

- Bring the actual license of certificate to the Department of Nursing for faculty visualization and photocopying prior to the start of the first nursing class.
- Receive seven escrow credits for NSG 232/232L, awarded for LPN credits.

Program of Study

The pre-nursing adviser will meet with the student to plan a program of study for the LPN-BSN option. The program of study will include 46 credit hours of prerequisite courses (see Basic BSN), and 74 credit hours of nursing courses. The licensed practical nurse may transfer in seven nursing escrow credit hours per the articulation agreement.*

LPN-BSN Option Program Plan

Prerequisite Courses
(See Basic BSN)

Spring or Summer

Courses		Titles	Credits
NSG	231	Concepts for Professional Nursing	2
NSG	232/L*	Fundamentals of Nursing Care/Lab	7
NSG	302/L	Health Promotion & Assessment/Lab	3
NSG	331	Healthy Aging	2
NSG	371	Healthcare Informatics	2

_____
TOTAL 16

Junior - Fall

Courses		Titles	Credits
NSG	308	Pharmacology in Nursing Practice	3
NSG	312/L	Caring for Childbearing Family/Lab OR	
NSG	332/L	Caring for Children/Families/Lab	6
NSG	382/L	Dynamics of Behavioral Health/Lab	6

_____
TOTAL 15

Junior - Spring

Courses		Titles	Credits
NSG	322/L	Caring for Adults I/Lab 8	
NSG	312/L	Caring for Childbearing Family/Lab OR	
NSG	332/L	Caring for Children/Families/Lab 6	
NSG	351	Evidence Based Nursing Research 3	
		TOTAL	17

Senior - Fall

Courses		Titles	Credits
NSG	420/L	Caring for Adults II/Lab 8	
NSG	442/L	Global Public Health/Lab 6	
		TOTAL	14

Senior - Spring
(Graduation Contract Due)

Courses		Titles	Credits
NSG	451	Nursing Leadership & Issues................3	
NSG	452/L	Comprehensive Nursing Practice/Lab ..9	
		TOTAL	12

Registered Nurse to Bachelor of Science in Nursing Option (RN-BSN)

RN-BSN Admissions Requirements

The student needs to be admitted to CSU-Pueblo first, and then submit a separate application to the nursing program. Completed nursing applications must be submitted to the nursing department by the scheduled deadline. Incomplete applications will not be processed. Applicants should contact the department with questions regarding applications. Additional requirements for the RN-BSN option include:

- Completion of an Associate Degree or Diploma in Nursing.
- Colorado registered nursing license in good standing.
- Resident of the State of Colorado
- Admission to CSU-Pueblo
- All prerequisites must be passed with a C or better (C- is not acceptable) and be completed prior to the term of entrance into the nursing program. Students receiving a grade less than C in a nursing prerequisite course are not eligible for admission. Prerequisite courses may be repeated one (1) time only for admission eligibility.
- All general education must be completed prior to the term of entrance into the nursing program.

Students will be notified in writing of their admission status to the program. Those students who are accepted to the program must return receipt of acceptance by the stated deadline or the admission status will be revoked.

Program of Study

The student must confer with the RN-BSN adviser to develop a program of study which is designed to assist the working RN in returning to school to complete their BSN. Courses are offered on-line and hybrid. The RN-BSN option will include 33 credit hours through articulation, 43 credit hours of prerequisite or co-requisite courses and 44 credit hours of nursing and approved elective courses for a total of 120 credit hours. Students must pass all nursing courses with a B or better and maintain a nursing 3.00 GPA. RN's transferring from community colleges can transfer in 43 prerequisite credits along with 33 RN credits for a total of 76 credit hours. This applies only to the students in the RN to BSN option.

Nursing Transfer/Credits... 33

Prerequisite Courses (excluding NSG 207) 43

Required General Education and Science Courses
(Excluding NSG 207)

Courses		Titles	Credits
ENG	101	Composition I......................................3	
ENG	102	Composition II.....................................3	
COMR	103	Speaking and Listening 3	
BIOL	206/L	Introduction to Microbiology/Lab...........4	
BIOL	223/L	Human Physiology & Anatomy I/Lab 4	
BIOL	224/L	Human Physiology & Anatomy II/Lab 4	
CHEM	111/L	Principles of Chemistry/Lab..................4	
MATH	156	Introduction to Statistics 3	
PSYCH	151	Human Development...........................3	
History		Per Gen. Ed. Requirement 3	
Foreign Language		3	
Humanities		Per Gen. Ed. Requirement 3	
Social Science		Per Gen. Ed. Requirement 3	
		TOTAL	43

RN-BSN Courses

Courses		Titles	Credits
NSG	302/L	Health Promotion & Assessment/Lab...3	
NSG	307	Health and Disease Systems................3	
NSG	309	Professional Nursing Practice...............4	
NSG	311	Concepts for Professional Nursing 4	
NSG	331	Healthy Aging 2	
NSG	351	Evidence Based Nursing Practice 3	
NSG	371	Healthcare Informatics.........................2	
NSG	442/L	Public Health Nursing/Lab 6	
NSG	451	Nursing Leadership and Issues 3	
NSG	452/L	Comprehensive Nursing Practice/Lab ..9	

Approved upper division elective.......................................1
Approved electives (lower or upper division)....................4

TOTAL   44

RN-BSN Option Program Plan

Prerequisite Courses
(See Basic BSN - excluding NSG 207)

Fall - Junior

Courses		Titles	Credits
NSG	307	Health and Disease Systems................3
NSG	309	Professional Nursing Practice...............4
Approved electives (lower or upper division)....................4			

TOTAL   11

Spring - Junior

Courses		Titles	Credits
NSG	311	Concepts for Professional Nursing 4
NSG	351	Evidence Based Nursing Practice.........3
NSG	371	Healthcare Informatics..........................2

TOTAL   9

Summer - Junior

Courses		Titles	Credits
NSG	302/L	Health Promotion & Assessment/Lab ...3
NSG	331	Healthy Aging 2

TOTAL   5

Fall - Senior

Courses		Titles	Credits
NSG	442/L	Global Public Health/Lab 6
Approved upper division elective.......................................1			

TOTAL   7

Spring - Senior

Courses		Titles	Credits
NSG	451	Nursing Leadership & Issues................3
NSG	452/L	Comprehensive Nursing Practice/Lab ..9

TOTAL   12

Degree Plus to Bachelor of Science in Nursing (BSN) Accelerated Option

The Degree-Plus Accelerated Option is for students with a previous non-nursing baccalaureate degree. The applicant must have completed the necessary prerequisites prior to starting the program. The Accelerated Option offers students an intense, challenging approach that enables students to complete the Bachelor of Science in Nursing degree in 14 months.

The degree-plus student is expected to meet with the pre-nursing adviser for advisement and plan development. The student must have a cumulative nursing prerequisite GPA of 3.0 and follow all admission and post acceptance requirements set forth in the Basic Nursing Option. Due to the intensity of the curriculum, it is advised that the student not work and be able to attend to their studies full-time. Students must maintain a cumulative nursing 3.00 GPA to progress.

Admission to this option is very competitive and applicants are ranked based on their prerequisite GPA.

Prerequisite Courses			Credits
BIOL	206/L	Introduction to Microbiology/Lab...........4
BIOL	223/L	Human Physiology & Anatomy I/Lab 4
BIOL	224/L	Human Physiology & Anatomy II/Lab ...4
CHEM	111/L	Principles of Chemistry/Lab..................4
MATH	156	Introduction to Statistics 3
NSG	207	Pathophysiology 3
PSYCH	151	Human Development..........................3
Foreign Language..3			

TOTAL   28

Degree Plus to BSN Accelerated Option Program Plan

Summer

Courses		Titles	Credits
NSG	231	Concepts for Professional Nursing 2
NSG	232/L	Fundamentals of Nursing Care/Lab......7
NSG	302/L	Health Promotion & Assessment/Lab ...3
NSG	308	Pharmacology in Nursing Practice........3
NSG	331	Health Aging..2

TOTAL   17

Fall

Courses		Titles	Credits
NSG	312/L	Caring for Childbearing Family/Lab 6
NSG	322/L	Caring for Adults I/Lab.........................8
NSG	332/L	Caring for Children/Families/Lab 6

TOTAL   20

Spring

Courses		Titles	Credits
NSG	351	Evidence Based Nursing Practice 3
NSG	382/L	Dynamics of Behavioral Health/Lab......6
NSG	420/L	Caring for Adults II/Lab.........................8
NSG	371	Healthcare Informatics..........................2

TOTAL   19

Summer

Courses		Titles	Credits
NSG	442/L	Global Public Health/Lab 6
NSG	451	Nursing Leadership & Issues................3
NSG	452/L	Comprehensive Nursing Practice/Lab ..9

TOTAL   18

Paramedic to Bachelor in Nursing Accelerated Option (Paramedic-BSN)

The Paramedic to BSN option allows the paramedic who has graduated from an accredited program to complete their BSN. The applicant must have completed the necessary prerequisite courses prior to starting the program.

The student is expected to meet with a nursing adviser for advisement and plan development. The student must follow all admission and post acceptance requirements set forth in the Basic Nursing Program. Due to the intensity of the curriculum, it is advised that the student not work and be able to attend to their studies full-time. Applicants are ranked with the accelerated option for admission based on prerequisite GPA.

Prerequisite and General Education Courses

Courses		Titles	Credits
ENG	101	Composition I...3
ENG	102	Composition II..3
COMR	103	Speaking and Listening 3
BIOL	206/L	Introduction to Microbiology/Lab 4
BIOL	223/L	Human Physiology & Anatomy I/Lab 4
BIOL	224/L	Human Physiology & Anatomy II/Lab ...4
CHEM	111/L	Principles of Chemistry/Lab 4
MATH	156	Introduction to Statistics.......................3
NSG	207	Nursing Pathophysiology 3
PSYCH	151	Human Development.............................3
History		Per Gen. Ed. Requirement 3
Foreign Language 3
Humanities		Per Gen. Ed. Requirement 3
Social Science		Per Gen. Ed. Requirement 3

TOTAL   46

Program Plan

Summer

Courses		Titles	Credits
NSG	231	Concepts for Professional Nursing 2
NSG	232/L	Fundamentals of Nursing Care/Lab 7
NSG	302/L	Health Promotion & Assessment/Lab ...3
NSG	308	Pharmacology in Nursing Practice........3
NSG	331	Health Aging 2

TOTAL   17

Fall

Courses		Titles	Credits
NSG	312/L	Caring for Childbearing Family/Lab 6
NSG	322/L	Caring for Adults I/Lab..........................8
NSG	332/L	Caring for Children/Families/Lab 6

TOTAL   20

Spring

Courses		Titles	Credits
NSG	351	Evidence Based Nursing Practice 3
NSG	382/L	Dynamics of Behavioral Health/Lab......6
NSG	420/L	Caring for Adults II/Lab.........................8
NSG	371	Healthcare Informatics..........................2

TOTAL   19

Summer

Courses		Titles	Credits
NSG	442/L	Global Public Health/Lab 6
NSG	451	Nursing Leadership & Issues................3
NSG	452/L	Comprehensive Nursing Practice/Lab ..9

TOTAL   18

TEACHER EDUCATION PROGRAM

Interim Associate Dean: Jeff Piquette

Faculty: Massey, Peters, Pettit, Piazza, Piquette

Mission of the Teacher Education

The Teacher Education Program has a primary mission of preparing teachers of quality and distinction. At Colorado State University-Pueblo, preparing teachers is a campus-wide responsibility, with faculty and administrators involved in support of the program's mission. An integral component of the program is its formal partnership with 17 school districts and four community colleges in southern and southeastern Colorado. The joint efforts of students, faculty, and administrators across all partners focus on improving the quality of learning in classrooms in elementary, secondary, and higher education.

Conceptual Framework—Building and Bridging Communities of Learners

A *Conceptual Framework* is a guide for how a teacher education program is planned and organized, summarizing its philosophical views of the roles of teaching and learning and its essential understandings of how students become teachers. The conceptual framework of teacher education at Colorado State University-Pueblo is *Building and Bridging Communities of Learners*. The organizing theme of *learning communities* focuses the attention of faculty and students on the

essential nature of teaching and learning: How does community shape learning and achievement? What are the roles of successful learners and teachers? What social interactions are necessary for both learning and community? How is the definition of a learning community changing in an increasingly technological age? What is the relationship between the concept of learning community and the democratic ideal of American education?

For faculty at CSU-Pueblo, the vision of quality education requires a learner-centered environment in which learning (not teaching) is at the core. All learners will achieve in communities in which learning is publicly and constructively discussed, a positive climate surrounds all members, and support exists for all learners' individual growth and development.

Inclusive, equitable communities require constant attention to the nature of relationships among teachers and students. CSU-Pueblo students will be prepared to participate as learners and teachers in overlapping and expanding learning communities–from the University classroom to K-12 settings, the professional education community, distributed communities created by technology, and cultural, economic, and political communities of students and their families.

To become beginning teachers, students must change their perceptions of themselves as learners and as students of teaching. As students progress through the program, they will skillfully assume a variety of roles, including those of master learners, instructors, collaborators, apprentices, models, coaches, colleagues, and mentors. It is the mission of the teacher education program to prepare teachers and learners of quality and distinction by exposing students to quality communities of teaching and learning.

Program Goals

- Prepare teachers of quality and distinction with broad-based liberal arts education, depth of knowledge in the areas in which they teach, and the ability to skillfully translate theory and practice to ensure student learning.
- Create a learner-centered community designed to achieve program goals and expected student results.
- Provide systematic advising and evaluation activities which assure student success and program quality.
- Serve the region and state of Colorado through partnerships with school districts and institutions of higher education.

Expected Student Outcomes

The Teacher Education Program is a standards-based model of education. Student outcomes are the foundation of the program, upon which the curriculum, instruction,

and assessment are aligned and implemented. Based on its mission to produce teachers of quality and distinction, the program has adopted goals in eight areas. Each goal has been articulated into a series of performance-based standards or outcomes that all students must achieve before completing the program. Benchmarks, or more specific outcomes, for each standard have been developed as course objectives throughout the program and faculty across campus have organized course requirements and assignments to assure that students can meet these standards at high levels.

Standards are aligned with the *Performance-based Standards for Colorado Teachers* (2000) and requirements of the Colorado Department of Education and Colorado Department of Higher Education. Proficiency in all standards is required for successful completion of teacher education and recommendation for state licensure.

CSU-Pueblo teacher education graduates will:

1. Use democratic principles to create communities of learners that assure positive social interactions, collaboration, and cooperation.
2. Create learning experiences that make content knowledge accessible, exciting, and meaningful for all students.
3. Create a learning community in which individual differences are respected, appreciated, and celebrated.
4. Ensure, through the use of standards and informal and formal assessment activities, the continuous development of all learners.
5. Construct and use pedagogy to maximize the intellectual, social, physical, and moral development of all students.
6. Be reflective decision-makers, incorporating understandings of educational history, philosophy, and inquiry, as will as the values of the democratic ideal.
7. Create communities of learning by working collaboratively with colleagues, families, and other members.
8. Model the professional and ethical responsibilities of the education profession.

Outcome Assessment Activities

Teacher Education assesses student knowledge and skills at three points in the program: admission to education, admission to student teaching, and during the student teaching semester (program completion). Assessment activities include a review of 1) performance documented in students' eportfolios; 2) scores on standardized tests of general education and content knowledge; 3) ratings of proficiency on program standards by K-12 classroom teachers, University faculty, and student teacher

supervisors based on direct observation of teaching; 4) self-evaluations/ratings of proficiency on program standards by program completers and graduates one year after teaching; and 5) ratings of proficiency by K-12 supervisors after graduates have taught for one year.

Teaching Endorsement Areas

The Teacher Education Program collaborates with other academic units to offer programs leading to Colorado teacher licensure in the following endorsement areas:

- Art (K-12)
- Elementary Education (K-6)
- English (7-12)
- Foreign Languages (7-12) –Spanish
- Mathematics (7-12)
- Music (K-12)
- Physical Education (K-12)
- Science (7-12)
- Social Studies (7-12)

See the Teacher Education Handbook for add-on endorsements that have been approved by the Colorado Department of Education in K-12: Instructional Technology, Culturally Linguistically Diverse Education, and Special Education.

Selective Entry and Retention in Teacher Education Admission

Many education courses require the prerequisite of admission to education (see description of courses). Students complete the admission to education process during ED 301: Frameworks of Teaching. The entire process for gathering information and submitting it to faculty is completed during the course.
The following are the requirements that must be met to be admitted to teacher education. No exceptions can occur to these requirements:

1. Cumulative grade point of 2.600 or greater.
2. Completion of ENG 101 and 102 with grades of C or better.
3. Completion of MATH 109 or math course required by major field. A grade of B or better is required in MATH 109 or MATH 360; a grade of C or better is required in MATH 121, 124, 126, or 221. Students who complete both MATH 109 and MATH 156 or MATH 360 and MATH 361 prior to admission may be admitted with grades of C or better in both courses.
4. Completion of COMR 103 with a grade of B- or better, or, students completing COMR 103 with a C or degree plus students may complete this competency through the Oral Proficiency Exam.
5. Completion of ED 301 with a grade of C or better.
6. Completion of a formal, standardized test during ED 301 such as the Proficiency Profile and a writing sample.

7. Completion of satisfactory background check with the Colorado Bureau of Investigation. Background check is sent to the Colorado Department of Education and report must meet the criteria required for obtaining a teaching license in Colorado as outlined in 22-60.5-103 C.R.S.
8. Completion of an education portfolio. Six types of materials will be submitted with the portfolio: 1) transcripts and official documents demonstrating students performance in University classes, 2) materials developed in University classes which demonstrate proficiency on specific education standards, 3) recommendations and evaluations from teachers, 4) materials used in field experiences and videos of teaching, 5) personal reflections and summaries about progress, and 6) results of formal tests. Specific portfolio requirements and manner of evaluation are included in the appendices to the *Teacher Education Handbook.* All portfolios will be submitted in electronic format (website).

Retention

Students must maintain a cumulative GPA of 2.600 and must continue to make progress towards proficiency on program standards to remain in the teacher education program. Additional details related to program retention are included in the *Teacher Education Handbook.*

Student Teaching

Student teaching provides opportunities to integrate theory with practice. Prior to being approved for a student teaching assignment, the following requirements must be met:

1. Completion of all course work including courses in the content area and education.
2. Cumulative GPA of 2.600.
3. GPA of 2.500 in the academic major.
4. Grades of C or higher in all courses required for licensure.
5. Passing score on the content exam in the student's licensure area, required by the State of Colorado.
6. Successful completion of an education portfolio. Six types of materials will be submitted with the portfolio: 1) transcripts and official documents demonstrating students performance in University classes, 2) materials developed in University classes which demonstrate proficiency on specific education standards. 3) recommendations and evaluations from teachers, 4) materials used in field experience and videos of teaching, and 5) personal reflections and summaries about progress. Specific portfolio requirements and manner of evaluation are included in the appendices to the *Teacher Education Handbook.* All portfolios will be submitted in electronic format (website).

7. Successful completion of all required early field experience hours and cooperating teacher evaluations. Hours must include work at the appropriate levels and in a variety of diverse high need settings.
8. Completion of any support plans.
9. Submission of current satisfactory background check from the Colorado Bureau of Investigation.

Applications must be submitted a semester in advance; the deadline for the application is the same as the deadline for the Graduation Planning Sheet.

Student teaching requires full time effort; therefore students may not enroll in University courses other than Student Teaching and Capstone Seminar.

Teacher Licensure

At completion of student teaching, the University Supervisor will recommend the student teacher for licensure. This recommendation is required for the institutional recommendation for successful program completion and recommendation to the Colorado Department of Education for a teaching license. Recommendation for licensure is not required for completion of the education minor.

Specific Requirements for the Elementary Teaching Endorsement

CSU-Pueblo requires the student interested in Elementary Education to complete a Liberal Studies major in addition to the courses in Education listed below.

Courses	Titles	Credits
ED 202	Foundations of Education	3
	PREREQUISITES- None	
ED 280	Educational Media and Technology	3
	PREREQUISITES- None	
ED 301	Frameworks of Teaching	4
	(Admission to Education is completed in this course)	
	PREREQUISITES- Completion of 45 college hours and a cumulative GPA of 2.6	
ED 380	Integrated Methods in Elem. School	3
	PREREQUISITES- Admission to Education; GPA of 2.6	
RDG 410	Teaching Reading	3
	PREREQUISITES- Admission to Education; GPA of 2.6	
RDG 411	Teaching Elementary Language Arts	2
	PREREQUISITES- Admission to Education; GPA of 2.6	

Courses	Titles	Credits
ED 412	Teaching Diverse Learners	3
	PREREQUISITES- Admission to Education; GPA of 2.6	
ED 413	Teaching Elementary Social Studies	2
	PREREQUISITES-Admission to Education; GPA of 2.6	
ED 414	Teaching Elementary Science & Health	2
	PREREQUISITES-Admission to Education; GPA of 2.6	
ED 417	Teaching Mathematics in Elementary School	2
	PREREQUISITES- Admission to Education: GPA of 2.6; Completion of MATH 361	
ED 485	Capstone Seminar in Education	1
	PREREQUISITES-Admission to Student Teaching. Must be taken with student teaching	
ED 487	Student Teaching Elementary	12
	PREREQUISITES- Admission to Student Teaching	

_____
TOTAL 40

Specific Requirements for the Secondary and K-12 Teaching Endorsements

The student must complete an appropriate major and the following Education courses:

Courses	Titles	Credits
One of the following PSYCH courses:		3
PSYCH 151	Human Development	
	PREREQUISITES-None	
	OR	
PSYCH 251	Childhood and Adolescence	
	PREREQUISITES-PSYCH 100	
	(Music students may take PSYCH 151 or PSYCH 251)	
	OR	
PSYCH 342	Educational Psychology	
	PREREQUISITES-PSYCH 100 or 151	
ED 202	Foundations of Education	3
	PREREQUISITES-None	
ED 280	Educational Media and Technology	3
	PREREQUISITES-None	
	(Music Education students may complete MUS 103 and 306 for ED 280)	

ED 301 Frameworks of Teaching.............................4
(Admission to Education is
completed in this course)
PREREQUISITES-Completion of 45
college hours and a cumulative GPA
of 2.6

RDG 435 Content Area Literacy***...............................4
PREREQUISITES-Admission to
Education; GPA of 2.6

Special Methods in Endorsement Areas 4
PREREQUISITES-Admission to
Education; GPA of 2.6

ED 412 Teaching Diverse Learners*** 3
PREREQUISITES-Admission to
Education: GPA of 2.6

ED 485 Capstone Seminar in Education.................1
PREREQUISITES-Admission to
Student Teaching. Must be taken
with student teaching.

ED 488/489 Secondary Student Teaching/
Student Teaching K-12 12
PREREQUISITES-Admission to
Student Teaching

TOTAL   37-40

* English/Language Arts students must also complete RDG 410.

** Physical Education students may complete EXHP 465 (Adaptive Physical Education) or ED 412.

Performance Assessment Activities

In the Teacher Education Program, performance assessment is a process that documents the relationship between the stated mission, goals, program standards, and actual student outcomes. Assessment is multidimensional and comprehensive, utilizing a variety of quantitative and qualitative measures.

- Assessment of student progress is frequent and ongoing throughout the program. At three points in the student's program, faculty completes a multidimensional assessment of progress on teacher education program standards: at admission to education, admission to student teaching and during student teaching. These assessments include a review of progress in all courses, evaluation of student performance through a student-constructed portfolio, and review of K-12 teachers' evaluation of student performance in field experiences.

- Evaluation of progress occurs at the end of each semester after admission to education through a review of student performance in University classes and field experiences.

- Student records are maintained in the Teacher Education Office.

LIBERAL STUDIES PROGRAM
(Major for Elementary Education)

Coordinator: Jeff Piquette

The Liberal Studies major, which leads to a B.S. degree, is intended to provide a strong liberal arts education for future elementary education teachers. Core requirements build upon students' experiences in General Education to provide both breadth and depth in the arts and humanities, English, math, sciences, and social sciences. Required courses provide support in each area of the Colorado *Content Standards.* Students are required to select an area of concentration or emphasis for an additional 15 hours of study. Areas of concentration may be chosen from Art, English, Health, Language and Linguistics, Math, Modern Foreign Languages, Music, Science, and Social Studies.

This degree is approved for students in Elementary Education. Students completing the Liberal Studies major are **required** to minor in Education.

Program Goals

At CSU-Pueblo, teacher education is a campus wide responsibility, and overall program goals reflect components of both the Liberal Studies major and Education minor. It is the purpose of the Liberal Studies major to assure that students will develop breadth and depth of knowledge of the liberal arts, and it is the responsibility of the Education minor to assure students become proficient at transforming this knowledge into curriculum and instruction for young children.

Expected Student Learning Outcomes

It is the joint responsibility of both the major and minor to prepare future teachers to evaluate information critically, to study and research independently, and to communicate knowledge effectively. The following four program goals have been established for the Liberal Studies Degree. Goal 1 is largely the responsibility of the Liberal Studies major and Goal 4 the responsibility of the Elementary Education minor; benchmarks for Goals 2 and 3 have been designed across the entire degree program.

1. Acquisition of Knowledge. Graduates are broadly educated in the liberal arts and sciences:

- Understanding the significant ideas, concepts, structures and values within disciplines, including theoretical, ethical, and practical implications.
- Mastering content knowledge in all areas taught in elementary schools: the arts, math literature and language, social sciences, sciences, and human development and learning.
- Balancing a breadth of knowledge in the liberal arts and sciences with depth of knowledge within a discipline.

2. Construction of Knowledge. Graduates demonstrate habits of thinking, including analytical skills, independent thinking, reasoned judgment, mature values, and imagination:

- Utilizing the tools of inquiry of the humanities, arts, mathematics, and behavioral, social, and natural sciences to understand and evaluate ideas.
- Developing habits of critical intellectual inquiry, including self-direction and self-reflection.
- Making connections from different intellectual perspectives and multiple viewpoints to form cross-disciplinary connections.
- Utilizing research skills of the liberal arts and sciences, including library and data retrieval skills, to study and evaluate information.

3. Communication of Knowledge. Graduates communicate effectively:

- Writing clearly in a variety of academic and practical formats.
- Speaking effectively in a variety of settings.
- Utilizing technology as a tool to inform and communicate.

4. Application of Knowledge. Graduates create standards-based learning experiences that make knowledge accessible, exciting, and meaningful for all students:

- Using multiple representations and explanations of disciplinary concepts that capture key ideas and link them to students' prior understandings.
- Using different viewpoints, theories, "ways of knowing,' and methods of inquiry in teaching of subject matter content.
- Evaluating curriculum for their comprehensiveness, accuracy, and usefulness for representing particular ideas and concepts.
- Engaging students in generating knowledge and testing hypotheses according to the methods of inquiry and standards of evidence used in the discipline

- Developing and using curricula that encourage students to see and interpret ideas from diverse perspectives.
- Creating interdisciplinary learning experiences that allow inquiry from several subject areas.

Outcomes Assessment Activities

The knowledge and skills of students in the Liberal Studies major are assessed at three points in their program: admission to education, admission to student teaching, and during the student teaching semester (program completion). Assessment activities include the faculty's review of 1) performance documented in students' eportfolios; 2) scores on standardized tests of general education and content knowledge; 3) ratings of proficiency on program standards by K-12 classroom teachers, University faculty, and student teacher supervisors based on direct observation of teaching; 4) self-evaluations/ ratings of proficiency on program standards by program completers and graduates one year after teaching; and 5) ratings of proficiency by K-12 supervisors after graduates have taught for one year. Standardized tests completed by students in Liberal Studies include the Educational Testing Service's (ETS) *Proficiency Profile* and either the *Praxis II Elementary Content Knowledge Test* (produced by ETS) or the *PLACE Elementary Education* exam (produced by Pearson NES).

Program Design

The program is planned as a coherent whole, with four components:

1. **General Education**

   Specific **General Education** courses form the foundation of knowledge for all students with this major. These courses fulfill CSU-Pueblo graduation requirements and are essential to meet many of the content standards for elementary teachers. Courses in the arts and humanities, English, math, history, sciences, and social sciences contribute to the General Education core.

2. **Liberal Studies Core**

   Liberal Studies Core requirements build upon students' experiences in General Education to provide both breadth and depth to the program to meet program goals. Emphasis is placed on each area relative to K-6 content standards to assure depth of knowledge in the humanities, social sciences, math, and sciences.

3. **Liberal Studies Area of Emphasis in a Specific Discipline**

   Students are required to select an area of concentration or emphasis and, in consultation with

an adviser, develop a plan for study for an additional 15 hours in Liberal Studies. The plan should include goals to be achieved by the concentration and the sequence of courses to achieve the goals. Areas of concentration may be chosen from Art, English, Health, Language and Linguistics, Math, Modern Foreign Languages, Music, Science, and Social Studies. Elementary Education has special requirements for admission and retention. Please refer to the section in the catalog for this information.

4. **Education Minor**

All students must complete a minor in Education. The Education minor, which has been developed to coordinate with the major, requires completion of 40 credit hours. Please refer to *Teacher Education Program* section/*Specific Requirements for the Elementary Teaching Endorsement*. Education has special requirements for admission and retention. Please refer to *Teacher Education Program* section/*Selective Entry and Retention in Teacher Education Admission.*

Program Assessment

Assessment will be ongoing, with evaluations at three check points (admission to education, admission to student teaching, and program completion), as well as follow-up assessments at the end of one year after program completion. Student outcomes will be evaluated through, a) formal assessments at the sophomore (*e.g.,* Proficiency Profile) and senior level (PRAXIS or PLACE Elementary Education Content Exam), b) faculty recommendations of student progress, c) portfolio assessment, and d) assessment of the application of knowledge in students' field experiences and student teaching. The contents of the electronic portfolio required of all students will include representative work from courses, as well as student-directed evaluations of progress.

Requirements for the Liberal Studies Major

Requirements for admission and retention in teacher education are included in the description of the *Teacher Education Program* in this catalog and in the <u>Teacher Education Handbook</u>.

Students must receive a grade of C or greater in <u>all</u> courses listed as requirements; a minimum cumulative GPA of 2.500 in courses completed in the major at CSU-Pueblo is required for admission to student teaching.

GENERAL EDUCATION REQUIREMENTS

General Education Skill Requirements

Courses		Titles	Credits
ENG	101	Composition I	3
ENG	102	Composition II	3

One of the following:

MATH	109	Mathematical Explorations	3
MATH	156	Introduction to Statistics	3
MATH	121	College Algebra	4
MATH	126	Calculus & Analytic Geometry I	5

General Education Knowledge Requirements

Courses		Titles	Credits
BIOL	100	Principles of Biology	3
BIOL	100L	Principles of Biology Lab	1
COMR	103	Speaking and Listening	3
ENG	130	Introduction to Literature	3
GEOG	103	World Regional Geography	3
GEOL	101	Earth Science	3
GEOL	101L	Earth Science Lab	1

One of the Following: 3
PSYCH	151	Human Development	3
PSYCH	251	Childhood and Adolescence	3

One of the following: 3
ART	100	Visual Dynamics	3
MUS	118	Music Appreciation	3

One of the following: 3
HIST	101	World Civilization to 1100	3
HIST	102	World Civilization from 1100 to 1800	3
HIST	103	World Civilization since 1800	3

Students are not allowed to count the same courses completed for general education requirements as course requirements in the Liberal Studies major, including those in concentrations.

Total General Education Required 35

LIBERAL STUDIES CORE REQUIREMENTS

Courses		Titles	Credits
ENGLISH (5 hours)			
ED	351	Children's Literature	2
ENG	303	Advanced Composition	3

HISTORY (3 hours)
One of the following: 3
HIST	201	U.S. History I	3
HIST	202	U.S. History II	3

FINE ARTS (3 hours)
One of the following (not completed for
General Education): 3
ART   100   Visual Dynamics 3
MUS   118   Music Appreciation 3
TH   111   Theatre Appreciation 3

MATH (9 hours)
MATH   360   Elem. Concepts of Mathematics I 3
MATH   361   Elem. Concepts of Mathematics II 3
MATH   362   Problem Solving for Elementary
                  Teachers..3

MULTICULTURAL STUDIES (3 hours)
CS   420   Voices of Protest....................................3
(Other approved multicultural courses may be added)

SCIENCE (4 hours)
PHYS   150/
CHEM   150   Elementary Concepts in Physics
                  and Chemistry 4

SOCIAL SCIENCE (3 hours)
POLSC 101   American National Politics 3

Total Core Requirements..30

REQUIRED CONCENTRATION IN DISCIPLINE AREA (15 HOURS)

Students are required to select <u>one</u> of the following
concentration areas of 15 hours. All students should meet
with an adviser and develop the goals to be achieved by
completion of the concentration and the sequence of
courses to achieve the goals.

ART
ART   211   History of Art I.......................................3
ART   212   History of Art II......................................3
Studio Art Course...3
Art courses numbered 300 or above 6

ENGLISH
ENG   201   Introduction to Literary Study................3
12 hours, 6 hours of which must be in courses
numbered 300 or above 12

HEALTH
EXHP   162/L   Personal Health/Lab 4
EXHP   201   Drugs & Healthy Lifestyles...................3
AT   232   First Aid 2
EXHP   382   Lifestyle Disease Risk Reduction..........3
One of the following courses in Health.............................3
BIOL   112   Nutrition 3
EXHP   336   Community Health 3
EXHP   485   Methods in Health Promotion 3
EXHP   487   Health Promotion Program
                  Planning/Evaluation......................4

LANGUAGE AND LINGUISTICS
COMR   260   Language Acquisition and Linguistics...3
ENG   251   Traditional Grammar Theory.................3
                  OR
ENG   352   English Syntax and Usage
ENG   353   Language in the USA 3
Electives in Language/Linguistics 6

MATH
MATH   126   Calculus & Analytic Geometry I 5
MATH   207   Matrix and Vector Algebra 2
MATH   224   Calculus and Analytic Geometry II........5
MATH   330   Introduction to Higher Geometry...........3

MODERN FOREIGN LANGUAGE
All students will be required to complete a Placement Test
to determine the level at which they will begin a language.
Fifteen hours in the language will be planned with a
language faculty adviser.

<u>FRENCH</u>
FRN   courses 15

<u>ITALIAN</u>
ITL   courses 15

<u>SPANISH</u>
SPN   courses 15

MUSIC
MUS   100   Music Fundamentals I: Notation 2
MUS   105   Music Fundamentals II: Foundations....2
MUS   118   Music Appreciation
                  (If taken as core course, 3 elective
                  hours may be taken.)..........................3
MUS   127   Functional Piano Class.........................1
MUS   160-179 Applied Lesson 2
VARIES   Music Ensemble 2
MUS   101   Music Performance Symposium I.........0
MUS   Electives 3

SCIENCE
One Biology, One Chemistry, and One Physics Course
and Labs; examples include:

BIOL   121/L   Environmental Conservation/Lab..........4
BIOL   181/L   College Biology I/Organismal Bio/Lab ..4
BIOL   206/L   Intro to Microbiology /Lab 4
CHEM   101/L   Chemistry and Society/Lab...................4
CHEM   111/L   Principles of Chemistry/Lab 4
CHEM   121/L   General Chemistry I/Lab......................5
PHYS   110/L   Astronomy/Lab 4
PHYS   140/L   Light, Energy, and the Atom/Lab 4
PHYS   201/L   Principles of Physics I/Lab...................4
PHYS   221/L   General Physics I/Lab 5

One additional course in Earth Science or Space
Science (GEOL 114 or PHYS 110) 3

SOCIAL STUDIES

HIST 201/or
HIST 202 U.S. History I/II (whichever class
not completed in core) 3
ECON 201 Principles of Macroeconomics 3
Upper division courses in History, Chicano Studies, or
Political Science 9

Required Concentration in Discipline Area 15
(See concentrations listed above)

Elementary Education Requirements..........................40

PROGRAM REQUIREMENT TOTAL 120

READING PROGRAM

READING MINOR

The reading minor is intended for elementary, secondary, or K-12 teacher certification candidates who wish to have a recognized area of strength in the teaching of reading and other language arts.

Expected Student Outcomes

As a result of successfully completing the reading minor, the student must be able to:

- Recognize, describe, diagnose, and teach all the generally accepted concepts, strategies and skills in the areas of oral language, reading readiness, emergent literacy, word recognition, comprehension, interpretation, literary appreciation, reading for information, critical reading and thinking, reference skills, study skills, oral reading, listening, speaking, English language usage, syntax, grammar, punctuation, capitalization, creative and informative writing, spelling and penmanship;
- Describe the role and importance of the child's self-concept, experience and culture, home language and dialect, stages of growth and development, and success and familiarity with literature as factors in motivating growth in reading and the language arts;
- Plan lessons and teach effectively using a variety of grouping techniques, including whole class, individual, ability, and cooperative;
- Locate and use a variety of materials to teach reading and the other language arts. The materials include textbooks, basal readers, trade and library books, teacher-made materials, computer programs, student-generated texts, centers, newspapers, and children's literature;
- Diagnose student reading levels and specific strengths and weaknesses, organize instruction to provide for the needs of the class and individual special students, adapt instruction in content areas to

promote content learning, and develop reading and writing growth for all students;
- Recognize common causes of reading and writing difficulties and administer and interpret the scores of a variety of informal assessment techniques such as reading miscue inventories and norm-referenced standardized tests;
- Assess writing samples for diagnosis and prescription in expression, organization, fluency, sentence and paragraph development, theme, spelling, penmanship and fluency in work processing; and
- Explain the need to collaborate with parents, librarians, drama and other teachers to provide an effective language arts program.

Outcomes Assessment Activities

Assessment activities conducted for the Reading minor include the following: a review of 1) scores on standardized tests of content knowledge related to literacy; 2) ratings of proficiency on program based on performance documented for standards in Goal 2 of students' eportfolios; and 3) self-evaluations/ratings of proficiency on program outcomes by program completers and graduates one year after teaching.

Specific Requirements

Students must complete the reading core with a GPA of 3.00 or better and complete the reading electives with a cumulative GPA of 2.60 or better. RDG 301 or 425 are prerequisites for other reading courses. The minor requires completion of a minimum of 21 hours, 14 from core courses and 7 hours chosen from available electives with consultation with an education adviser. Many electives are available only in summer sessions.

Core Course Requirements

Courses	Titles	Credits
ED 351	Children's Literature	2
	OR	
ENG 412	Young Adult Literature	3
RDG 410	Teaching Reading	3
RDG 411	Teaching Elementary Language Arts	2
RDG 435	Content Area Literacy	4
RDG 450	Diagnosis and Remediation of Reading Problems	3

CORE TOTAL 14

Seven credits of electives from the following list: 7

Courses	Titles	Credits
BBE 420	Literacy for EL Learners	3
ED 429	Literacy & Technology	3
RDG 310	Current Approaches to Reading and Writing Instruction	3

RDG 360 Practicum 1-3
RDG 431 Developing Creative Centers 1
RDG 436 New Directions in Reading
Comprehension.................................... 2
RDG 437 Newspapers as a Teaching
Resource... 1
RDG 442 Reading Across Cultures 2
RDG 491 Special Topics in Reading................. 1-2

Core Total	14
Electives Required	7
Total Required	21

Higher Education Act (HEA) Reporting Requirements

In October 1998, Congress enacted Title II of the Higher Education Act (HEA), requiring new reporting requirements for institutions and states on teacher preparation and licensing. Section 207 of Title II requires the annual preparation and submission of a report by each university that prepares teachers on how well individuals who complete its teacher preparation program perform on initial state licensing and certification assessments in their areas of specialization. Universities are also required to publish information on basic aspects of their programs, such as number of students, amount of required supervised practice teaching, and the student-faculty ratio in supervised practice teaching. Information on students who completed CSU-Pueblo's teacher education program during 2015-2016 can be found on the program's website: http://ceeps.csupueblo.edu/TEP/Pages/default.aspx

COLLEGE OF HUMANITIES AND SOCIAL SCIENCES

Dr. William Folkestad, Dean

Academic Departments/Programs

Art

Major: Art (BA, BFA)
        Emphasis Areas:
          Art Education K-12 (BA)
          Art History (BA)

Minor: Art

Chicano/a Studies Program

Minor: Chicano Studies

Certificate: Diversity Studies

English/Foreign Languages

Majors: English (BA)
        Emphasis Areas:
          Creative Writing
          Secondary Teaching Endorsement
       English (M.A.)
         (See *Graduate Programs* section of catalog)
       Foreign Language-Spanish (BA)

Minors: Communication & Rhetoric
       Creative Writing
       English
       French
       Italian
       Spanish

History/Political Science/Philosophy/Geography

Majors: History (BA, BS)
        Emphasis Area:
          History Secondary Education (BS)
       History (M.A.)
        (See *Graduate Programs* section of catalog)
       Political Science (BA, BS)
        Emphasis Area:
          Secondary Education

Minors: History
       Homeland Security
       Philosophy
       Political Science

Certificate: Homeland Security Studies

Mass Communication and Center for New Media

Major: Mass Communications (BA, BS)
        Emphasis Areas:
          Electronic Media
          Integrated Communication
          Journalism

Minor: Mass Communications

Military Science ROTC Program

Minor: Military Science

Music

Major: Music (BA)
        Emphasis Areas:
          Music Education K-12
          Music Performance

Minors: Music
       Composition and Music Theory
       Jazz Studies
       Music Technology
       Organ Performance Studies

Non-Profit Administration

Minor: Non-Profit Administration

Psychology

Major: Psychology (BA, BS)

Minor: Psychology

Social Work

Major: Social Work (BSW)

Sociology/Anthropology/Social Science

Majors: Sociology (BA, BS)
        Emphasis Area:
          Criminology
       Social Science (BA, BS)
       (Offered through Extended Studies only)

Minors: Anthropology
       Sociology
       Social Science (offered through Extended
          Studies only)

Women's Studies

Minor: Women's Studies

Mission

The mission of the College of Humanities and Social Sciences is to help students develop critical thinking skills, aesthetic awareness, and ethical perspectives, to provide them with the tools and expertise necessary to function as responsible citizens and professionals and to engage in intellectual and artistic pursuits. Faculty members are committed to high quality teaching, theoretical and applied research, scholarship, creativity, to effective service to the University, the profession, and the region, and to the innovative use of technology in these endeavors. The college strives to be a community of learners, teachers, and scholars responsive to the challenges of a diverse society, a vulnerable environment, and an increasingly technological and interdependent world.

Graduation Requirements

In addition to requirements for the major and general education, students must complete unless otherwise specified by departmental requirements either A) any minor degree program listed in the catalog other than their major; or B) 18 hours of credit outside their major (courses must have a different prefix than their major). Music and Social Work majors are exempt from this requirement. Students may not use the same credits to satisfy requirements for both the major and minor degrees. Students may not use credits taken to satisfy general education to count toward their required 18 hours.

The Anthony T. and Theresa H. Capps-Capozzolo Center for the Creative and Performing Arts

The Anthony T. and Theresa H. Capps-Capozzolo Center for the Creative and Performing Arts is an interdisciplinary academic unit within the College of Humanities and Social Sciences. In accordance with the intent of Anthony Capozzolo's generous gift to the University, the center's mission is to promote and enhance the visual arts, music, dance, and theater through academic programs, course offerings, scholarships, special events, and related activities that contribute to student learning and appreciation for the creative and performing arts at CSU-Pueblo.

ART DEPARTMENT

Department Chair: Contact Art Department

Faculty: Aviña, Dalton, R. Hansen, V. Hansen, Peters

The art curriculum is designed to aid and promote exploration of art-making processes and to increase the student's understanding of art and its relationship to society. The art major prepares the student to be a practicing artist, to enter graduate school for further professional education or to enter the job market in art-related careers. Students also may select art courses as a means of achieving a greater sense of personal creativity and accomplishment. Students, faculty, and invited professional artists display works in the CSU-Pueblo Art Gallery. An active visiting artist program provides contact with successful regional and national professionals.

The major in art leads to the degrees of Bachelor of Arts (BA) or Bachelor of Fine Arts (BFA). A minor in art is also available.

The department aims to provide art facilities, a creatively active faculty, and an engaging curriculum in a variety of emphasis areas. While at CSU-Pueblo, students mature as artists and integrate their knowledge in broad ways to fulfill their creative and professional lives.

General Program Requirements

- The art faculty firmly believes that a quality undergraduate art program must be built from the strong foundation of basic concepts and techniques provided by the required ART CORE courses. Art history, drawing and design combined with an introduction to the basic art processes, provide the necessary background of information and skills for individual artistic growth and maturity. A strong grounding in the fundamentals of art, as provided in the ART CORE, indicates the department's insistence upon respect for and commitment to the academic discipline of art as a professional career.
- Art majors must complete the required courses known as the ART CORE, before proceeding into the beginning courses.
- No grade lower than a C will count toward either an art major or minor.
- BFA candidates must maintain a 3.0 in the art major.
- Students are required to take 30 hours of major courses in residency.

Core Requirements for the Art Major

Art Core Courses

ART Courses	Titles	Credits
ART 110	Art Career Orientation (fall)	1
ART 115	Two-Dimensional Design	3
ART 116	Three-Dimensional Design	3
ART 141	Drawing I	3
ART 211	History of Art I (fall)	3
ART 212	History of Art II (spring)	3
ART 242	Drawing II	3
	TOTAL	19

Specific Requirements for the BA Degree Art Major

ART Courses	Titles	Credits
Required Art Core		19
ART 234	Painting I	
	OR	
ART 270	Printmaking I	3
ART 247	Ceramics I	
	OR	
ART 233	Sculpture I	3
ART 281	Intro to Graphic Design I	
	OR	
ART 274	Digital Art I	3
ART 310	Portfolio Review	1
ART 411	Twentieth-Century Art	3
ART 410	Senior Career Orientation	1
	(last spring semester)	

TOTAL 33

PLUS
Emphasis Upper Division Area.......................12
ART Upper Division Electives
       (selected with an art adviser)...............5

TOTAL 50

Specific Requirements for the BA Degree Art History Emphasis

ART Courses	Titles	Credits
Required Art Core		19

Studio Explorations 7
(Select courses for a total of 7 semester hours
  from the following list:)

ART 234	Painting I	3
	OR	
ART 270	Printmaking I	3
ART 247	Ceramics I	3
	OR	
ART 233	Sculpture I	3
ART 281	Intro to Graphic Design I	3
	OR	
ART 274	Digital Art I	3
ART 291/491	Special Topics	1
	(selected studio/visiting artists)	

Art History
(Select courses for a total of 19 semester hours
  from the following list:)...................................19

ART 311	Ancient Art	3
ART 312	Medieval Art	3
ART 313	Renaissance Art	3
ART 314	Baroque and Rococo Art	3
ART 315	Nineteenth-Century Art	3

ART 411	Twentieth-Century Art	3
ART 412	Contemporary Art	3
ART 491	Special Topics	1-3
	(selected topics in Art History)	
ART 310	Portfolio Review	1

Three credits from the following Non-Western Art
History courses: 3

ART 413	Native American Art	3
ART 414	Asian Art	3
ART 415	Latin American Art	3
ART 410	Senior Career Orientation	1
	(last spring semester)	

TOTAL 50

Specific Requirements for BA Degree Art Education K-12 Emphasis

ART Courses	Titles	Credits
Required Art Core		19
ART 234	Painting I	3
ART 247	Ceramics I	3
ART 270	Printmaking I	3
ART 276	Photography	3
ART 281	Intro to Graphic Design I	3
ART XXX	Upper Division Art History Course	3
ART 310	Portfolio Review	1
ART 410	Senior Career Orientation	1
	(last spring semester before student teaching)	
ART Upper Division Electives		
	(selected with an art adviser)	12

TOTAL 51

There are additional licensure requirements; consult the Teacher Education Program for details.

Specific Requirements for the BFA Degree Art Major

ART Courses	Titles	Credits
Required Art Core		19

Studio Explorations 9
(Select 3 courses for a total of 9 semester hours
  from the following list:)

ART 233	Sculpture I	3
ART 234	Painting I	3
ART 247	Ceramics I	3
ART 270	Printmaking I	3
ART 274	Digital Art I	3
ART 276	Photography	3

ART 281 Intro to Graphic Design I................3
ART 291 Special Topics 3

Professional Development
ART 310 Portfolio Review....................................1
ART 410 Senior Career Orientation.....................1
           (last spring semester)

Art History
ART 411 Twentieth-Century Art...........................3
ART XXX Upper Division Art History.....................3

PLUS
ART Upper Division Electives 15
ART Upper Division Studio Emphasis Area 15

                                        TOTAL 66

Specific Requirements for the Art Minor

ART Courses	Titles	Credits
ART 115 or 116	Two or Three-Dimensional Design......3
ART 141 or 242	Drawing I or II 3
ART 211 or 212	History of Art I or II.............................3
ART Electives (approved by minor adviser) 12

                                        TOTAL 21

Co-curricular requirements

The faculty supports and encourages the involvement of art majors and minors in the Art Club and related activities specific to each studio.

Department of Art Student Learning Outcomes and Assessment Activities

1) Students will apply discipline-specific competencies for success in their emphasis area.
   - Outcome Assessment Activity: ART 410 with exit survey
2) Students will distinguish the role of art in a global society.
   - Outcome Assessment Activity: Senior portfolio with exit survey and art history rubric to measure quality of written expression
3) Students will employ creative skills associated with interdisciplinary learning.
   - Outcome Assessment Activity: ART 410 with exit survey
4) Students will make use of intellectual and practical skills for lifelong learning.
   - Outcome Assessment Activity: Internships with employee surveys
5) Students will create original work suitable for entry into a juried exhibition.
   - Outcome Assessment Activity: Annual juried art show and any non-juried student on-campus shows

6) Art education students will be able to apply the knowledge and skills needed to help children learn to create and appreciate art.
   - Outcome Assessment Activity: PLACE test in addition to other BA measurements

CHICANO/A STUDIES PROGRAM

The Chicano/a studies minor complements majors and careers in law, sociology, social work, languages, education, government, business and other disciplines. Courses offer unique undergraduate preparation for those who seek entrance to graduate studies in law, humanities or the social sciences.

Students who plan to live and work in the American Southwest or aspire to careers that involve relations in the American continents are likely to be well served by Chicano/a Studies courses. The interdisciplinary approach emphasizes history and cultural studies, and selected courses provide the student with in-depth knowledge of specific aspects of the Chicano/a community.

Program Goals

- To provide individual courses as well as a minor to fulfill the unique role and mission of Colorado State University-Pueblo.
- To offer an individually designed minor in support of students' majors.

Student Learning Outcomes

Students will be able to:

- Critically examine the social, historical, and cultural relevance of Chicanos within the United States and the US/Mexico borderlands.
- Analyze the complexities of Chicano identity.
- Evaluate the contributions of women within Chicano history.
- Examine and interpret how Chicanos have impacted the culture, politics, and history of Southern Colorado.

Student learning outcomes will be included in the academic catalog, the website, and the syllabus for the capstone course.

General Requirements

- Students must earn a C or better in all courses applicable to the minor.

Specific Requirements for the Chicano/a Studies Minor

Twenty-four hours: 15 required 9 elective. The following five courses are required:

CS Courses		Titles	Credits
CS	101	Introduction to Chicano Studies	3
CS	136	The Southwest United States	3
CS	306	La Chicana	3
CS	346	History of Mexico	3
CS	485	Capstone	3
Electives			9
		TOTAL	24

Electives may be selected from Chicano/a Studies courses, several of which are cross-listed with other departments, or by approval of the Chicano/a studies coordinator, from courses in such areas as Spanish, history, psychology, sociology, and social work, among others.

CS Courses		Titles	Credits
CS/ENG	220	Survey of Chicano Literature	3
CS/SW	230	Chicano: Social and Psych Study	3
CS	235	Ballet Folklorico	3
CS	291	Special Topics	1-3
CS	303	Chicano Labor History in the U.S.	3
CS/SW	325	Health in the Chicano Community	3
CS/WS	341	Chicana Writers	3
CS	420	Voices of Protest	3
CS/WS	401	Third World Feminism	3
CS/HIST	489	Borderlands	3
CS	491	Special Topics	1-3
CS	495	Independent Study	1-3
CS	498	Internship	1-3

Outcomes Assessment Activities

- An annual review of student's capstone projects is conducted to evaluate the programs goals and student learning outcomes.
- The program is developing a means of measuring student's progress in core courses.

Performance Criteria

Upon completion of the minor students are to submit a copy of their capstone project to the coordinator and two individuals chosen by the dean to review their capstone project to see if it fits the goals and SLOs of the program. A total of 80% of the students should have met the outcomes and goals of the program. Papers will be assessed every spring.

DIVERSITY STUDIES CERTIFICATE PROGRAM

The Diversity Studies Certificate Program is a 15-credit hour certificate program housed in the College of Humanities and Social Science (CHASS) under the directorship of the Chicano Studies and/or Women's Studies Coordinator. This certificate allows student to prepare for the cultural and social diversity of the world in which they will live and work.

Students will also learn the process and value of social justice, equality, cultural awareness, and the history of exclusion and inclusion while implementing the proper frameworks for behaving toward others in regards to race, ethnicity, class, gender, etc.

Upon completion of this certificate, students will have developed application based training alongside theoretical awareness, and practical knowledge to thrive in diverse environments. They will be better prepared to address their respective community's needs, and to assume leadership roles in their field of specialization with consideration to issues revolving around diversity and cultural awareness.

The University does not transcript certificates, so records of the Diversity Studies Certificate Program and the issuance of the certificate are administered by the director of the Chicano Studies and/or Women's Studies Coordinator.

Student Learning Outcomes

- Illustrate the diverse approaches to and complexities of multiculturalism.
- Identify the ways in which minorities have shaped the culture, politics, and history of the United States.
- Demonstrate a critical understanding of ethnic, racial, gender, and class intersections from local, national, and global perspectives.
- Apply the basic concepts, theories and methods in gender, ethnic, and multicultural studies in local, national, and global contexts.

Outcomes Assessment Activities

- An annual review of student's capstone projects is conducted to evaluate the programs goals and student learning outcomes.

Requirements for Admission to the Program

Enrolled students at CSU-Pueblo may apply to enter the certificate program at any point up to their third year, and complete it during their remaining time at CSU-Pueblo.

Non-degree students could also apply for the program after passing one of the required admission courses (see below) and other lower division courses that would adequately prepare them for upper-division coursework.

Specific Requirements for the Diversity Studies Certificate

Students are required to complete 15 credits for the certificate program. Up to 3 credits could be counted dually. Students would choose courses under the direction of an adviser.

Students will be required to take at least **one** of the following courses before they begin the certificate program:..3

CS	101	Introduction to Chicano Studies	3
SOC	155	Minority and Ethnic Relations	3
SOCSC	209	African American Studies	3
WS	100	Introduction to Women's Studies	3

One course in Understanding Human Diversity ....3 (select from the following)

ENG/COMR/WS

	335	Gender and Communication	3
ENG	345	Intercultural Communication	3
WS	301	Theories of Gender and Culture	3

One Comparative course: (select from the following)........3

CS/WS	401	Third World Feminisms	3
CS	420	Voices of Protest	3
CS/HIST	489	Borderlands	3
HIST/SOC/WS			
	428	Women & Work	3
WS/SOC	453	The Sociology of the Body	3
WS/SOC	455	Hate Crimes	3

One elective course (3 credits) chosen from the Academic Catalog in consultation with the certificate coordinator/adviser: 3

DS	485	Capstone	3

TOTAL   15

ENGLISH/FOREIGN LANGUAGES DEPARTMENT

Department Chair: Cynthia Taylor

Faculty: Arnegard, Cobián-Klein, Eskew, Furrh, Montoya, Morales, Picicci, Ribadeneira, T. Taylor

ENGLISH PROGRAM

The major in English leads to a Bachelor of Arts (BA) degree and provides graduates with an understanding of language and literature as a basis for aesthetic, ethical, social, and academic ways of thinking, creating, and researching. The goal of the program is to develop general communication and learning skills and an understanding of the value of ongoing critical reading, thinking, and writing. Critical, analytical, and composition skills, which provide excellent preparation for professional careers in teaching, writing, editing and publishing, business, media, public service, law, and the arts are emphasized.

Student Learning Outcomes

Upon completion of the B.A. in English program, students will:

- Demonstrate knowledge of significant traditions, historical and cultural contexts, and current issues in literature and language studies.
- Conduct, analyze, evaluate, and integrate academic research.
- Apply strategies of critical theory.
- Analyze literature and synthesize ideas with clarity, accuracy, and coherence in speech and writing.
- Use a range of English syntactic structures effectively.
- Construct a convincing argument using a range of rhetorical strategies in speech and writing.

Students completing the B.A. in English program and a creative writing emphasis will also:

- Demonstrate a working vocabulary for critical analysis through theoretical venues as well as in-depth study of terminology and form within creative works to develop strong critiquing skills in the workshop environment.
- Produce writing competitive at a publishable level, which reflects an understanding of the creative writing genres, the business of writing, and the drafting and revision process for individual and collections of works.

Requirements for the English Major

- Specific requirements for the English major are listed below. Students should consult with an adviser in English before registration.
- Students must complete, with a grade of C or better, all courses counting toward the major or minors.
- Students must fulfill the University language requirements for the BA degree, first year foreign language (6-8 credit hours) OR English 106 (3 credit hours) and Foreign Language 100 (3 credit hours) OR ASL 101 and 102. For International students, English

101 and 102 fulfill the Foreign Language Requirement.

- For teaching endorsement requirements, see the Teacher Education Program section.

Requirements for the English Minor

ENG Courses	Titles	Credits
ENG 201	Introduction to Literary Study	3
ENG	Upper Division Electives	12
ENG	Other ENG Electives	minimum 5
	TOTAL	20

Minor requirements are 20 or more semester credit hours of course work in English numbered 106 or above, of which 12 must be upper division and one must be ENG 201. Courses must be chosen in consultation with an adviser in English. Students must complete with a grade of C or better all courses counting toward the major or minors

Co-curricular Requirements

The English faculty supports and encourages English majors' involvement in student organizations and participation in tutoring activities in the community and on campus.

Outcomes Assessment Activities

Assessment of the English program is the responsibility of all English Program faculty. The English Program's annual reports evaluating the program and proposing any needed changes are compiled from the following information:

- A central file of course syllabi with representative assignments is maintained by the department for inspection by the committee and other qualified persons.
- Faculty advisers monitor each student's progress toward completing major requirements listed in the catalog.
- All English majors take a senior-year seminar (English 493) emphasizing professional standards and synthesizing the writing and analytical skills students have acquired in other English classes. All students in English 493 write a senior research paper, one copy of which is submitted to the department chairperson for dissemination for review. In order to pass English 493, students must demonstrate satisfactory levels of achievement in meeting the program goals.
- English Program faculty review the papers from English 493 on an annual basis and prepare an analysis of what they reveal about the program's success.
- The English Program administers a student-satisfaction questionnaire to all senior English majors

each year. Similar questionnaires are sent to recent graduates and representative employers on a periodic basis.

- The English Program faculty consider the English curricula at leading comparable institutions and apprise the department of innovations worthy of consideration.

ENGLISH MAJOR

- Faculty advisers meet individually with each of their students on a regular basis to help plan schedules and discuss educational and career goals. Advisers maintain an accurate and up-to-date record of each student's progress towards completion of the requirements for the major.
- All English majors will participate in a senior-year seminar in which all of the writing and analytical skills acquired in other English classes will be synthesized. Students in the class will be expected to complete a senior research project.

Specific Requirements for the Bachelor of Arts in English

A total of 46 credits in English beyond 101 and 102 (FL 100 and ENG 106 may be counted, but not double counted for Foreign Language), distributed as follows:

ENG Courses	Titles	Credits
ENG 161	Careers for English Majors	1
	OR	
ENG 461	Careers for English Majors	1
ENG 201	Introduction to Literary Study	3
	(To be taken at or near the start of the program)	
ENG 493	Senior Seminar	3
	(To be taken at or near the end of the program)	

One of the following courses in Genres: 3

ENG	307	Poetry
ENG	308	Fiction
ENG	309	Drama
ENG	310	Advanced Literary Forms & Genres

At least **three** courses in Literature in Historical Perspective, chosen with the approval of the major adviser, two of which must comprise a sequence of American or British literature at the 200 level (i.e., ENG 210 and ENG 212 or ENG 221 and ENG 222 or ENG 231 and ENG 232), while the third must be at the 300 level or above. 9

At least **two** courses in Major Writers, at least one of which must be in Shakespeare 6

At least **one** course in Literary Theory 3

At least **one** course in Writing, beyond ENG 101 and 102.....3

At least **one** course in The English Language and Linguistics (FL 100 and ENG 106 may be counted, but not double counted for Foreign Language). 3

At least 12 credits of English electives, chosen with the approval of the major adviser (General Education and Foreign Language requirements may not be double counted). 12

TOTAL   46

Specific Requirements for the Bachelor of Arts in English with Creative Writing Emphasis

A total of **46** credits in English beyond 101 and 102 (FL 100 and ENG 106 may be counted, but not double counted for Foreign Language), distributed as follows:

ENG Courses		Titles	Credits
ENG	161	Careers for English Majors 1	
		OR	
ENG	461	Careers for English Majors 1	
ENG	201	Introduction to Literary Study................3	
ENG	114	Introduction to Creative Writing 3	
		(To be taken at or near the start of the program)	
ENG	414	Advanced Writing Workshop 3	
ENG	493	Senior Seminar.....................................3	
		(To be taken at or near the end of the program)	

One of the following courses in Genres: 3
ENG   307   Poetry
ENG   308   Fiction
ENG   309   Drama
ENG   310   Advanced Literary Forms & Genres

At least **three** courses in Literature in Historical Perspective, chosen with the approval of the major adviser, two of which must comprise a sequence of American or British literature at the 200 level (i.e., ENG 210 and ENG 212 or ENG 231 and ENG 232), while the third must be at the 300 level or above 9

At least **two** courses in Major Writers, at least one of which must be in Shakespeare 6

At least **one** course in Literary Theory 3

At least **one** course in The English Language and Linguistics (FL 100 and ENG 106 may be counted, but not double counted for Foreign Language) 3

Courses in Writing as follows:

Three of the following courses...9
ENG   315   Creative Writing: Poetry
ENG   316   Creative Writing: Fiction
ENG   317   Creative Nonfiction
ENG   318   Creating Writing: Drama

TOTAL   46

Specific Requirements for the Bachelor of Arts in English with Secondary Teaching Endorsement

A total of 45 credits in English beyond 101 and 102 (FL 100 and ENG 106 may be counted, but not double counted for Foreign Language), distributed as follows:

ENG Courses		Titles	Credits
ENG	161	Careers for English Majors 1	
		OR	
ENG	461	Careers for English Majors 1	
ENG	201	Introduction to Literary Study................3	
		(To be taken at or near the start of the program)	
ENG	493	Senior Seminar.....................................3	
		(To be taken at or near the end of the program)	

One of the following courses in Genres: 3
ENG   307   Poetry
ENG   308   Fiction
ENG   309   Drama
ENG   310   Advanced Literary Forms & Genres

At least **four** courses in Literature in Historical Perspective, chosen with the approval of the major adviser, two of which must be the American literature sequence at the 200 level (i.e., ENG 210 and ENG 212), one of which must be one 200 level course in the British literature sequence (either ENG 231 or ENG 232), while the fourth must be outside of American Literature at the 300 level or above.................12

Major Writers: Shakespeare..3

At least **one** course in Literary Theory 3

At least **two** courses in Writing, beyond ENG 101 and 102, one of which must be ENG 303.................................6

All of the following courses
ENG   352   English Syntax and Usage 3
ENG   412   Young Adult Literature.........................3
ENG   452   History of the English Language...........3

At least **3 credits** of English electives, chosen with the approval of the major adviser (General Education and Foreign Language requirements may not be double counted) 3

TOTAL   46

CREATIVE WRITING MINOR

The Creative Writing Minor is designed for students interested in pursuing an MFA in creative writing or students who wish to continue their creative activity after graduation. Since MFA degrees specialize in poetry, playwriting, creative nonfiction, or fiction, students will complete 21 credits of coursework concentrating on one genre while also establishing knowledge of the creative writing workshop, the drafting/revision process, and the business of writing.

Student Learning Outcomes

- Students will demonstrate a working vocabulary for critical analysis through theoretical venues as well as in-depth study of terminology and form within creative works to develop strong critiquing skills in the workshop environment.
- Students will produce writing competitive at a publishable level, which reflects an understanding of the creative writing genres, the business of writing, and the drafting and revision process for individual and collections of works.

Outcome Assessment Activities

The Coordinator of the Creative Writing minor reviews student portfolios to evaluate student performance levels in conjunction with Program Goals, tracks student placement in graduate programs, and records student and former student publications, reporting the result annually.

Specific Requirements for the Creative Writing Minor

Required Core Courses 9

ENG	114	Introduction to Creative Writing (To be taken at the start of the minor)
ENG	201	Introduction to Literary Study OR
ENG	310	Advanced Literary Forms & Genres
ENG	414	Advanced Writing Workshop (To be taken at the end of the minor)

One of the selected pairs 6

| ENG | 307 | Poetry |
| ENG | 315 | Creative Writing: Poetry |

| ENG | 308 | Fiction |
| ENG | 316 | Creative Writing: Fiction |

| ENG | 308 | Fiction |
| ENG | 317 | Creative Nonfiction |

| ENG | 309 | Drama |
| ENG | 318 | Creative Writing: Drama |

Electives (if not used above)..6

CS/ENG	220	Survey of Chicano Literature
ENG	240	Survey of Ethnic Literature
ENG/WS	241	Women in Literature
ENG	310	Advanced Literary Forms & Genres
ENG	315	Creative Writing: Poetry
ENG	316	Creative Writing: Fiction
ENG	317	Creative Nonfiction
ENG	318	Creative Writing: Drama
ENG	319	Professional Editing
ENG	325	Nature Writing in the West
ENG	326	Writing for the WEB
ENG	345	Intercultural Communication
ENG	352	English Syntax and Usage
ENG	385	Literacy Criticism and Theory
ENG	452	Novels into Film 1740-Present
ENG	491	Special Topics (with adviser's approval)
CS/WS	341	Chicana Writers
MCCNM	233	Script Writing

TOTAL   21

FOREIGN LANGUAGES PROGRAM

Associate Department Chair: Alegria Ribadeneira

The Foreign Languages Program offers a Bachelor of Arts in Spanish (BA) intended to prepare students for the many careers where educated bilingual speakers are highly valued, for admission to graduate school, and for public school teaching and certification.

Minors in French, Italian, and Spanish complement a wide variety of majors in other disciplines to enhance the students' ability to compete for jobs where knowledge of a foreign language is desirable.

Courses in German, Russian, and Comparative Linguistics (listed under FL) are offered as permitted by enrollment. Student exchanges with foreign universities and other study-abroad programs are encouraged.

Student Learning Outcomes for Spanish Majors

Spanish Majors will achieve a level of proficiency in Spanish communication skills (listening, speaking, reading, and writing) and in the understanding of Hispanic cultures sufficient to allow them to function effectively in careers in teaching, business, the media, government, the arts, etc.

These outcomes will be achieved by showing proficiency in the 5 C's:

1) **Communication:** The communication standard stresses the use of Spanish for communication in "real life" situations. It emphasizes "what students can do with language" rather than "what they know about language." Students are asked to communicate in oral and written form, to interpret oral and written messages, to show cultural understanding when they communicate, and to present oral and written information to various audiences for a variety of purposes.
2) **Cultures:** Cultural understanding is an important part of Spanish language education. Experiencing other cultures develops a better understanding and appreciation of the relationship between languages and other cultures, as well as the student's native culture. Students become better able to understand other people's points of view, ways of life, and contributions to the world.
3) **Connections:** Spanish-language instruction must be connected with other subject areas. Content from other subject areas is integrated with Spanish-language instruction through lessons or courses that are developed around themes common to other subject areas.
4) **Comparisons:** Students are encouraged to compare and contrast Spanish language and cultures with their own. They discover patterns, make predictions, and analyze similarities and differences across languages and cultures. Students often come to understand their native language and culture better through such comparisons.
5) **Communities:** Extending learning experiences from the Spanish-language classroom to the home and multilingual and multicultural community emphasizes living in a global society. Activities may include: field trips; use of e-mail and the Internet; participation in clubs, exchange or study-abroad programs, and cultural activities; school-to-work opportunities; and opportunities to hear speakers of Spanish at the University and in the classroom.

Student Learning Outcomes for Minors in Spanish, French and Italian

Students minoring in French, Italian, and Spanish will be required to demonstrate a level of proficiency sufficient to converse comfortably on everyday topics, to attain intermediate levels of proficiency in writing and reading the target language, and to understand and appreciate the target language cultures.

NOTE: Majors or minors who fail to complete a course with a grade of C or better are required to repeat the course with a satisfactory grade before proceeding to more advanced offerings.

Placement in the Spanish course sequence:

1. Students who have taken no Spanish in high school or at another institution of higher learning begin with SPN 101.
2. Students, who have taken Spanish in high school, but not at another institution of higher learning, must take a placement exam to determine their proper placement.
3. Heritage Spanish speakers (that is, students who speak Spanish at home to a greater or lesser extent), students with significant Spanish immersion experience, and students who have taken Spanish courses at other institutions of higher learning must meet with a Spanish adviser in order to determine correct placement. The adviser will place the student based on any of the following or a combination thereof: an oral interview, a placement exam, a written composition.

Specific Requirements for the Spanish Major

In addition to the courses listed below, Spanish majors must also meet the following requirements:

1. A senior assessment portfolio.
2. A minor or a second major.
3. Completion of the oral and written proficiency exams and of the graduating-senior survey.
4. At least one upper-division SPN course must emphasize Latin America, one Spain.

Study abroad is strongly encouraged, especially for students planning to teach.

SPN Courses	Titles	Credits
SPN 101	Beginning Spanish I	3
SPN 102	Beginning Spanish II	3
SPN 201	Intermediate Spanish I	3
SPN 202	Intermediate Spanish II	3
SPN 203	Intermediate Proficiency Building	3
SPN 301	Advanced Spanish Grammar	3
SPN 303	Spanish Phonetics and Phonology	3

Two of the following courses 6
SPN 312	Conv & Comp: Mexico & Central America
SPN 313	Conv & Comp: South America
SPN 314	Conv & Comp: Caribbean
SPN 315	Conv & Comp: Spain
SPN 316	Conv & Comp: U.S. Latino
SPN 331	Spanish in the Business World
SPN 391	Special Topics

And **all** of the following:
SPN 370 Introduction to Hispanic Literature............3

Three upper-level electives, of which at least two must be 400-level 9

TOTAL   39

General Education...35
Spanish Major 39
Minor, Second Major, or Teacher Ed..........................20-37
Electives...9-26

Total..120

Specific Requirements for the Spanish Minor

SPN Courses	Titles	Credits
SPN 101	Beginning Spanish I	3
SPN 102	Beginning Spanish II	3
SPN 201	Intermediate Spanish I	3
SPN 202	Intermediate Spanish II	3
SPN 203	Intermediate Proficiency Building	3
SPN 301	Advanced Spanish Grammar	3
SPN 303	Spanish Phonetics and Phonology	3
One other 300- or 400-level SPN course		3

TOTAL   24

Specific Requirements for the French Minor

FRN Courses	Titles	Credits
FRN 101	Beginning French I	3
FRN 102	Beginning French II	3
FRN 201	Intermediate French I	3
FRN 202	Intermediate French II	3
French Electives above 300*		9

* (in house or through study abroad program)

TOTAL   21

Specific Requirements for the Italian Minor

ITL Courses	Titles	Credits
ITL 101	Beginning Italian I	3
ITL 102	Beginning Italian II	3
ITL 201	Intermediate Italian I	3
ITL 202	Intermediate Italian II	3
Italian Electives above 300*		9

* (in house or through study abroad program)

TOTAL   21

Outcomes Assessment Activities

Assessment of the foreign languages program is the responsibility of the Foreign Languages Program Assessment Committee, consisting of the Associate Chair for Foreign Languages and three other faculty members. The committee's annual reports evaluating the program

and proposing any needed changes are compiled from the following information:

- A central file of course syllabi with representative assignments is maintained by the department for inspection by the committee and other qualified persons.
- Faculty advisers monitor each student's progress towards completing major requirements and meeting the program goals listed in the catalog. Advisers report any problems or deficiencies in the program encountered by the students to the program assessment committee through the associate chair.
- All Spanish majors produce a senior assessment portfolio emphasizing professional standards and sharpening the proficiency skills students have acquired in their Spanish courses. Students work in conjunction with an adviser to complete the project and submit it to the Program Assessment Committee for review.
- Oral and written exit exams evaluate proficiency in listening, speaking, reading, and writing as well as understanding of Hispanic culture.
- The Program Assessment Committee reviews the senior portfolios and the results of the exit exam on an annual basis and prepares an analysis of what is revealed about the program's success.
- The Program Assessment Committee administers a student-satisfaction questionnaire to all senior foreign languages majors and minors each year. A similar questionnaire is sent to recent graduates on a periodic basis.
- The Program Assessment Committee monitors the foreign languages curricula at leading comparable institutions and apprises the department of innovations worthy of consideration.

COMMUNICATION & RHETORIC MINOR

Program Coordinator: Yvonne Montoya

The Communication & Rhetoric minor at CSU-Pueblo is designed for students interested in developing effective written and verbal communication skills. It provides a course of study that emphasizes both a theoretical understanding and practical application of communication that prepares students technically, professionally, and personally to successfully navigate a variety of challenges.

The Communication & Rhetoric minor consists of 18 credits, comprised of required and elective courses. Six credits must be earned at the 300-400 level. Acceptance of transfer courses is contingent upon approval of the program director. No more than three credits of an independent study can count toward the minor. All students must complete the 18 credits with a grade of C or better in all required and elective courses.

Communication & Rhetoric Program Goals

1. To provide individual courses as well as an academic minor in Communication & Rhetoric that foster students' abilities to describe, analyze, critique, explore, create and produce ideas and content in various contexts.
2. To cultivate students' abilities to construct and respond to messages effectively utilizing various modes of communication.
3. To develop students' understanding of demographics and cultures and how these factors influence the communication context.
4. To prepare students to communicate in professional contexts as well as in more informal ones.
5. To train students to better communicate their academic, personal, and civic knowledge.

Expected Student Learning Outcomes

1. Adapt appropriately to a variety of communication contexts.
2. Develop and achieve communication goals.
3. Produce and deliver content and messaging appropriate for a variety of audiences, goals, contexts, and media.
4. Address conflict to facilitate collaboration, relationship development and maintenance, and to function well in organizations.
5. Engage and respond to information critically and in ways that respect different ideas and backgrounds.
6. Communicate academic, personal, and civic knowledge.

Specific Requirements for the Communication & Rhetoric Minor

Required Courses

Courses		Titles	Credits
COMR	103	Speaking and Listening	3
COMR/ENG			
	204	Introduction to Rhetoric	3
COMR	350	Communicating in Professions	3
COMR	493	Seminar	3

Any **two** of the following electives (six credits) 6

COMR	115	Forensics Activity I	3
COMR	212	Argumentation	3
COMR	221	Interpersonal Communication	3
COMR	260	Language Acquisition and Linguistics	3
COMR	291	Special Topics	3
COMR	295	Independent Study	3
ENG	304	Advanced Rhetorical Study	3
ENG	305	Technical and Scientific Report Writing	3
ENG	306	Visual Rhetoric	3

COMR	312	Persuasion	3
ENG	317	Creative Nonfiction	3
ENG	319	Professional Editing	3
ENG	326	Writing for the WEB	3
COMR/ENG/WS			
	335	Gender and Communication	3
ENG	345	Intercultural Communication	3
ENG	404	Writing in the Professions	3
ENG/MCCNM			
	440	Magazine Writing	3
ENG	445	Magazine Editing and Production	3
COMR	491	Special Topics	3
COMR	495	Independent Study	3

TOTAL   18

Select course offerings from MCCNM count as electives for this minor. Students cannot count courses being used for a major or minor requirement in ENG or MCCNM as both a required course and as an elective for COMR.

Note: Some outside electives not listed above, may be approved by the program director.

HISTORY/ POLITICAL SCIENCE/ PHILOSOPHY/GEOGRAPHY DEPARTMENT

Department Chair: Colette Carter

Faculty: Berardi, Carter, Gaughan, Harris, Johnson, Liebel, Montoya, O'Connor, Rees

The programs in history, political science, philosophy, and geography are intended to provide domains of study both for students who desire knowledge for personal enrichment and for students who desire to apply knowledge toward career objectives. Students who major or minor in the fields of the department should expect to develop and refine knowledge of other cultures and the historical and political development of the modern world. Students should also expect to engage in methodical research. Other expectations of students include the ability to prepare rationally cogent papers and the ability to understand political theories, historical movements, and the connections between each.

Departmental programs not only prepare students for occupations in government, business, education, and industry, but also are central to the University's traditional function of transmitting culture from generation to generation.

HISTORY PROGRAM

The major in history leads to the degree of Bachelor of Arts (BA) or Bachelor of Science (BS) and prepares students for careers in teaching, law, government, and private enterprise, as well as entry into graduate programs.

Program Goals

- To provide students with a general knowledge of history and historical methodology;
- To prepare students, through training in communication skills and in research methods, to gain knowledge of a given area of history;
- To prepare students to continue personal study and learning about specific subject areas in the discipline on an independent basis;
- To prepare students to engage in critical thinking; and
- To introduce students to the theoretical frameworks that serve as the foundation of historical scholarship.

Expected Student Outcomes for the History Program

On completion of the Bachelor's degree, history majors at CSU-Pueblo will:

- Demonstrate literacy–analytical reading and effective writing skills–in general, and for historical content;
- Demonstrate understanding of the history of historical writing, and demonstrate the ability to apply the principles and theories that support historical writing;
- Demonstrate knowledge of specific times and locations studied, and knowledge of the complexities of the past and the diversity of human cultures in those times and places;
- Apply the concepts of historical thinking, for example, in evaluating change over time; and
- Demonstrate skills in historical research, including historical analysis and interpretation.

General Requirements

- No grade below C is acceptable in the major or minor.
- Students are expected to complete HIST 300 before or in their third year of classes, and HIST 493 in their final year. Class size in HIST 300 and HIST 493 is limited. A grade of D+ or lower in HIST 300 or 493 will, after the third attempt in either course, result in the student being prevented from enrolling in the course again. The student may be eligible for reconsideration on a one-time basis, with approval by the student's adviser. If repeated registration, after the third attempt, is permitted, subsequent failure to achieve a grade of C will make the student ineligible for readmission to those courses.

- Students must take HIST 300 and HIST 493 in residence. No courses will be accepted in transfer to substitute for either of these courses.

Core Requirements for the History Major

HIST Courses		Titles	Credits
HIST	101	World Civilization to 1100	3
HIST	102	World Civilization 1100 to 1800	3
HIST	103	World Civilization since 1800	3
HIST	201	United States History I	3
HIST	202	United States History II	3
HIST	300	Historiography	3
HIST	493	Seminar	3

TOTAL 21

Requirements for the Bachelor of Arts Degree in History

Students must complete the "Core Requirements for the History Major" as outlined above, plus 15 hours of history electives of which at least 6 hours must be from non US history courses. A minimum of two semesters of college level foreign language is required for the BA degree in History; more is recommended. The BA degree in History is appropriate for students planning to attend graduate or law school.

Requirements for the Bachelor of Science Degree in History: General Emphasis

Students must complete the "Core Requirement for the History Major" outlined above, plus 21 hours of history electives of which at least 6 hours must be from non US history courses (at least fifteen hours to be upper level). This emphasis is designed for those students who intend to enter business or government directly after graduation.

Requirements for the Bachelor of Science Degree in History: Secondary Education Emphasis

The Secondary Education emphasis for the History Major leads to the degree of Bachelor of Science (BS) and prepares students for teaching at the middle and high school level. Students must complete the "Core Requirements for the History Major" listed above, 15 hours of history electives of which at least 6 hours must be from non US history courses, the Social Science Courses Required for Certification listed below, and all requirements of the Teacher Education Program.

Other Social Science Courses Required for Certification

Courses		Titles	Credits
ECON	201	Principles of Macroeconomics	3
GEOG	101	Physical Geography	3
GEOG	103	World Regional Geography	3

POLSC 101   American National Politics.....................3
POLSC 102   State and Local Governments................3

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TOTAL   15

Specific Requirements for the History Minor

HIST Courses	Titles	Credits
Nine hours selected from the following courses: 9		
HIST	101	World Civilization............................3
HIST	102	World Civilization to 1100................3
HIST	103	World Civilization since 1800...........3
HIST	201	United States History I.....................3
HIST	202	United States History II....................3
PLUS		
HIST	300	Historiography 3
History Electives approved by the minor adviser...............9		

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TOTAL   21

Outcomes Assessment Activities for the History Program

Portfolio reviews serve as the core, formal assessment tool for the History Program. Student portfolios contain papers written for two core courses required by the program—historiography and seminar. Portfolio papers are reviewed on the basis of the student learning outcomes.

POLITICAL SCIENCE PROGRAM

The major in political science leads to the degrees of Bachelor of Arts (BA) and Bachelor of Science (BS), and prepares undergraduates for careers in law, government and politics. Courses in political science also serve to complement the liberal arts core at CSU-Pueblo and to prepare students for acceptance into graduate programs leading to professional degrees in law, public administration, or to specialized academic degrees.

Program Goals

To prepare students majoring in the discipline to:

- Demonstrate a basic understanding of historical, philosophical and empirical foundations of political science;
- Demonstrate a general command of knowledge about the American political system, global studies, the history of political thought, and standard political science research approaches; and
- Demonstrate an ability to continue personal study and learning on an independent basis about specific subjects in the discipline.

To prepare students minoring in the discipline to:

- Demonstrate a basic understanding of the nature of the discipline, and
- Demonstrate a general knowledge and understanding of the American political system and of global studies.

Expected Student Outcomes for the Political Science Program

Knowledge Outcome: Students should have factual knowledge about the various subfields in political science. This includes knowledge about the major theories, issues and methods of inquiry for each subfield.

Writing Outcome: Students should be able to write complex prose, with correct grammar. They should be able to present a coherent and persuasive argument on a political science topic in a research format following the APSA format.

Critical Thinking Outcome: Students should be able to:

- Define problems, examine evidence, and analyze the assumptions leading to a conclusion;
- Question arguments, casual theories, evidence broad generalizations, and simple correlation;
- Are open to both sides of an argument; and
- Are prepared to examine and expose holes in all arguments (including their own).

Communication Outcome: Students should be able to clearly and concisely present their ideas as participants in classroom discussions and in presenting their research.

General Requirements

- Students in the major must complete a minimum of 36 semester credit hours in political science, including 18 hours in the political science core. Students are required to earn a grade of C or better in all political science courses.
- Students in the minor must complete a minimum of 21 semester credit hours in political science, including 9 semester credit hours in the political science core. Students are required to earn a grade of C or better in all political science courses.
- A maximum of six credit hours of POLSC 480, Practicum in Politics and Public Service, may be applied towards the 36 hours required for the major, or three credit hours towards the 21 hours required for the minor.
- Depending on individual interests and goals, students are encouraged to take one year of foreign language, courses in statistics, and PHIL 204, Critical Thinking.

Required Core Requirements for the Political Science Major

POLSC Courses		Titles	Credits
POLSC	101	American National Politics	3
POLSC	201	International Relations	3
POLSC	202	Comparative Politics	3
POLSC	250	Research Methods in Political Science	3
POLSC	370	Western Political Thought	3
POLSC	493	Seminar	3
		TOTAL	**18**

Political Science Electives...18

Total hours required for the major..............................36

Emphasis in Secondary Education

The Secondary Education emphasis prepares students for teaching at the middle and high school level. Students must complete the "Core Requirements for the Political Science Major" listed above, 12 hours of political science electives, the "Social Science Courses required for Certification" listed below, and all requirements of the Teacher Education Program.

Social Science Courses Required for Certification

Courses		Titles	Credits
ECON	201	Principles of Macroeconomics	3
GEOG	101	Physical Geography	3
GEOG	103	World Regional Geography	3
HIST	101	World Civilization to 1100	3
HIST	102	World Civilization from 1100-1800 OR	
HIST	103	World Civilization Since 1800	3
HIST	201	U.S. History I	3
HIST	202	U.S. History II	3
		TOTAL	**21**

Specific Requirements for the Political Science Minor

POLSC Courses		Titles	Credits
POLSC	101	American National Politics	3
POLSC	201	International Relations OR	3
POLSC	202	Comparative Politics	
POLSC	250	Research Methods in Political Science	3
Political Science Electives			12
		TOTAL	**21**

Outcomes Assessment Activities for the Political Science Program

The faculty of the Political Science program use a variety of methods for evaluating the student learning outcomes. These include an assessment of each student learning outcome in the political science senior seminar and a completed student exit survey in the senior seminar.

CENTER FOR THE STUDY OF HOMELAND SECURITY

The Political Science Program administers the Center for the Study of Homeland Security, which now offers a certificate in Homeland Security Studies and a Minor in Homeland Security for degree-seeking students.

Student Learning Outcomes for the Homeland Security Program

Knowledge: Students will be able to demonstrate knowledge of intelligence and counter-intelligence concepts; legal and constitutional principles pertaining to homeland and national security policy; strategic planning interfaces between national, state, and local governments; conceptual aspects of terrorism and counter-terrorism; and understand basic inter-agency communication needs, methods, and processes.

Writing: Students will be able to construct and present coherent, objective, and well reasoned arguments or discussions pertaining to topics on homeland security.

Critical Thinking: Students will be able to: recognize issues that are pertinent to homeland security; question issue validity; develop logically sound arguments pertaining to said issues; and evaluate sources of evidence pertaining to the issue (including contrary and supporting evidence).

Communication: Students will be able to construct, compose, and deliver professional reports, research, and briefings.

CERTIFICATE IN HOMELAND SECURITY STUDIES

This certificate is for degree-seeking students as well as law enforcement, emergency response personnel, and military. The program's core courses match curriculum guidelines established by the Department of Homeland Security. Recipients of the certificate will gain a deeper understanding of current security issues and the governmental decision-making process and the certificate will be valuable in hiring and promotion decisions in numerous career fields.

Non-degree-seeking students should apply as a Guest upon entering the program. The University does not transcript certificates, so records of the Homeland Security Studies Program and the issuance of the certificate are administered by the Political Science Program.

Required POLSC Courses

POLSC Courses	Titles	Credits
POLSC 270	Introduction to Homeland Security	3
POLSC 271	Terrorism	3
POLSC 272	Critical Incident Management	3
	TOTAL	9

Only one course taken for the Homeland Security Certificate can count toward the political science major or minor.

For information regarding the Certificate in Homeland Security Studies, please call (719) 549-2156.

MINOR IN HOMELAND SECURITY

The minor in Homeland Security provides students with an opportunity for in-depth study of the political and public policy issues involved in the homeland security field of governance and industry.

To complete the minor, students are required to complete a total of 18 credit hours of coursework.

Specific Requirements for the Minor in Homeland Security

Core Courses

Minors must complete the following three core courses.

POLSC Courses	Titles	Credits
POLSC 270	Introduction to Homeland Security	3
POLSC 271	Terrorism	3
POLSC 272	Critical Incident Management	3
	TOTAL	9

Elective Homeland Security Courses

Select 9 credits from the following list: 9

POLSC Courses	Titles	Credits
POLSC 373	Intelligence and National Security	3
POLSC 374	Homeland Security and the Law	3
POLSC 375	Threat and Strategic Planning	3
POLSC 376	Cyber Defense	3
	TOTAL	18

All students pursuing the minor earn the non-transcripted Certificate in Homeland Security Studies.

Students have the option to replace one current 300 level Homeland Security class with an elective 300 level course for the minor. Any elective chosen must be approved prior to the student's enrollment in the course. Approval is given though student consultation with the Director of the Center for Homeland Security.

Only one course taken for the Homeland Security Minor can count toward the political science major or minor.

Outcomes Assessment Activities for the Homeland Security Program

The Director of the Homeland Security program establishes and maintains a portfolio for each student with a declared minor in Homeland Security. Portfolios include student's major papers and observations of research presentations for the Terrorism course and other pertinent information including transcripts. This portfolio, in conjunction with results from an annual in-class observation of student performance in a minor level course, form the basis of evaluating expected student learning outcomes.

PHILOSOPHY PROGRAM

In addition to exploring the methods, ideas, problems and history of philosophy, the minor in philosophy trains students to think with rigor, clarity and precision. Since these qualities are valuable in virtually any discipline, the minor supports a wide range of majors or career tracks. Philosophy and its sub-discipline of ethics pair particularly well with history, politics, law, literature, the arts, the sciences, business, healthcare, and technology.

Program Goals

- To provide individual courses as well as an academic minor in philosophy;
- To sharpen students' critical thinking skills and to develop the abilities to speak and write in a clear, analytical manner;
- To develop students' understanding of philosophical methods and ideas, including their historical-cultural origins and contemporary applications; and
- To cultivate the habit of reflection that will allow students to apply their critical and philosophical skills in their personal and professional lives.

Expected Student Outcomes

- Students will be able to recognize, analyze, and logically evaluate arguments encountered in sources

ranging from philosophical and academic texts to the popular media.

- Students will be able to construct and present clear, well-reasoned defenses of theses both verbally and in writing.
- Students will be able to recognize and assess the relevance of philosophical ideas and methods in the historical interplay of philosophy and culture.
- Students will be able to apply philosophical methods to conduct ethical, metaphysical, and epistemological analyses.

General Requirements

Students who wish to minor in philosophy must complete a minimum of 18 credit hours of approved philosophy courses with grades of C or better.

Specific Requirements for the Philosophy Minor

PHIL Courses		Titles	Credits
PHIL	102	Philosophical Literature	3
PHIL	201	Classics in Ethics	3
PHIL	204	Critical Reasoning OR	
PHIL	205	Deductive Logic	3
PHIL	280	The Ancients: Person, Polis, Cosmos	3
PHIL	380	The Moderns: Science, Self, State	3
PHIL	480	Continental Thought OR	3
PHIL	485	American Pragmatism and its Legacy	3
		TOTAL	18

Outcomes Assessment Activities

The coordinator of the Philosophy Program maintains a portfolio for each student with a declared minor in philosophy. Portfolios include a student's major papers written for the History of Philosophy courses, transcripts, and other pertinent information. Student portfolios, in conjunction with indirect measures such as the results from the annual survey of minors, form the basis for evaluating expected outcomes.

GEOGRAPHY

The department extends classes in Geography primarily for students who wish to gain Colorado teacher licensure. There is no major or minor in Geography, but students majoring in a variety of areas would benefit from the Geography classes; e.g., History and Political Science.

MASS COMMUNICATIONS DEPARTMENT AND CENTER FOR NEW MEDIA

Department Chair: Leticia Steffen

Faculty: Ebersole, Gula, Lovato, Steffen
Station Manager: Jenna Mangino

The Mass Communications Department and Center for New Media supports the mission of the University by offering an applied major that integrates technological innovation with a traditional humanities and social sciences curriculum. Students are prepared for careers in the media and related disciplines while also being given the ethical and aesthetic foundations to make those careers meaningful.

The 42 credit major in Mass Communications leads to the degrees of Bachelor of Arts (BA) and Bachelor of Science (BS). Candidates for the Bachelor of Arts degree must satisfy the foreign language requirement while candidates for the Bachelor of Science degree must complete MATH 156, Introduction to Statistics. A degree in Mass Communications leads to careers in print and online journalism reporting and editing for news, features and sports; advertising copywriting, design and sales; digital video and audio production for radio, television, and the Internet; interactive multi-media application for the Internet; and strategic public relations for government, nonprofits, and business.

An 18 credit core is the foundation of the major with emphasis areas that require 15 additional credit hours and applied coursework that requires 9 additional credit hours.

The TODAY online news website and magazine are published as laboratory tools of the Mass Communications Department to serve the students, faculty and staff of CSU-Pueblo in addition to the Pueblo community. Editorial and management positions are awarded each semester after review of all applications from qualified students. The newspaper is funded through advertising revenue. The newspaper's adviser is a member of the Mass Communications faculty. Prerequisites: MCCNM 201 and declared major or minor in Mass Communications.

KTSC-FM is licensed to CSU-Pueblo as an educational radio station by the Federal Communications Commission. Operated by the Mass Communications Department, the 8,000-watt station serves the surrounding region. Advanced Mass Communications students are involved in daily programming, production, and news. Prerequisites: MCCNM 101 and 140 and declared major or minor in Mass Communications.

KTSC-TV, a full-power television station affiliated with Rocky Mountain Public Broadcasting and CPB, provides laboratory training and on-campus opportunities for television students in the KTSC Studio. Prerequisites: MCCNM 101 and 245 and declared major or minor in Mass Communications.

Department Mission

The mission of the Mass Communications Department and Center for New Media is to offer a pragmatic and professionally oriented program designed to prepare majors for successful careers in the media and related areas and to prepare students for graduate study.

Department Goals

1. Offer a marketable and professionally credible program.

    -   Provide a comprehensive foundation of media-oriented theory and practice.
    -   Emphasize writing as strategic and professional communication.
    -   Emphasize personal ethics and professional ethics codes.
    -   Ensure curriculum meets standards of the professions represented.

2. Provide a student-centered experience for learning and advising.

    -   Create a proactive student-faculty advising experience.
    -   Create a collaborative department culture.
    -   Recognize student accomplishments and outstanding performance.

3. Create an applied learning environment with cutting-edge technology.

    -   Provide media laboratory opportunities for all Mass Communication majors.
    -   Offer a full range of internships at the junior and senior level.
    -   Provide technology for pedagogical and professional purposes.
    -   Create course content that is interactive, applied, and project-oriented.

4. Maintain a reputation for excellence.

    -   Maintain alumni relationships through an online database, guest speakers, and professional networking.
    -   Conduct graduating senior surveys every semester and alum surveys every five years.

-   Serve as mentors and role models for current students and alumni.

Student Learning Outcomes
(Based on Department Goal 1: Offer a marketable and professionally credible program.)

1. Students will display critical thinking skills, conveying complex ideas related to current issues and ethical expectations of mass media and related disciplines.
2. Students will write with clarity and organization utilizing the proper format, writing mechanics and audience focus, in a manner that is professionally competitive for an entry-level position in the discipline.
3. Students will demonstrate technological expertise related to the specific emphasis area that is professionally competitive for an entry-level position in their discipline.
4. Students will demonstrate command of subject, organization of thoughts, and skill at interpersonal communication in front of an audience.

Outcomes Assessment Activities

Student success is measured through a variety of methods that include classroom writing samples, portfolios of student work, professional internship evaluations, exit interviews, student employment upon graduation, and alumni feedback.

Each graduating senior creates an academic portfolio of all salient work or projects completed while in the department. Department faculty review and evaluate a selection of portfolios to assess student learning.

The Mass Communications Department and Center for New Media requires that the academic portfolio demonstrate a pattern of sustained academic growth and development of the major and minor, appropriate to the student's emphasis area.

The academic portfolio should reflect the quality and level of intellectual and scholarly work undertaken by the student while in the department, relative to the qualitative, quantitative, ethical, legal and aesthetic dimensions of the field. The appropriateness of the content is dictated by the student's emphasis area and is prescribed by the individual's adviser.

General Requirements

-   Majors are required to complete a 42 credit curriculum which includes:
    -   18 credit Core
    -   15 credit Emphasis area
    -   9 credits of Applied coursework
-   Successful Mass Communications majors will demonstrate sufficient knowledge, comprehension

and analytical skills by the ability to evaluate specific communication events in the proper context of their emphasis area.

- Students majoring in Mass Communications must achieve a C grade or better in all MCCNM courses, both required and elective, to be eligible for graduation. Students who earn below a C in MCCNM courses will be required to repeat them to achieve the 2.0 requirement for graduation in the major.

- Each faculty member will keep, in the department's central file, a set of course outlines or syllabi that list the objectives and skills achieved during the term. This central pool of materials describes the detailed expectations and accountability elements for the MCCNM major on a course-by-course basis.

- Consistent with general CSU-Pueblo policy, no student enrolled in MCCNM courses may accumulate unexcused absences, or arrive late for scheduled classes without faculty consultation.

- The Mass Communications department believes that grades are valid quantitative indicators of student performance. Students' GPAs in the major or minor will be used by emphasis area advisers for both formative and summary evaluations of majors and minors.

- While it is necessary for Mass Communications majors and minors to meet the minimum GPA standards set by the department and the University, it is expected that graduates will exceed these standards.

- MCCNM 101, Media and Society, cannot be counted toward social science and general education by Mass Communications majors.

THE MASS COMMUNICATIONS AND CENTER FOR NEW MEDIA MAJOR

Specific Requirements for the Major Core

MCCNM Courses		Titles	Credits
MCCNM	101	Media and Society	3
MCCNM	201	Introduction to Journalism	3
MCCNM	210	Intro to Integrated Communication	3
MCCNM	220	Introduction to Electronic Media	3
MCCNM	411	Media Law and Ethics	3
MCCNM	493	Seminar	3
		TOTAL	18

CHOOSE ONE OF THREE EMPHASIS AREAS

Specific Requirements for the Emphasis in Electronic Media

Adviser: Sam Lovato

MCCNM Courses		Titles	Credits
MCCNM	318	Regulation of Electronic Media	3

MCCNM	320	Media Programming	3
MCCNM	336	Interactive Media	3
MCCNM	338	Global Communication	3
MCCNM	425	Audience Research Methodology	3
		TOTAL	15

Specific Requirements for the Emphasis in Integrated Communication

Adviser: Joanne Gula

MCCNM Courses		Titles	Credits
MCCNM	302	Advertising Copywriting.	3
MCCNM	321	Public Relations Case Problems	3
MCCNM	422	Writing for Public Relations	3
MCCNM	425	Audience Research Methodology	3
MCCNM	430	Integrated Communications Campaigns	3
		TOTAL	15

Specific Requirements for the Emphasis in Journalism

Adviser: Leticia Steffen

MCCNM Courses		Titles	Credits
MCCNM	301	Editorial Writing	3
MCCNM	305	News and Feature Writing	3
MCCNM	312	Publication Editing and Design	3
MCCNM	350	Media Lab (TODAY)	3
MCCNM	445	Reporting Public Affairs	3
		TOTAL	15

MCCNM Applied Electives: 9 credits required

MCCNM Courses		Titles	Credits
MCCNM	211	Digital Publishing	3
MCCNM	232	Website Design	3
MCCNM	233	Script Writing	3
MCCNM	245	Digital Media Production	3
MCCNM	246	Advanced Digital Media Production	3
MCCNM	260	Digital Imaging	4
MCCNM	282	Digital Media Post Production	3
MCCNM	332	Advanced Web Design and Development	3
MCCNM	350	Advanced Media Lab	2-3
MCCNM	494	Field Experience	Varies

Note: Prerequisites may exist with some courses and Media Lab is required of all majors.

Co-curricular Requirements

The thrust of the Mass Communications Department and Center for New Media is pragmatic; therefore, all majors must enroll in a minimum of one 2 or 3 credit lab. Faculty

have discretion in curriculum, programming and enrollment of all media labs.

- TODAY online newspaper and print magazine (print and online editorial, photography, audio/video, advertising)
- KTSC-FM on-campus radio station (studio and field production, programming, promotion, talent)
- KTSC-TV/RMPBS on-campus television station (studio production)

Students may earn a maximum of 9 credits in media labs.

Students desiring internships must have a 3.0 grade point average in their Mass Communications courses. Internships are not required, are most often reserved for majors, and are at the discretion of the faculty adviser. Students may earn a maximum of 9 hours of internship credit.

Specific Requirements for the Mass Communications and Center for New Media Minor

Students desiring a minor in Mass Communications must complete 21 credit hours approved by their minor area adviser and MUST include MCCNM 101. The minor may not include more than 3 credits of media lab and must include at least 6 hours of upper division Mass Communications coursework. Students must earn a C or better in all Mass Communications courses.

MILITARY SCIENCE (US ARMY)
(Reserve Officers' Training Corps Program)

Professor of Military Science: Major Noble Turner; **Assistant Professor of Military Science:** Major, IN Anthony Thies, **Senior Military Science Instructor**: MSG James Goodin, SFC James Anderson

The Army ROTC Program

The focus of this program is to enroll, develop, and commission college-educated men and women to serve in the United States Army. Participants in the program are commissioned as a Second Lieutenant in the Army upon graduation with a bachelor's degree. They will be expected to serve in either the active Army or in the Reserve Components (Army Reserves or Army National Guard) after commissioning.

The program is centered on teaching the principles of leadership. These principles can be applied to positions in the military or in civilian careers. All courses of instruction are designed to develop leadership and management skills as well as enhance the self-confidence and initiative of each student.

Military Science is taken in addition to the required courses for each student's major.

ROTC is a four-year program that is divided into two phases: the Basic Course and the Advanced Course.

A minor in Military Science is available for qualified students.

The Basic Course

The focus for these lower division courses (MSL 100/200 courses) is to lay a foundation for more advanced instruction in the skills needed to be a successful leader. Students may participate even if they do not plan on receiving a commission in order to gain experience in leadership and management.

This phase is open to all qualified students (generally freshmen and sophomores). Students should be aware that there are some physical requirements for successful course completion.

There is no military obligation for participation in the Basic Course unless a student is receiving an Army ROTC Scholarship.

Sophomores wanting to complete the Basic Course requirements so that they may enter the Advanced Course can compress the Basic Course and/or attend the Leader's Training Course during the summer between their sophomore and junior years. For further information please see below and contact the Department of Military Science.

The Advanced Course

The Advanced Course (MSL 300/400 level courses) is oriented to preparing students (juniors and seniors) who have successfully completed the basic course requirements with the skills and knowledge necessary to be commissioned as a Second Lieutenant in the Army. The focus of the Advanced Course continues on building leadership skills and abilities.

Students participating in the Advanced Course have a contractual obligation to complete the program and enter the Army upon graduation.

Students must have a minimum of four semesters remaining in their course work before graduation to participate in the Advanced Course and they must be in a full-time status (12 credit hours per semester) during each of those semesters.

Credit for the Basic Course for entry into the Advanced Course may be achieved in a number of ways. The normal progression is to successfully complete all four Basic

Course Military Science classes (MSL 101, 102, 201 and 202) with a grade of "C" or better. Students can also enter the course laterally by receiving credit for one of the following:

- Prior enlisted service in the Army, Air Force, Navy or Marines.
- Participation of a minimum of three years in a JROTC program.
- At least one year as a service academy cadet.
- Successful completion of the Army ROTC Leaders Training Course (LTC). This training is available to students who did not have the opportunity to participate in any of the above programs. The five-week camp is conducted every summer at Fort Knox, Kentucky. Participants receive pay while attending. The Army pays travel and some other expenses. For more information contact the Department of Military Science.

Students participating in the Advance Course will be required to attend the Cadet Leader Course (Advanced Camp) which is conducted annually at Fort Knox, Kentucky. This course is normally attended during the summer between a student's junior and senior year. It is a 29 day event that provides the best professional training and evaluation for all students participating in ROTC before commissioning. The course mission includes continued military training and leadership development, but the primary focus is to evaluate each student's officer potential. This course represents the only opportunity in ROTC to gather all qualified students from across the nation on one "level playing field" for the purpose of development and assessments. Successful completion of the course is mandatory for commissioning.

Course Offerings

Basic Course

Courses	Titles	Credits
MSL 101	Leadership & Personal Development (F)	1
MSL 102	Introduction to Tactical Leadership (S)	1
MSL 201	Innovative Team Leadership (F)	2
MSL 202	Foundations of Tactical Leadership (S)	2

Advanced Course

Courses	Titles	Credits
MSL 301	Adaptive Tactical Leadership (F)	3
MSL 302	Leadership in Changing Environments (S)	3
MSL 303	Advanced Camp (SS)	6
MSL 401	Developing Adaptive Leaders (F)	3
MSL 402	Leadership in a Complex World (S)	3
MSL 485	Special Studies in Leadership (F,S)	1

The Military Science Minor

A minor in Military Science is available for students participating in the Army ROTC Program. Participants must achieve a minimum of 21 credit hours by graduation, which includes credit for all Advanced Course classes (to include graduation from Advanced Camp) and the Professional Military Education (PME) requirement. More information about the minor is available through the Department of Military Science.

Professional Military Education (PME) Requirements

To receive a commission as a Second Lieutenant in the U.S. Army and to graduate with a Minor in Military Science students must also complete a course in the following area to receive credit for their Professional Military Education (PME) requirements. Further information on this requirement will be provided to the students during contracting into the Army ROTC program.

- Military History

Additional Requirements

- Remain a full-time student (12 credit hours or greater) in good academic standing.
- Initiate a security clearance investigation within 60 days from signing a ROTC contract to meet pre-commissioning requirements.
- Must pass the Combat Water Survival Test.

Scholarship Information

The Army ROTC Scholarship Program provides financial assistance for the education and training of highly motivated men and women who desire to pursue careers as commissioned officers in the U.S. Army after graduation with a bachelor's degree. Four, three- and two-year scholarships are available to qualified candidates. The scholarship pays for school tuition, books, certain fees, and provides the student with a monthly, tax-free stipend of between $300 and $500 per month for up to 10 months per year (depending on academic status). For more information pertaining to scholarships and enrollment eligibility please contact the Department of Military Science at 549-2163/2176/2141. Their office is located in AM Building, Room 113.

Military Science and Leadership Student Learning Outcomes

- Students will demonstrate proficiency in small unit leadership by applying the 23 leadership dimensions.
- Meet or exceed the standard of the Army Physical Fitness Test (APFT) and make a commitment to optimal health and physical well being as a way of life. Students must also meet and adhere to the Army height/weight standards and authorized body fat percentages.
- Demonstrate the ability to lead alongside with the seven Army values of loyalty, duty, respect, selfless-

service, honor, integrity, and personal courage.

- Demonstrate the understanding of customs and courtesies of the U.S. Army and Army's role in supporting the orders of superiors culminating with the Commander in Chief of the U.S. Army.
- All students will demonstrate various understanding of leadership and management skills in correlation to their academic y ear progression.
- In their junior year students will attend the Cadet Leader Course) to be developed, assessed, and compared to all Army ROTC cadets in the nation.

Outcomes Assessment Activities

Student success is measured through a variety of methods that include classroom work, Army Physical Fitness Test (APFT), Army Height and Weight Standards, Leadership Evaluations, complete and pass Cadet Leader Course.

- Students must pass or exceed the (APFT) each semester, as they progress higher in the MSL courses they must pass the (APFT) consistently and should progressively achieve a higher score.
- Parallel with (APFT) students must pass the Army Height and Weight standards.
- In their junior (MSL 301/302) year students are placed in leadership positions where they are evaluated in their leadership skills to include the 23 leadership dimensions and the seven Army values.
- After completion of MSL 302 (spring semester) students must attend and complete the Cadet Leader Course. It is a 29 day fully immersed assessment process that covers everything that was learned and evaluated since the cadet's freshman year. Students are subjected to high stress scenarios and placed in critical leadership roles that will further develop and assess an individual's ability to lead and serve as an officer in the United States Army.

MUSIC DEPARTMENT

Department Chair: David Volk

Faculty: Chi, Ihm, Metchkov, Mills
Artists-in-Residence: Beck, De Luca, Eastin, Eberhardt,
Eickelman, Hsu

The Music Department of Colorado State University-Pueblo seeks to promote excellence in musicianship and to equip students for a career in music. The major in music leads to a degree of Bachelor of Arts (BA).

Mission, Goals and Objectives

The **mission** of the Department of Music at Colorado State University-Pueblo is to prepare undergraduate

students to function professionally in their chosen field of music within the larger context of a liberal education, to provide artistic enrichment for the community, and to serve as an artistic resource.

The **goals** of the Department of Music are:

- To prepare students to function professionally in their field of music,
- To provide appropriate musical experiences for students in the liberal arts program,
- To prepare students to pursue advanced study in their respective areas,
- To encourage in all students the development of musical sensitivity and an understanding of the aesthetic process, and
- To provide for the University and community the enrichment afforded by a variety of musical experiences.

The **objectives** of the Department of Music used to accomplish the goals outlined above include:

- To offer courses and related experiences of an appropriate nature and quality and of sufficient breadth to allow the student adequate opportunity to acquire the necessary knowledge and skills;
- To offer and encourage student participation in a variety of ensembles and other instructional opportunities, allowing for varying musical tastes, experiences, and abilities;
- To challenge each music student to progress beyond the minimum requirements of a degree program, and to provide opportunities for growth beyond classroom instruction;
- To present music in a manner that promotes it as an art form; and
- To offer and promote quality performance and instruction, and to serve as an artistic resource.

Expected Student Outcomes

Upon completion of the Bachelor of Arts degree in Music, students will:

- Read, analyze, and perform music with fluency in at least one performance medium and in a variety of performance styles;
- Use the piano proficiently as an instrument for independent study of music theory, analysis of scores, and preparation of compositions or arrangements, as appropriate to the common tasks of a professional musician;
- Demonstrate proficiency in aural recognition and analysis of music, and in singing musical lines at sight, as appropriate to the common tasks of a professional musician;

- Recognize and describe representative selections of music from all the significant style periods and genres of western art music; and
- Create arrangements and original compositions utilizing the recognized ranges and idioms of orchestral and band instruments and of vocal ensembles.

In addition, students in the *Performance Emphasis* program will:

- Conduct large and small ensembles in their primary performance medium;
- Prepare and present in public a wide selection of repertoire representative of the highest standard of performance technique and style appropriate to young professional artists; and
- In conjunction with recital performances, prepare scholarly program notes on the repertoire being presented and work closely with administrative staff to complete the copy and format of professional publicity documents.

In addition, students in the *Music Education Emphasis* program will:

- Conduct large and small ensembles in their primary performance medium;
- Demonstrate through field experiences and student teaching the necessary skills and dispositions for teaching music in a variety of public school settings;
- Articulate in written documents addressed to the general audience (such as parents, school board members, or community at large) a well-grounded philosophy of music education; and
- Create instructional plans, long-range curriculum outlines, and assessments for music education at elementary and secondary levels, following Colorado Academic Standards and incorporating recognized best practices in music pedagogy.

Outcomes Assessment Activities

Department faculty hear all music majors perform prepared solos at least three times per semester, with both formative and summative assessments recorded at significant points, such as final juries and the Junior Qualifying Exam at the end of the sophomore year. In addition, every primary and secondary ensemble performs at least one concert per semester. From the accumulated success of these performances, the faculty can determine and assess:

- Attainment of performing skills as students progress through the curriculum;
- Effectiveness of recruiting and retention in each instrumental area and vocal range; and

- Degree of knowledgeable application of the concepts of music theory and history to the sensitive performance of a wide range of repertoire.

Every music major must pass an oral exam over the first two years' work before being allowed to continue in the 300-level courses of the music degree. This Junior Qualifying Exam holds students accountable for long-term learning in the discipline, but it also reveals patterns of effective or ineffective instruction across the department for program assessment purposes. Every music major must also complete a satisfactory demonstration of piano proficiency before graduation.

Students graduating in the emphasis areas of Performance or Music Education are required to present recitals appropriate to their degree program and (for Music Education) to pass the national standardized PLACE test.

Requirements

GPA

Students are required to complete all major and minor courses with a grade of C or better and to maintain a cumulative GPA of 2.5 or better.

Performance Skills

The attainment of an appropriate level of performance skills is required in order to function successfully as a musician. The minimum *Performance Standards*, which appear on the music department's web site and in the music department student handbook, provide representative examples of music literature and repertoire and must be successfully completed for each of the musical areas of performance concentration.

Admission to Upper Division

All music majors must qualify for admission to Upper Division (junior-level) study leading to the specific degree by successfully completing the Junior Qualifying Exam at the end of their sophomore year. In addition, all music majors will be required to pass MUS 229 (Piano Proficiency Completion) before performing an upper level recital, student teaching, or graduating. See the *Department of Music Student Handbook* for specific information regarding these evaluations.

Standards

Knowledge of specific subject areas, as recommended by the National Association of Schools of Music in music education, music theory, music history, music technology, and music performance will be measured through outcomes-testing.

Degree in Music

The general Bachelor of Arts in Music provides a broad base for a number of careers in music such as private studio teachers, and is intended as preparation for advanced graduate study.

The Bachelor of Arts in Music: Music Performance emphasis is appropriate for those students who plan to perform, teach privately, or pursue further study at the graduate level.

The Bachelor of Arts in Music: Music Education emphasis is a professional degree and provides the essential training, knowledge and skills necessary for a teaching career in choral, instrumental, or general music. The degree leads to K-12 music teacher licensure in choral, instrumental, and general music.

The University also offers the traditional liberal arts Minor in Music suited for students in majors other than Music desiring a foundational curriculum in Music. The Minor in Music Technology is open to students in all majors (including Music) who have a strong background in music fundamentals (basic performance, musical notation and theory). The Minor in Composition/Music Theory, Minor in Jazz Studies, and the Minor in Organ Performance Studies are primarily intended as concentration areas of study for students in BA-Music (General or Performance Emphasis) majors, but are open to students in any major satisfying course prerequisites.

Ensemble Registration and Requirements

The real-life performance experience provided by CSU-Pueblo ensembles is paramount to the professional training of our Music majors. University ensembles are also the 'public face' of the Department of Music and student participation is essential to our collective success.

At minimum, Music majors and scholarship recipients are required to participate in two ensembles every semester in residence. Applied Music registration and registration in upper division Music courses will not be permitted without the requisite ensemble registration.

Ensemble Registration Specific to the Major

General BA Music majors are to select an ensemble experience tailored toward their long-term professional goals, with a minimum of 6 hours of primary ensemble and 2 hours of secondary ensemble credit required. A minimum of 2 hours of Primary ensemble and 1 hour of Secondary ensemble must be earned at the upper division level (during the Junior or Senior year).

Music Education majors are to pursue a breadth of ensemble experiences, including Marching Band as this is an area all Music Education graduates are certified to teach. Music Education majors complete a minimum of 6

hours of Primary Ensemble, with at least 2 hours earned at the upper division level. Wind and Percussion Music Education majors are required to participate in Marching Band for two semesters, during the fall semester of their freshman and sophomore years (or first two years enrolled in the major). Music Education majors in other instrumental areas or voice are required to participate in Marching Band for one semester on a secondary instrument following an audition or successful completion of a related techniques class. All Music Education majors are required to participate in at least one instrumental ensemble and one vocal ensemble during their CSU-Pueblo tenure.

Performance majors are to pursue an ensemble experience focused on their specific instrument, with a minimum of 8 Primary and 2 Secondary ensembles required (with a minimum of 4 Primary ensembles and 1 Secondary ensemble earned at the upper division level).

Ensemble Registration Specific to a Student's Principal Instrument and Scholarship Status

Wind and Percussion instrumental principals are required to participate in Marching Band for two semesters, during the fall semester of their freshman and sophomore years (or first two years enrolled in the major) as well as Wind Ensemble every semester they are registered for applied music. Voice principals are required to participate in Concert and Chamber choirs every semester in residence. String principals are required to participate in Orchestra and Chamber Music every semester they are registered for applied music. Percussion principals are required to participate in Percussion Ensemble every semester they are registered for applied music. Guitar principals are required to participate in at least one Guitar Ensemble every semester they are registered for applied music.

Applied instructors have a vested interest in the ensemble selection of their students and additional instrumental areas may have additional ensemble requirements. Students should consult their applied instructors for specific ensemble requirements of their applied studio. Participation in excess of three ensembles in any given semester is at the discretion of the applied instructor.

Music scholarship recipients, regardless of major, are required to participate in a minimum of two ensembles each semester. Wind and Percussion Scholarship recipients are required to participate in Marching Band during the fall semester of their freshman and sophomore years (or first two years of receiving a Music scholarship).

Exceptions to ensemble policies must be approved by the Chair of Music in consultation with ensemble directors. Ensemble assignments for all students are at the direction and discretion of the Music faculty and may require an audition.

Specific Requirements for the Bachelor of Arts in Music

General Education...35

NOTE: must also complete the Foreign Language Requirement.

NOTE: must include MUS 118, Music Appreciation. In addition, all students must participate in appropriate Primary and Secondary ensembles as assigned each semester, except when Student Teaching.

Bachelor of Arts in Music Core Courses

MUS Courses	Titles	Credits
MUS 150	Music Theory I	3
MUS 151	Aural Skills I	2
MUS 210	Music Theory II	3
MUS 211	Aural Skills II	2
MUS 250	Music Theory III	3
MUS 251	Aural Skills III	2
MUS 280	Music Theory IV	3
MUS 281	Aural Skills IV	2
MUS 305	Music History I	3
MUS 355	Music History II	3
MUS x01	Music Performance Symposium (6 semesters)	0
MUS xxx*	Primary Ensemble (6 semesters, 2 upper division)	6
MUS xxx**	Secondary Ensemble (2 semesters, 1 upper division) (**Note**: Music Ed emphasis exempt from this credit requirement.)	2
MUS xxx	Major Applied Lesson (6 semesters, 2 upper division) (Music Ed emphasis completes 5 Semesters and Junior Lecture Recital)	12
MUS 127	Functional Piano I: Beginning (May be repeated; may be waived for Music Education majors)	1
MUS 229	Piano Proficiency Completion	1
MUS 103	Music & Computer Technology I	1
MUS 303	Music & Computer Technology II OR	1
MUS 306	Technology for Music Educators (**Note:** Music Education majors must Take MUS 306)	2
MUS 357	Orchestration and Arranging	2
MUS 358	Basic Conducting	2

TOTAL   54-55 (Music Ed 50-51)

Note: MUS 306 may be waived with completion of an appropriate 500-level Education Technology course toward the Master of Education degree and 2 additional hours of music electives.

Note: Piano students complete either of the following in lieu of Functional Piano courses:

| MUS | 346 | Piano Literature OR | |
| MUS | 347 | Piano Pedagogy | 2 |

TOTAL   2

Free Electives 30-31

Degree Total 120

***Primary** ensembles: (All courses MUS)

	Fr	Soph	Jr	Sr
Chamber Choir	109	209	309	409
Wind Ensemble	112	212	312	412
Guitar Ensemble, Classical	132	232	332	432
Guitar Ensemble, Jazz	136	236	336	436
Piano Ensemble	142	242	342	442
Orchestra	144	244	344	444

Secondary Ensembles: (All courses MUS)

	Fr	Soph	Jr	Sr
Concert Choir	102	202	302	402
Collaborative Music Ensemble	104	204	304	404
Vocal Jazz Ensemble	108	208	308	408
Brass Ensemble	114	214	314	414
Chamber Ensemble	121	221	321	421
Percussion Ensemble	124	224	324	424
Pep Band	131	131	331	331
Woodwind Ensemble	134	234	334	434
Marching Band	135	230	330	430
Jazz Ensemble	154	254	354	454

NOTE: Ensembles are determined by the student's declared performance area. See adviser if further information is required.

Specific Requirements for the Bachelor of Arts in Music: Music Performance Emphasis

Music Core...54

General Education 35
   (NOTE: must also complete second semester level of a Foreign Language)

Music Performance Emphasis Requirements

MUS Courses	Titles	Credits
MUS 350	Theory V-Composition and Analysis	2
MUS x01	Music Performance Symposium (2 semesters)	0

MUS 349 Junior Recital 2
MUS 470-489 Senior Recital 2
MUS xxx Primary Ensemble 2
(2 semesters, upper division)
MUS 359 Advanced Conducting...........................2

TOTAL 10

Note: Vocal students must also complete the following:

MUS 323 Diction for Singers 2

TOTAL 2

Note: Piano students must also complete the following:

MUS 346 Piano Literature 2
(Substitute for 2 credits of Functional
Piano, MUS 127 and 227)
MUS 347 Piano Pedagogy 2

TOTAL 4

Note: Guitar students must also complete the following:

MUS 152 Jazz Improvisation I..............................2
MUS 252 Jazz Improvisation II.............................2
MUS 326 Guitar Pedagogy I: Adv Sightreading....2
MUS 327 Guitar Pedagogy II: History & Lit..........2

TOTAL 8

Electives..13-21

Degree Total 120

Specific Requirements for the Bachelor of Arts in Music: Music Education Emphasis

Music Core ....(Music Ed) 50-51
(Must include MUS 306 taken in core)

General Education...35

- Humanities requirements must include MUS 118 (Music Appreciation) and COMR 103 (Speaking and Listening).
- Social Science requirements must include either PSYCH 151 (Human Development) or PSYCH 251 (Childhood and Adolescence).

NOTE: The Foreign Language requirement must also be satisfied. It is recommended to take FL 100 as a Humanities and then take ANTHR/ENG 106 as a Social Science to satisfy this requirement.

Music Education Emphasis Requirements

MUS Courses	Titles	Credits
MUS x01	Music Performance Symposium	0
	(1 semester)	
MUS 345^	Junior Lecture Recital	1
MUS 359^	Advanced Conducting	2
MUS 113^	Vocal Techniques and Diction	1
MUS 223^	Percussion Techniques	1
MUS 233^	Woodwind Techniques	1
MUS 243^	String Techniques	1
MUS 253^	Brass Techniques	1
MUS 340^	General Music Methods	2
MUS 440^	Choral Music Methods	2
MUS 441^	Instrumental Music Methods	2

TOTAL 14

Education Requirements

Courses	Titles	Credits
ED 202*	Foundations of Education	3
ED 301*	Frameworks of Teaching	4
RDG 435^	Content Area Literacy	4
ED 412^	Teaching Diverse Learners	3
ED 485	Capstone Seminar	1
ED 489	Student Teaching K-12	12

TOTAL 27

*The Bachelor of Arts in Music Core Courses and ED 202 and 301 are required prerequisites for students completing initial teachers' certification in K-12 Music (for additional requirements, refer to the Graduate School and Department of Education portions of the Catalog).

^For courses designated, equivalent graduate-level courses toward the Master of Education-Music Emphasis degree are offered in pursuit of initial teachers' certification. ED 489 may be taken for 6 hours with co-registration in MUS 594 (Field Experience) for 6 hours.

Degree Total 126-127

There are additional licensure requirements; consult the Teacher Education Program for details.

Elective Performance Certificate within the Music Education Emphasis

The Department of Music awards the *Performance Certificate within the Music Education emphasis* for completion of the following applied music course work. Hours toward the Performance Certificate are earned above and beyond credit hours required for the BA Music with Music Education Emphasis degree.

Requirements

At least 2 additional hours of applied music at the
Junior or Senior level...2
Completion of Senior Recital............................2

_____
CERTIFICATE TOTAL   4

The University does not transcript certificates, so records of the *Performance Certificate within the Music Education Emphasis* and the issuance of the certificate are administered by the Music Department.

Minors in Music

Music majors completing minors in Music Technology, Composition/Theory, Jazz Studies, or Organ Performance must complete a minimum of 18 hours beyond required courses of the BA-Music (General Emphasis) degree, to include required hours in the minor and any electives beyond major and minor degree requirements. These hours fulfill the College of Humanities, Arts and Social Sciences (CHASS) graduation requirements that 18 hours must be taken in a minor or in courses outside the major discipline.

Specific Requirements for the Music Minor

MUS Courses		Titles	Credits
MUS	118	Music Appreciation..............................3
MUS	127	Functional Piano I: Beginning 1
MUS	xxx	Ensemble (4 semesters) 4
MUS	x01	Music Performance Symposium (4 semesters) 0
MUS	150	Music Theory I 3
MUS	151	Aural Skills I.......................................2
MUS	210	Music Theory II 3
MUS	211	Aural Skills II 2
MUS	xxx	Applied, non major (4 semesters) 4

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TOTAL   22

Specific Requirements for Minor in Music Technology

Required Core Courses (13 credit hours)

MUS Courses		Titles	Credits
MUS	103*	Music and Computer Technology I 1
MUS	110	Music and Audio Production I 1
MUS	118	Music Appreciation..............................3
MCCNM	101	Media and Society 3
MCCNM	220	Introduction to Electronic Media..........3
MUS	303	Music and Computer Technology II 1
MUS	310	Audio Production II: Pro Tools 1

Electives (minimum 6 credit hours)
Coursework must include at least one offering from Mass Communications and Center for New Media (MCCNM) and a minimum of 3 hours from Music (MUS). Courses numbered 300 and above require successful completion of the required core.

MUS Courses		Titles	Credits
MUS	203*	Electronic Music..................................2
MUS	285	Cultural History of Popular Music........2
MCCNM	245	Digital Media Production.....................3
MCCNM	318	Regulation of Electronic Media 3
MUS	410	Audio Production: Lab 1
MUS	420*	Film Scoring.......................................2

_____
TOTAL   19

*This course requires knowledge of basic music notation, harmony, and performance.

Specific Requirements for Minor in Composition/ Music Theory

Required Core Courses (10 credit hours)

MUS Courses		Titles	Credits
MUS	180	Applied Music Composition ...... 1-1-1-1 (four semesters, 1 hour each)
MUS	438	Composition Recital.............................2
MUS	350	Theory V-Composition and analysis ...2

One of the following advanced Theory courses 2
MUS	351	Counterpoint 2
MUS	352	19th Century Styles 2
MUS	353	20th Century Styles 2

Electives (8 credit hours)
(Chosen from the following list)

MUS Courses		Titles	Credits
MUS	113	Vocal Techniques and Diction 1
MUS	180	Applied Music Composition ....1-4 (additional semesters beyond core)
MUS	223	Percussion Techniques 1
MUS	233	Woodwind Techniques 1
MUS	243	String Techniques..............................1
MUS	253	Brass Techniques 1
MUS	359	Advanced Conducting.........................2
Advanced Music Theory courses (not taken for core)....2-6

_____
TOTAL   18

Specific Requirements for Minor in Jazz Studies

Required Core Courses (12 credit hours)

MUS Courses		Titles	Credits
MUS	120	History of Jazz 2

MUS	285	Cultural History of Popular Music........2
MUS	152	Jazz Improvisation I 2
MUS	252	Jazz Improvisation II 2
MUS	180	Applied Music Composition..............1-1
		(Jazz Composition/Arranging)
MUS	439	Recital: Jazz Studies..........................2

Ensemble Participation (6 credit hours)
(Chosen from the following list)

MUS Courses	Titles	Credits
MUS 108, 208, 308, 408	Vocal Jazz Ensemble	.5-1
MUS 136, 236, 336, 436	Guitar Ensemble, Jazz	.5-1
MUS 154, 254, 354, 454	Jazz Ensemble	.5-1

TOTAL   18

Specific Requirements for Minor in Organ Performance Studies

Required Core Courses (14 credit hours)

MUS Courses	Titles	Credits
MUS	277	Applied Music Organ, major...... 2-2-2-2
		(four semesters)
MUS	169	Applied Music Voice, non-major 1-1
		(two semesters)
MUS	113	Vocal Techniques and Diction 1
MUS	498	Internship 1-1-1
		(three semesters)

The music internships will provide opportunities for professional, firsthand experience of music making in traditional church music programs. Internship opportunities coordinated with local churches will include work with adult choirs (1 credit hour), handbell choirs (1 credit hour), as well as service organ playing (1 credit hour).

Ensemble Participation (4 credit hours)
(Chosen from the following list)

MUS Courses	Titles	Credits
MUS 104, 204, 304, 404	Collaborative Music Ensemble 1-1-1-1	
	(four semesters)	

TOTAL   18

Master of Education/Music Emphasis

Refer to Department of Education requirements for admission to the Master of Education degree program. Interested persons should read the full program description in the *Master of Education* section of this catalog and contact the Music Department for specific questions.

18 hours of MUS 500-level credit must be earned to complete the Music Emphasis portion of the Master of Education degree (refer to the *Master of Education* section of this catalog). No more than 4 hours of 500-level ensemble credit or applied music credit may be applied toward the Master of Education-Music Emphasis. In addition to 18 hours of 500 level MUS credit completed, students must demonstrate completion of the following courses or the comparable undergraduate course listed below:

MUS Courses	Titles
MUS	530	Marching Band
		(1-2 semesters as required by instrument)
		[or MUS 135, 230, 330, or 430]
MUS	579	Graduate Recital
		[or MUS 345 or Junior Recital]
MUS 550 or		
	560	Instrumental or Choral Conducting
		[or MUS 359]
MUS	513	Advanced Vocal Pedagogy
		[or MUS 113]
MUS	523	Advanced Percussion Pedagogy
		[or MUS 223]
MUS	533	Advanced String Pedagogy
		[or MUS 243]
MUS	543	Advanced Woodwind Pedagogy
		[or MUS 233]
MUS	553	Advanced Brass Pedagogy
		[or MUS 253]
MUS	580	Advanced General Music Methods
		[or MUS 340]
MUS	581	Advanced Choral Methods
		[or MUS 440]
MUS	582	Advanced Instrumental Methods
		[or MUS 441]

Additional Information

The Department of Music Student Handbook is intended as a supplement to the University Catalog and is binding in all matters relating to the Department of Music at Colorado State University-Pueblo. A copy of the handbook may be found on the University Department of Music website, and printed copies are located in the Music Office (A/M 175) and in all music faculty offices.

The Colorado State University-Pueblo Department of Music is an accredited member of the National Association of Schools of Music.

NONPROFIT ADMINISTRATION MINOR

Adviser: Carol L. Langer, 549-2533

Mission

The nonprofit administration minor is a 24-credit multi-disciplinary program designed for students wanting to pursue careers in nonprofit organizations that include the arts, human services, recreation, chambers of commerce, civic efforts, and health care. The nonprofit administration minor supports the mission of the university by promoting civic responsibility and encouraging innovation.

Three student learning outcomes are directly related to the mission of the nonprofit administration minor: 1) identify basic components in nonprofit organizations; 2) develop a strategic plan for a new nonprofit organization; 3) apply knowledge of nonprofit organizations within an internship setting.

A variety of suggested electives allows student to focus their coursework toward the type of nonprofit career they desire. Elective courses allow for student choice. An internship in a nonprofit organization is also required and can be coordinated with the student's major area of study.

Student Learning Outcomes

- Students will be able to identify the basic components in any nonprofit organization.
- Students will develop a strategic plan for a new nonprofit organization.
- Students will apply knowledge on nonprofit organization in an internship setting.

Outcomes Assessment Activities

Student learning is measured through the development and design of a strategic plan for a new nonprofit organization and through the completion of an internship with a nonprofit organization. Faculty teaching the minor area courses will evaluate each strategic plan developed by students, paying close attention to the student's ability to convey the necessary components of a nonprofit organization. Internship supervisors evaluate students based on their ability to apply what they've learned in their courses into an actual nonprofit setting. Students evaluate how well their courses prepared them for their nonprofit internships. The results of these assessment activities are used to improve program offerings and enhance student learning.

Specific Requirements for the Nonprofit Administration Minor

Core Courses: .... 15 credits

Courses		Titles	Credits
MCCNM	370	Nonprofit Organizations and Communication	3
POLSC	330	Introduction to Public Administration	3
PSYCH	315	Industrial/Organizational Psych OR	
SOC	432	Organization Theory	3
SW	350	Social Welfare Policy	3
Internship			3

(Must be in a nonprofit organization and must be approved by Nonprofit Administration Minor adviser.)

Elective Courses: .... 9 credits

The following courses are suggested electives. Students are encouraged to identify courses that will assist in their specific nonprofit career goals. Students are required to earn 9 credits, but can choose additional electives. The required 9 credits can fall within the same content area or across disciplines; however, students may only use 6 credits from their major. No general education or other minor courses can be double-counted. Some courses may require prerequisites.

Courses		Titles	Credits
COMR	350	Communicating in Professions	3
ECON	202	Principles of Microeconomics	3
ENG	305	Technical & Scientific Report Writing	3
MCCNM	210	Intro to Integrated Communication	3
MCCNM	211	Digital Publishing	3
MCCNM	321	Public Relations Case Problems	3
MCCNM	422	Writing for Public Relations	3
MCCNM	430	Integrated Communications Campaigns	3
POLSC	340	Public Policy	3
SW	324	Social Work Intervention III	3

PSYCHOLOGY DEPARTMENT

Department Chair: Richard Walker

Faculty: Brett-Green, Bridgmon, Pratarelli, Yescavage

Psychology is a field of inquiry which is called the science of behavior and answers questions about how and why organisms behave as they do. The field of psychology is enormous with many sub fields. Some areas pertain to animals, while others are focused on the behavior of humans. Still other areas focus on, abnormal behavior or complex social and emotional behavior while the cognitive area focuses on how people perceive, learn, remember, and think.

Psychology is a discipline based on theoretical perspectives and information gained through research. Therefore, the psychology major is based on understanding theory as well as learning the methods of inquiry, evaluation, and drawing appropriate conclusions. These skills are useful for problem solving in many applied settings.

The bachelor's degree program in psychology at CSU-Pueblo offers a curriculum which provides the student with an overview of the major areas within psychology, along with the opportunity to select courses which fit their personal interests. Through psychology courses at CSU-Pueblo, a student can enhance their career opportunities and/or gain an academic grounding for professional and graduate training. Students who seek careers as professional psychologists should consider studies at the graduate level. Students are encouraged to take advantage of many opportunities in the psychology department including field placements and both laboratory and field-based research. There is a local chapter of Psi Chi, the National Honor Society in Psychology, which encourages students to maintain excellence in scholarship. Students are encouraged to participate in both Psi Chi and the Psychology Club.

Expected Student Outcomes

- Identify the major concepts and historical trends in psychology and evaluate theoretical perspectives.
- Apply basic research methods and ethical values in psychology, including design, data analysis using SPSS, and interpretation of results.
- Communicate effectively verbally and in writing including APA style.
- Students will act ethically and responsibly—both individually and with others—demonstrating an awareness of and respect for diversity.
- Implement psychological knowledge, skills and values in occupational pursuits in a variety of settings that meet personal goals and societal needs.

These expected learning outcomes apply for both the BA and the BS degrees in psychology.

Bachelor of Science Degree in Psychology

Students must complete all of the major degree requirements. In addition, students must complete 8 credits in the natural sciences or math (BIOL, CHEM, GEOL, MATH, or PHYS) beyond their general education courses. EXHP 162 and EXHP 162L cannot be used to satisfy the additional science requirement.

Bachelor of Arts Degree in Psychology

Students must complete all of the major degree requirements. In addition, students must complete the foreign language requirements as stated in the *Academic Policies* section of the University catalog beyond their general education courses. This requirement includes completion of the second level of a foreign language, or completion of FL 100 and ANTHR/ENG 106, or completion of the first and second level of American Sign Language.

Major Requirements

A total of 42 hours in psychology is required for the major. Psychology majors should consult a faculty adviser who will assist in selecting psychology courses to complete the major.

Basic Core Requirements

PSYCH Courses		Titles	Credits
PSYCH	100	General Psychology	3
PSYCH	103	Introductory Psychology for Majors	3
PSYCH	207/L	Quantitative Research Methods I/Lab	4
PSYCH	209/L	Quantitative Research Methods II/Lab	4
PSYCH	401	History & Systems of Psychology	3

Two of the following courses 6
PSYCH	311	Theories of Personality
PSYCH	352	Social Psychology
PSYCH	353	Advanced Developmental Psych
PSYCH	362	Abnormal Psychology

One of the following courses... 3
PSYCH	336	Learning and Motivation
PSYCH	337	Memory and Cognition

One of the following courses with lab.............................. 4
PSYCH	331/L	Physiological Psychology/Lab
PSYCH	334/L	Perception/Lab

One of the following courses... 3
PSYCH	314	Environmental & Conservation Psych
PSYCH	315	Industrial/Organizational Psych
PSYCH	342	Educational Psychology
PSYCH	471	Clinical Psychology

TOTAL   33

PSYCH ELECTIVES

A total of 9 credits of Psychology Electives are required for the major.

PSYCH Courses		Titles	Credits
PSYCH	151	Human Development	3
PSYCH	205	Intro to Sport Psychology	3
PSYCH	211	Women and Society	3
PSYCH	212	Psychology of Diversity	3
PSYCH	220	Drugs and Behavior	3
PSYCH	222	Understanding Animal Behavior	3
PSYCH	231	Marriage and Family Relationships	3
PSYCH	241	Human Sexuality	3
PSYCH	251	Childhood and Adolescence	3
PSYCH	291	Special Topics	1-4
PSYCH	351	Psych of Exceptional Individual	3
PSYCH	381	Principles of Psychological Testing I	3
PSYCH	403	Emotional Intelligence	3
PSYCH	405	Positive Psychology	3
PSYCH	410	Advanced Data Analysis	3

PSYCH	420	Human Evolutionary Psych...................3
PSYCH	463	Psychopathology of Childhood 3
PSYCH	464/L	Systems of Counseling and Psychotherapy/Lab 4
PSYCH	465	Behavior Modification 3
PSYCH	475	Group Process.....................................3
PSYCH	491	Special Topics 1-3
PSYCH	492	Research 1-3
PSYCH	494	Field Experience..............................1-12
PSYCH	495	Independent Study............................1-3

TOTAL   42

Psychology majors will be required to complete a minor to fulfill the CHASS requirements of 18 credits outside of the major beyond their major requirements and the general education requirements. Please note: PSYCH courses cannot be included in this total.

Prerequisites

Students should be aware that there are prerequisites to some courses. For instance, it is important to note that 2 years of high-school algebra (or equivalent) is the prerequisite for PSYCH 207 & 209. Successful completion of PSYCH 207 is the prerequisite for PSYCH 209. PSYCH 401 should not be taken until the senior year, preferably in the last semester before graduation.

Note:

- A maximum of 6 credit hours of field experience and/or independent study may be applied towards the required 42 total hours in psychology.
- Students may take PSYCH 491 an unlimited number of times; however, only six credits may count toward the psychology major.

General Education

General Education requirements are to be taken outside of the major. Therefore, students who major in psychology may not use psychology courses for general education.

Upper Division Requirement

Psychology majors must take a minimum of 24 credits of upper-division coursework in psychology.

GPA

A minimum grade of C is required in all psychology courses counting toward the psychology major.

Transfer Students

Students transferring from another institution and seeking a degree in Psychology must complete 21 hours of

Psychology courses at Colorado State University-Pueblo with a minimum grade of C in all psychology courses. Of these 21 hours, a minimum of 12 must be upper-division credit.

Requirements for the Psychology Minor

- Twenty one credits of psychology, which must include PSYCH 100 and nine credits of upper-division coursework. Credits in PSYCH 492, 494 and 495 do not count toward the minor.
- A minimum grade of C in all psychology courses counting toward the minor.
- PSYCH 491 may be taken once to count toward the minor.
- Transfer students must complete 9 credits upper-division coursework in Psychology at CSU-Pueblo.

Career/Employment for Psychology Majors

Psychology is a diverse field with hundreds of career paths. Some specialties, like caring for mentally ill people, are familiar to most of us. Others, like studying how we know and remember things, are less well known.

Across the nation, psychology is the second most popular undergraduate major, even though many of those who choose psychology as a major may not be interested in psychology as a career. About 10 percent of psychology majors pursue graduate training and at CSU-Pueblo there is excellent preparation available for students wishing to apply to graduate programs in psychology.

For those students who do not wish to become professional psychologists, many jobs are available. Psychology is a valuable major for a Liberal Arts degree. Jobs are found in various sectors of society and psychology graduates are most often employed as interviewers, counselors, mental health workers, human service practitioners, personnel analysts, probation officers, and writers. Employers find that psychology graduates possess strong people skills and psychology majors also value these skills themselves.

Psychology majors cite courses in the principles of human behavior as especially important to life after college. Additional insight gained from these courses into what motivates people to perform at their peak helps them, whether they are functioning as parents at home, coaching athletics, or managers on the job.

Training in the scientific method - the requirement to do thorough, objective research, analyze data logically, and put forth the findings with clarity - stands psychology majors in good stead as they pursue future careers.

Outcome Assessment Activities

- The presentation of an empirically-based research project immediately following PSYCH 209/209L. Each student presentation will be evaluated with the use of the Research Presentation Evaluation Form by psychology faculty.
- The use of counseling skills in a clinical field experience. Each student will be evaluated by the field experience agency and the psychology field coordinator with the use of the Field Experience Evaluation Form.
- An alumni survey is conducted every 5-7 years to assess the relevance of psychology courses in career development.

SOCIAL WORK DEPARTMENT

Department Chair: Carol L. Langer

Faculty: Baca, Bridgeman, Frounfelker, Richmond

The profession of social work is dedicated to helping individuals, families, groups, neighborhoods and communities meet basic human needs within the context of culture and society. Fundamental to social work practice is the enhancement of social functioning from a person-in-environment perspective. Particular attention is given to populations at risk, services that have been developed to meet client needs, and societal change to achieve a more humane and just society.

The Department of Social Work has been continuously accredited by the Council on Social Work Education (CSWE) since 1982. Students who earn a BSW degree from Colorado State University-Pueblo may be eligible for advanced standing in a social work graduate program. However, requirements for advanced standing vary with each graduate social work program.

Mission Statement

"As part of Colorado State University-Pueblo, a regional comprehensive university, the social work program prepares students for beginning generalist practice with diverse client populations across systems of all sizes, including individuals, families, groups, organizations, and communities."

Program Goals and Objectives

1. Provide BSW students with a range of skills, attitudes, and knowledge grounded in social work values and ethics.

   Objectives

   - Students will apply social work values and ethics to social work practice with diverse systems.
   - Students will evaluate the professional use of self in interactions with diverse systems.

2. Develop culturally competent professionals who can intervene appropriately in systems of all sizes with emphasis on regional populations.

   Objectives

   - Students will develop culturally competent knowledge, values and skills for beginning level social work practice with diverse systems.
   - Students will demonstrate the ability to practice with diverse populations in a multicultural environment including Chicanos, Mexicans, and American Indians.

3. Develop the ability of BSW students to advocate for social and economic justice with systems of all sizes.

   Objectives

   - Students will identify factors which impact the attainment of social and economic justice for diverse systems.
   - Students will select and apply appropriate intervention methods to develop and enhance social and economic justice across diverse systems.

4. Engage BSW students in a process of practice-informed research and research-informed practice.

   Objectives

   - Students will use critical thinking skills to develop knowledge and understanding of research relevant to beginning social work practice with diverse systems.
   - Students will interpret, evaluate and implement relevant research, linking theory to practice, as they engage in beginning level social work practice with diverse systems.

Student Learning Outcomes

Upon completion of the Baccalaureate Social Work Program, students will

- Demonstrate ethical and professional behavior;
- Engage diversity and difference in practice;
- Advance human rights and social, economic and environmental justice;

- Engage is practice-informed research and research-informed practice;
- Engage in policy practice;
- Engage with individuals, families, groups, organizations, and communities;
- Assess individuals, families, groups, organizations, and communities;
- Intervene with individuals, families, groups, organizations, and communities; and
- Evaluate practice with individuals, families, groups, organizations, and communities.

Outcomes Assessment Activities

The faculty of the Department of Social Work uses a variety of methods for evaluating the student learning outcomes. These include a senior field placement consisting of 448 clock hours under the supervision of a task/field supervisor and with a faculty liaison. An assessment of the field experience completed by the field supervisor is a direct measure. During the field seminar, students will complete and collect artifacts for a portfolio which will be submitted for blind evaluation of academic content by faculty. Students will complete a self-report survey where each learning outcome and associated practice behaviors are measured indirectly. In addition in the last term of the field experience, students must complete a standardized knowledge-based assessment. Embedded assessment measures include presentations, papers, projects, and conducting individual and group practice sessions. In addition, employer and alumni surveys are systematically administered as part of assessment. The results of these assessment activities are used to improve the program and student learning.

Requirements for the Social Work Major

General Education Foundation Courses

General Education................................. 35 credit hours

As a base for professional intervention, social work practice requires mastery of knowledge and skills commonly taught in the liberal arts. Students planning to major in social work should select general education courses that develop proficiency in verbal and written communication, competency in problem solving, and promote critical and analytical thinking. Courses that incorporate human growth and behavior, diversity, and the interaction of individuals, groups, neighborhoods, communities and society, within the context of social, economic, political, and governmental systems, provide a substantive base for majors. Students should complete the University's general education requirements prior to enrollment in upper division social work courses.

Professional Foundation Courses......... 34 credit hours

Specified courses...21
Basic social work courses 13

Other Related Requirements

No academic credit is awarded for life experiences in this program.

Transfer students may be required to submit a copy of course descriptions and/or course syllabi for review to determine acceptance of credits for social work and related courses.

There are no test out exams for social work courses. Independent study courses with SW prefix may not be substituted for required courses.

Social Work Foundation Courses

A grade of C or above must be earned in all courses required by the major.

The following specific courses are required as foundation for enrollment in upper division social work classes.

Courses		Titles	Credits
PSYCH	100	General Psychology	3
SOC	101	Intro to Sociology	3

The following courses may be taken concurrently with 300-level social work courses:

Courses		Titles	Credits
BIOL	100	Principles of Biology	3
CS	101	Intro to Chicano Studies OR	
CS/SW	230	Chicano: Social and Psychological Study	3
A course in ECON or POLSC			3
A WS course			3
SW	210	Statistics for Social Worker OR	
MATH	156	Introduction to Statistics (or an approved statistics course)	3

TOTAL   21

Courses in the social work curriculum are provided in the areas of human behavior and the social environment, social welfare policy and services, social research, social work practice and field practicum. Learning takes place in the classroom and in approved agency settings under supervision. Some courses in the major must be taken in sequence because knowledge in higher level courses is built on the mastery of information in previous courses.

SW Courses		Titles	Credits
SW	100	Intro to Social Work 3	
SW	201	Human Behavior & Social Environment I 3	
SW	202	Human Behavior & Social Environment II 3	
SW	205	Social Welfare in the U.S......................3	
SW	225	Social Work Policies and Procedures...1	

TOTAL   13

Admission into the Social Work Program

The social work major is a professional program and as such requires two additional admission processes following admission into the University: the first is admission into the social work program and the second is admission into the field practicum. **Social work majors should be accepted into the program prior to enrolling in required 300 and 400 level social work courses.**

Application forms are available in the BSW Student Handbook, on the website, or from the social work department administrative assistant on the Pueblo campus. Completed application forms are to be submitted by November 1st for the upcoming spring semester, by April 1st for the upcoming summer and fall semester. Applications for admission are accepted any time during the year, but no later than the deadlines noted for each term. Faculty review applications and a decision is made regarding admission into the program. The Department Chair will notify each student in writing of his/her status: 1) admission into the program, 2) conditional admission into the program or 3) denial of admission into the program.

Reasons for conditional admission into the program will be identified in the letter, as well as corrective actions that must be taken. Students who are conditionally admitted will have their progress followed by the Department Standards and Academic Progress Committee. This committee will also receive referrals from instructors within the department and from the department chair. Such referrals may include issues of academic or behavioral nature. (See the department student handbook for a complete description of this committee and its functions.) When the requirements for admission into the program have been satisfied, the student's status will be revised from conditional acceptance to admission into the program. If for some reason a student is not admitted to the program, the reasons for this decision will be identified in the letter to the student, along with necessary corrective actions. Reapplication may be made once corrective action has been taken.

Social Work Professional Practice Courses

Students must earn a grade of C or above in all social work professional practice courses. The following upper division social work courses are mandatory for completion of the BSW degree and require acceptance into the major prior to enrollment.

SW Courses		Titles	Credits
SW	301	Professional Writing in Social Work.......3	
SW	310	Social Work Theory 3	
SW	320	Human Diversity in Practice..................3	
SW	322	Social Work Intervention I 3	
SW	323	Social Work Intervention II 3	
SW	324	Social Work Intervention III 3	
SW	350	Social Welfare Policy............................3	
SW	481	Field Seminar I 3	
SW	482	Field Seminar II 3	
SW	488	Field Placement I..................................5	
SW	489	Field Placement II 5	
SW	492	Research 3	

TOTAL   40

Admission into the Social Work Field Practicum

The Field Practicum

Social work majors are required to apply for admission into the field practicum. All social work courses must be completed prior to entering field. Orientation meetings are scheduled by the Field Coordinator each fall and spring semester for all students planning to enroll in the field practicum during the following summer session or fall semester. Application forms for admission into the practicum are distributed at this meeting and information on the admission process and placement is provided. Students unable to attend are required to meet with the Field Coordinator to obtain the forms and receive pertinent information to proceed with the practicum placement process.

Completed applications must be returned to the Field Coordinator at the time of your interview. The application will be reviewed and the student will be notified of acceptance into the field practicum by the Field Coordinator. Late submission of the application may delay both placement into the practicum and graduation since most field practicum agencies require background checks and/or drug and alcohol testing. **Students need to be aware that a criminal history may affect eligibility for placement based on agency policy, not University policy or the Department of Social Work polices.**

The Field Coordinator is required to make a reasonable effort to assist a student in securing a placement. The social work student, however, not the University, is ultimately responsible for being eligible and retaining a placement under the direction of the Field Coordinator. Students unable to obtain acceptance into an approved placement after three attempts, or successfully complete a practicum, will not be awarded the BSW degree and are

advised to change to a major in which they can meet degree requirements.

Students are required to complete a minimum of 448 clock hours of professionally supervised field work in an approved community social service agency.

RETENTION IN THE SOCIAL WORK MAJOR

Students may be denied acceptance or withdrawn from the major or field placement for either academic or behavioral reasons.

Academic Requirements

Students must maintain specific academic standards for admission into the major, continuation in the program, and field practicum for graduation. By University policy, students are required to maintain a minimum cumulative grade point average of 2.0 for graduation. In the social work major, a minimum GPA of 2.5 is required (professional foundation and professional practice courses). All courses designated with a SW prefix and the non-social work foundation courses must be completed with grades no lower than a C. If an individual does not take any social work courses for one calendar year, the individual must reapply for admission to the major.

Behavioral Requirements

Behaviors which may result in non-acceptance into the major, field practicum, or withdrawal from the social work major may include, but are not limited to, the following:

1. Serious or repeated violation of the *NASW Code of Ethics and Standards of Practice*;
2. Violation of CSU-Pueblo's academic dishonesty policy or Student Code of Conduct;
3. Unprofessional social work conduct;
4. Demonstrated unwillingness or inability to use supervision;
5. Personal problems that seriously and consistently interfere with the conscious and professional use of self in a helping relationship;
6. Inability to accept appropriate evaluation from superiors or to modify one's professional behaviors as requested;
7. Inappropriate or disruptive behavior toward colleagues, faculty, staff or peers; and/or
8. Consistent failure to demonstrate interpersonal skills necessary to form effective professional relationships.

See student handbook for more information.

Electives

A minimum of 120 semester credit hours are required for the BSW degree. At least 40 hours must be taken in upper division (300-400 level) courses. Social work is exempt from obtaining a minor or 18 credits outside the major. Students may use elective courses to achieve the total credit hours required. Social work faculty advisers can assist in the selection of electives.

SOCIOLOGY/ANTHROPOLOGY/ SOCIAL SCIENCE DEPARTMENT
(Including Criminology)

Department Chair: S. Calhoun-Stuber

Faculty: Calhoun-Stuber, Gomme, Hackett, McGettigan, Messer

Mission Statement

The Department of Sociology, Anthropology and Social Science is committed to the principles of a liberal education. Our central objective is to teach and communicate the sociological and anthropological ways of viewing the world. The programs in sociology, sociology/criminology, anthropology, and social science are intended to increase the student's knowledge of social organization and social relationships and to assist students in developing skills in the processing, integration and utilization of knowledge, rather than its simple transfer. Our curriculum reflects the long-standing interest of our disciplines in examining the human condition and understanding stability and change in social life. The department prepares students to work in a wide variety of occupations or to pursue professional or graduate studies. Our mission is to produce graduates who are motivated and equipped to make meaningful contributions to the enhancement of the human condition.

The department's mission relates to the mission of the College of Humanities and Social Sciences in the following ways: (a) the department programs provide classroom environments that stimulate critical thinking and assist students to further develop critical thinking skills; (b) social action and responsibility, personal morality and accountability, and professional ethics are focused on throughout the curriculum in classes that examine the interplay between individual agency and social influence; (c) the broad disciplines within the department are committed to producing motivated and socially aware graduates equipped to make meaningful contributions within a diverse community and increasingly interdependent world.

SOCIOLOGY

Sociology is the study of human social behavior and is concerned with conditions such as crime and delinquency, family interaction and conflict, social inequality, social

change, and organizations in contemporary post-industrial society. Sociologists are interested not only in understanding social issues and institutions, but also in resolving social problems and improving social conditions for human populations. The insights gained from a sociological perspective include the ability to perceive the structures and patterns upon which everyday life rests, to understand the interaction between individual agency and social forces, to interpret events from diverse perspectives, and to examine existing social arrangements critically.

The sociology major prepares students to work in a wide variety of occupations, including education, government, business, industry and private human service agencies. Sociology graduates are employed in such areas as social research, health care, youth services, drug rehabilitation, law enforcement, corrections, probation, counseling, community advocacy, program development, policy analysis, and victim services. Students may earn a general sociology major, or they may specialize within the criminology emphasis area.

CRIMINOLOGY EMPHASIS

The criminology emphasis is designed to prepare students for careers or graduate programs in various criminal justice-related fields including law enforcement, investigations, victim advocacy, restorative justice, community corrections, institutional corrections, research, policy analysis, and court management and administration. Sociology/criminology majors are expected to gain the ability to understand and apply both sociological and criminological theories to an analysis of crime and deviance, juvenile delinquency, crime measurement, policy and the official response to crime in contemporary society. Courses offered in the emphasis area maintain a continual focus on ensuring respect for diversity and a commitment to social responsibility.

Since sociology and sociology/criminology graduates enter into a wide range of professional, administrative, policy-oriented, research, educational, human service, and other occupational areas, the sociology program seeks to create a learning environment that engages students in their own learning and within which students may liberate themselves from ideological and social conditions that limit human potential. Through the study of sociology, students gain skills that enhance their ability to assess new and unfamiliar situations, to select and apply a range of analytic techniques in solving problems in creative ways, and to communicate effectively.

Student Learning Outcomes

The student learning outcomes apply for both the BS and BA degrees in Sociology.

Upon completion of a BA or BS degree in Sociology (General Emphasis):

- Students will be able to comprehend and criticize the major theoretical perspectives that inform modern sociological thought. Specifically, students will be able to (a) show what these perspectives have in common and how they differ and (b) critique these different perspectives in terms of their explanatory strengths and weaknesses for purposes of understanding what each reveals and obscures about the subjects of sociological inquiry.
- Students will learn to apply a range of research methods in conjunction with sociological theory in order to explain and analyze complex social relations and organization. Specifically, students will be able to demonstrate that they can: (a) identify, define, and give examples of various methods used in sociological research on contemporary societies, and (b) recognize and interpret research methodologies used in sociological literature.
- Students will learn to apply social analysis to substantive social issues and problems, including such areas as race, gender, power, inequality, and globalization. Specifically, they will be able to apply sociological theories and methods in these substantive areas in order to understand social problems and inform social policy.
- Students will be able to engage in critical thinking about various aspects of social life and organization.

Upon completion of a BS or BA degree in Sociology (Criminology Emphasis):

- Students will be able to comprehend and criticize the major theoretical perspectives that inform modern sociological and criminological thought. Specifically, students will be able to: (a) show what these perspectives have in common and how they differ and (b) critique these different approaches in terms of their explanatory strengths and weaknesses for purposes of understanding what each reveals and what each obscures.
- Students will learn to apply a range of research methods in conjunction with sociological and criminological theory in order to explain and analyze complex social relations and organizations. Specifically, students will be able to demonstrate that they can: (a) identify, define, and give examples of various methods used in sociological and criminological research on contemporary societies, and (b) recognize and interpret research methodologies used in sociological and crime and deviance literature.
- Students will learn to apply social analysis to substantive social issues and problems, emphasizing crime and deviance, but also including race, gender, inequality, power, and globalization. Specifically, they will be able to apply sociological and criminological

theories and methods to these substantive areas in order to understand social problems, in particular crime and deviance, and inform crime-related social policy.

- Students will be able to engage in critical thinking about various aspects of social life and organization, including crime and criminal justice institutions.

Outcomes Assessment Activities

The primary method of assessment for the Sociology program is the Major Field Test (MFT). Developed by the Educational Testing Services, this standardized testing instrument assesses student capacities in a number of critical areas of sociology: general theory, methodology and statistics, deviance and social problems, demography and urban/rural community, multiculturalism, social institutions, social psychology, gender, and globalization. It also assesses two additional learning capacities: core sociology and critical thinking.

MFTs are completed annually by a sample of graduating seniors. Test outcomes are compared to those of other students at other American universities in order to identify the sociology program's strengths and weaknesses. The results of these assessment processes are used to improve the program and further enhance student learning.

A secondary method of assessment for the Sociology program comprises a customer satisfaction survey distributed to all graduating seniors. Respondents report their qualitative perceptions of the adequacy of customer services (teaching, advising, learning supports, internships, etc.), the degree of learning, skill acquisition, discipline mastery, and the sufficiency of vocational training. Survey results are used to bolster customer service initiatives and to strengthen curricular delivery systems.

A sociology major leads to either a Bachelor of Arts (BA) or a Bachelor of Science (BS) degree.

Requirements for a Bachelor of Science Degree in Sociology or Sociology/Criminology

Students must complete all the major degree requirements. The Bachelor of Science degree is designed for those pursuing an applied, career-oriented program and for those interested in pursuing graduate studies in criminal justice or applied sociology programs.

Requirements for a Bachelor of Arts Degree in Sociology or Sociology/Criminology

Students must complete all the major degree requirements. In addition, students must complete the foreign language requirement as specified in the Academic Policies section of the University Catalog. This requirement specifies that the student complete one of the following three options: (a) the second level of a foreign language, (b) completion of FL 100 and ANTHR/ENG 106, or (c) completion of the first and second level of American Sign Language. The BA degree in Sociology or Sociology/Criminology is appropriate for students interested in pursuing graduate studies in sociology or criminology programs or who plan to attend law school.

Major Requirements

- Successful completion of the sociology core;
- Successful completion of the general or the criminology emphasis areas;
- No grade below a C in sociology courses is acceptable for the major or the minor; and
- Completion of at least 36 credit hours in approved sociology courses.

Specific Requirements for the Sociology Major

CORE

SOC Courses		Titles	Credits
SOC	101	Introduction to Sociology	3
SOC	301	Sociological Methods	3
SOC/ANTHR	310	Social & Cultural Theory	3
			TOTAL 9

General Emphasis

Students will complete the above core (9 hours) and then will select at least 27 additional credit hours of sociology courses, which may include six hours from anthropology. Courses must be approved by the adviser. At least 12 hours must be upper-division courses (300- 400 level).

Criminology Emphasis

Students will complete the three (above) core sociology courses plus three (below) criminology core courses. Further, they will complete 18 hours (six courses) of criminology electives.

Criminology electives are indicated by * in the list of all sociology courses below:

Criminology Core Courses: (9 hours)

SOC Courses		Titles	Credits
SOC	203	Criminal Justice System	3
SOC	303	Crime and Deviance	3
SOC	306	Delinquency & Juvenile Justice	3

Sociology Courses (*indicates criminology elective)

SOC Courses		Titles
SOC/POLSC/PSYCH/WS		
	105	Understanding Human Diversity
SOC	155	Minority and Ethnic Relations*
SOC	201	Social Problems*
SOC	203	Criminal Justice System
SOC	206	Gender & Society
SOC/ANTHR	212	The Forensics of Bones*
SOC/PSYCH/WS		
	231	Marriage & Family Relationships
SOC	248	Environmental Sociology
SOC/ANTHR	250	The Sacred in Culture
SOC	302	Collective Behavior and Social Movements*
SOC	303	Crime and Deviance
SOC/WS	305	Crime and Women*
SOC	306	Delinquency & Juvenile Justice
SOC	308	Popular Culture*
SOC	304	Race and Crime*
SOC/PSYCH	352	Social Psychology
SOC	353	Penology*
SOC	354	Urban Sociology*
SOC	355	Political Sociology*
SOC	356	Social Stratification*
SOC	358	Film & Society
SOC	359	Community Corrections*
SOC	374	Crime in Film*
SOC/ANTHR	401	Health, Culture, & Society
SOC/ANTHR	402	Aging, Culture, & Society
SOC/WS	403	Human Sexuality and Social Behavior
SOC	404	Poverty*
SOC	405	Law and Society*
SOC/WS	407	Family Violence*
SOC	408	Science, Technology, & the Future*
SOC	409	Victimology*
SOC	410	Structural & Elite Crime*
SOC	411	Police and Society*
SOC	413	Patterns of Homicide*
SOC	414	Serial Murder *
SOC	415	Forensic Criminology*
SOC/ANTHR	416	Crime & the Mind*
SOC	417	Forensics & Homicide Investigations*
SOC	418	Crime, Drugs and Social Policy*
SOC	419	Vice Crime*
SOC	420	Explaining Crime*
SOC	421	Homicide, Courts & Corrections*
SOC	422	Terrorism and Mass Murder*
SOC	424	Organized Crime*
SOC	425	Gangs in Contemporary America*
SOC	426	Violence and Rioting*
SOC/HIST/WS	428	Women and Work
SOC	431	Work in Modern America*
SOC	432	Organization Theory*
SOC	440	Correctional Administration*
SOC	448	Emotions in American Culture
SOC	450	Soc of Mental Health and Suicide*
SOC/ANTHR	451	Culture, Deviance, & Psychopathology*
SOC/ANTHR	452	Self and Society
SOC/WS	455	Hate Crimes*
SOC	491	Special Topics (see adviser)
SOC/ANTHR	492	Research Methods
SOC	494	Field Experience (see adviser)
SOC	495	Independent Study

Specific Requirements for the Sociology Minor

Minors in sociology require a minimum of 20 semester hours, of which six hours must be upper division. SOC 101 is required. No grades below C are accepted toward the minor.

Co-Curricular Requirements

Generally there are no co-curricular requirements, although students with an emphasis in criminology are encouraged to complete an internship in a criminal justice agency or program.

ANTHROPOLOGY

The anthropology minor provides students with an informed understanding of the cultural diversity evident in human societies and the concepts by which anthropologists explain cultural dynamics. The program emphasizes a holistic awareness of the relationships of all the parts of social and cultural systems. The program prepares students to understand anthropological methods and theories and to apply them to life experiences.

Program Mission

The Anthropology program complements the mission of the Department and the College through focusing on analysis of the relationship among psychology, culture, and society within a cross-cultural context and emphasizing the features and consequences of human evolution. The mission of the Anthropology minor is to provide students with an understanding of the nature and adaptive role of cultural diversity in contemporary society and throughout the history of human development. A corollary of this mission is helping our students see the relevance of anthropological methods and knowledge in different contexts and different stages of their lives as individuals and citizens. We strive to provide students with intellectual tools that can help them think critically about human behavior, cultural development, and social organization while preparing them to apply this disciplinary knowledge in their personal and professional lives.

Anthropology minors acquire a systematic exposure to cross-cultural contexts, psychocultural aspects of human group life, and critical evolutionary concerns. Students

who successfully complete the minor will be able to understand and apply basic anthropological concepts and formulate reasonable arguments related to questions addressed by the discipline at large – such as the past, present, and future of human cultural diversity; the nature of human biological, psychological, and social evolution; and the evolutionary basis of human behavior.

Program Goals and Objectives

- Provide students with background in the concepts and bodies of knowledge used and produced by anthropologists so students will learn the basic core concepts of anthropology and cite factual evidence to support their arguments on major topics under debate in the discipline.
- Provide students with training on the application of anthropological theory and method, enabling students to demonstrate knowledge of history and contemporary trends in anthropological theory, and the ability to apply theoretical approaches to concrete problems.
- Prepare students to apply anthropological concepts to real world problems and effectively communicate results and to increase students' abilities to think and write critically about anthropological concepts.

Student Learning Outcomes

Upon completion of the Anthropology program

- Regarding cultural diversity – The student should be able to accurately recognize and describe a range of different cultures based on ethnographic data from a variety of sources, including documentary films, scholarly articles, and books.
- Regarding familiarity with psychological terms and dynamics – The student should be able to accurately apply psychological concepts to human sociocultural behavior and to identify the developmental experiences that produce the psychological processes so labeled (e.g., psychological defense mechanisms or psychosomatic symptoms).
- Regarding sociocultural processes – The student should be able to accurately apply anthropological concepts to identify group processes and properly describe them in specific group and ecological settings (e.g., scapegoating or political authority). Students will effectively communicate how to utilize anthropological knowledge to analyze and solve practical problems.
- Regarding the consequences of human evolution – The student should be able to cite accurately the archaeological evidence for, and the consequences of, the evolution of the human species. This includes describing and recognizing: (1) the mental, anatomical, ecological, and social changes that led to the appearance of modern humans, and (2) the theoretical principles of evolution that justify

inferences about the changes (e.g., identify a Homo erectus cranium or describe punctuated equilibrium).

- Regarding the ideology of political economy in human history – The student should be able to recognize and describe the various stages of power and its control of goods and services as manifested in the history of human groups (e.g., distinctions among band, tribe, chiefdom, and state). Students will illustrate key terms, concepts, and forms of argumentation used in anthropological discourse and evaluate their validity in examining human behavior and social systems.

Outcomes Assessment Activities

Assessment of the Anthropology minor is the responsibility of the program faculty.

Anthropology minors' performance on each of the program's student learning outcomes will be assessed on a 2-3 cycle. Assessment results will be used to identify program strengths and to discern areas needing improvement to enhance student performance in relation to the student learning outcomes.

Specific Requirements for the Anthropology Minor

The minor consists of 21 semester hours of anthropology courses; ANTHR 100 is required, and six hours must be upper division. The rest of the courses may be based upon the student's interest. No grades below C are accepted toward the minor.

SOCIAL SCIENCE PROGRAM
(Offered through Extended Studies only)

The interdisciplinary major in social science (offered only through Extended Studies) leads to the degrees of Bachelor of Arts (BA) and Bachelor of Science (BS).

Social scientists study people and social institutions, especially the relationships and impacts they have with and on each other. Research in the social sciences provides insights that help in understanding the ways in which individuals and groups make decisions, exercise power or respond to change. Social scientists gather and analyze data, interpret it and make it meaningful and useful for application in dealing with human problems.

Employment has traditionally been in the academic area; however, as the economy continually changes from an industrial to a service-oriented system, a greater need for "people-oriented" specialists is developing. Job opportunities in applied fields include areas such as program management and administration, residential counseling, service supervision, human services and sales and related work -- in both the public and private sectors.

Related careers are: teaching, corrections/ criminology, social and educational administration, law and mass communications.

Program Mission

A major in social science provides the framework for supporting an innovative, multidisciplinary study of people and social institutions, from both historical and contemporary perspectives, focusing on the relationships and impacts they have with and on each other.

The program's core curriculum embodies the multidisciplinary nature of a social science degree. The Social Science Program is designed around the idea that the boundaries between disciplines form ground for creative and innovative research and knowledge. The program's structure allows self-directed students to design an individualized program of study that rests on a core foundation and complements their academic, professional and personal goals. Students are challenged to engage in intellectual exploration and responsible educational innovation. The curriculum draws on established bodies of thought in the social sciences to address questions and issues relevant in a rapidly changing environment. The multidisciplinary core of the social science program provides the conceptual framework within which students gain an appreciation of multiple perspectives while developing skills in the processing, integration, and utilization of knowledge. The social science program prepares its students to function as knowledgeable, responsible and engaged citizens with a comprehensive understanding of modern social, political, and economic institutions. Through the study of social science, students learn about human adaptation, institutional conflict, and social change, preparing them for careers in a rapidly changing, global economy. The social science programs' curricula are designed to provide students with a fundamental understanding of the major disciplinary approaches to the study of social life, including anthropology, economics, geography, history, political science, and sociology. Students are expected to be able to demonstrate the ability to recognize the interconnections between the different disciplines within the major as well as develop an understanding of the unique perspective each offers.

These skills enhance the student's ability to assess new and unfamiliar situations, to select and apply qualitative or quantitative techniques in solving practical problems in creative ways, and to communicate effectively. The program promotes critical inquiry, cultural and self-awareness, and the examination of ethical issues in order to prepare students to be productive professionals. The multidisciplinary curriculum engages students with an educational framework that enriches their personal lives and provides a foundation for socially responsible citizenship.

Program Goals and Objectives

To prepare graduates with a major in the discipline to be able to:

- Demonstrate the ability to recognize the interconnection between the different disciplines within the major.
- Demonstrate the ability to integrate and apply the theoretical perspectives and research methods from cultural anthropology, history, political science, economics, geography, and sociology.
- Demonstrate the ability to continue to develop an understanding of cultural diversity and self-awareness.

Student Learning Outcomes

Upon completion of the social science degree will:

Think critically, such that the student will be able to:

- Define theory and describe its role in building social science knowledge.
- Compare and contrast foundational theories and essential perspectives and their underlying assumptions in the core social science disciplines.
- Explain how theories and perspectives reflect the historical context of times and cultures in which they were developed.
- Select one or more basic theoretical orientations or perspectives and apply them to a current or historical event or series of events.
- Differentiate key cultural, economic, political, and social phenomena that influence individuals and social structures and illustrate their impacts, both historically and currently.

Demonstrate an understanding of the role of evidence and qualitative and quantitative methods in the social sciences, such that the student will be able to:

- Distinguish between qualitative and quantitative methods, critically assess research publications, and explain how studies can be modified or improved.
- Identify basis methodological approaches and describe the ways in which various methods contribute to cumulative social science knowledge.
- Compare the strengths and weaknesses of each discipline's methodology in analyzing cultural, economic, social, and political problems and developing solutions.

Communicate effectively, such that the student will be able to:

- Express oneself in a clear and coherent manner in writing.
- Express oneself in a clear and coherent manner in oral presentation.

Demonstrate self awareness, cultural competence and social action, as well as an appreciation of multiple perspectives, such that the student will be able to:

- Show how patterns of thought and knowledge, including one's own, are directly influenced by culture, history, geography, and economic, political and social structures.
- Compare and contrast micro and macro perspectives and illustrate how each explains the status and experiences, past and present, of minority or marginalized groups.
- Interpret how historical and social contexts create diverse groups and identities and shape the role of the individual within society and human relations across cultures.

Relation to Program Mission: Promoting self awareness, cultural competence, and social act ion enriches students' personal lives and provides a foundation for socially responsible citizenship. Through the study of micro and macro perspectives students comprehend the significance and implications of socially situated identities and foster in others an appreciation of diverse human experiences.

Outcomes Assessment Activities

Assessment of the Social Science program is the responsibility of Social Science program faculty. The Social Science program is offered only through the Extended Studies Independent Study program.

A central file of course syllabi with representative assignments is maintained in the Extended Studies Office for inspection by faculty. A faculty adviser monitors each student's progress toward completing major requirements listed in the catalog.

The faculty of the Social Science program use a variety of methods for evaluating the student learning outcomes. These include the following direct measures of student learning: major papers written for courses in the discipline and proctored exams. An indirect method of assessment for the Social Science program consists of a student satisfaction survey distributed to graduating seniors each year.

General Requirements

- No grade below C is acceptable in the major or minor.

Specific Requirements for the Social Science Major

General Track Credits

Social Science Core

Courses		Titles	Credits
ANTHR	100	Cultural Anthropology	3
ECON	201	Principles of Macroeconomics	3
GEOG	103	World Regional Geography	3
HIST	103	World Civilization since 1800	3
HIST	202	US History II	3
POLSC	101	American National Politics	3
SOC	101	Introduction to Sociology	3

SUB-TOTAL 21

Social Science Electives (Upper Division) 15

TOTAL 36

Specific Requirements for the Social Science Minor

- Completion of 21 semester hours of credit in Social Science courses: Anthropology Economics, Geography, History, Political Science, Psychology, Sociology. Six hours must be upper division.

WOMEN'S STUDIES

Mission

The Women's Studies program exists to offer students a different perspective for understanding their disciplines, themselves, and others. Based on feminist theory, this perspective incorporates issues of race, ethnicity, class, sexuality, and other dimensions of human diversity.

Student Learning Outcomes

Students will be able to:

- Demonstrate a working knowledge of women's participation in, contribution to, and transformation of areas of social life including culture, society, politics, economics, and religion.
- Demonstrate a working knowledge of institutionalized discrimination and violence based on gender.
- Demonstrate a critical understanding of gender from national and global perspectives.

- Demonstrate and apply the basic concepts, theories and methods in gender studies in national and global contexts.

Outcome Assessment Activities

- An annual review of student capstone projects is conducted to evaluate the program's goals and student learning outcomes.

Specific Requirements for the Women's Studies Minor

Courses		Titles	Credits
WS	100	Introduction to Women's Studies	3

Must take **two** of the following courses 6

WS	301	Theories of Gender, Race, and Class	
WS/CS	306	La Chicana	
WS/CS	401	Third World Feminisms	

Senior Capstone Experience (WS 485) or one of
the following for 3 credits 3

WS	490	Special Projects	
WS	492	Research	
WS	494	Field Experience	
WS	498	Internship	

Women's Studies Electives 9

TOTAL   21

WS Electives:

Courses		Titles	Credits
WS/SOC	206	Gender and Society	3
WS/PSYCH	211	Women and Society	3
WS/PSYCH	212	Psychology of Diversity	3
WS/NSG	230	Women, Health, and Society	3
WS/PSYCH/SOC	231	Marriage, Family, and Relationships	3
WS/MCCNM	235	Women and Media	3
WS/ENG	241	Women in Literature	3
WS	301	Theories of Gender, Race, and Class	3
WS/SOC	305	Crime and Women	3
WS/CS	306	La Chicana	3
WS/MCCNM	330	Gender and Film	3
WS/ENG/COMR	335	Gender and Communication	3
WS/CS	341	Chicana Writers	3
WS/CS	401	Third World Feminisms	3
WS/SOC	403	Human Sexuality and Social Behavior	3
WS/SOC	407	Family Violence	3
WS/HIST/SOC	428	Women & Work	3
WS/SOC	455	Hate Crimes	3
WS	485	Capstone	3

WS	490	Special Projects	2-6 Var
WS	291/491	Special Topics (topics vary)	3
WS	492	Research	2-6 Var
WS	494	Field Experience	2-6 Var
WS	498	Internship	2-6 Var

Cross Listing

Most Women's Studies courses are cross-listed, meaning that the courses can be found in the course listings of both the Women's Studies program and one or more other departments. This is indicated above, for example, as "WS/PSYCH 212, Psychology of Diversity," indicating that the course is listed as both a Women's Studies course and a Psychology course. The courses can be taken by enrolling in either a Women's Studies call number or in another department's call number. To encourage breadth, students are required to choose electives in different cross-listed disciplines, with no more than two of their electives being cross-listed in the same department (for example, Psychology). A course taken for the Senior Capstone Experience may not be cross-listed. Grades below a C will not be accepted in classes counting toward the minor.

Senior Capstone Experience
(WS 485, WS 490, 492, 494, or 498)

The Senior Capstone Experience allows the student to bring together women's studies disciplinary knowledge with 1) the major; 2) some other disciplinary perspective; or 3) a practical problem. The expectation is that in taking WS 490, 494, or 498 for the senior experience, the student will apply women's studies in a community-based setting. In certain cases, if the student's proposal is to combine the WS minor with the major, and the best option for that major is a 492 research project, the 492 may be approved, but only with the condition that the student presents the research in a public forum to meet the practical application component.

Senior Capstone Experience Prerequisites

The Senior Capstone Experience will be open to students who have declared a WS minor, and have completed all the core requirements, i.e. WS 100 and two of the following (WS 301, WS/CS 306, WS/CS 401). Note: it is preferred that this capstone experience be taken in the senior year, after all other WS minor requirements have been met.

Advising

Student should contact the Women's Studies Coordinator by calling 549-2873.

COLLEGE OF SCIENCE AND MATHEMATICS

Dr. David Lehmpuhl, Dean

Academic Departments

Biology

Majors: Biology (BS)
          Emphasis Areas:
             Biology Secondary Certification
             Biomedical Science
                Tracks
                   Pre-Chiropractic
                   Pre-Dental
                   Pre-Medical
                   Pre Medical Laboratory
                   Pre-Occupational Therapy
                   Pre-Pharmacy
                   Pre-Physical Therapy
                   Pre-Physician Assistant
                   Pre-Veterinary
             Cellular and Molecular Biosciences
             Environmental Biosciences
                Tracks
                   Pre-Ecology
                   Pre-Forestry/Wildlife
          Biology (MS)
          Biochemistry (MS)

Minors: Biology
         Professional Biology

Chemistry

Majors: Chemistry (BS)
          Emphasis Areas:
             ACS Certified
             Biochemistry
             Pre-Medicine
             Pre-Pharmacy
             Pre-Veterinary
             Secondary Teaching Certification
          Chemistry (MS)
          Biochemistry (MS)

Minor: Chemistry

Mathematics and Physics

Majors: Mathematics (BA, BS)
          Emphasis Area:
             Secondary Certification
          Physics (BS)
           Emphasis Areas:
             Biophysics
             Chemical
             Engineering
             Physical Science Secondary Certification
             Physics Secondary Certification
Minors: Computational Mathematics
         Mathematics
         Physical Science
         Physics

Mission

The College of Science and Mathematics (CSM) offers quality, competitive Bachelor's and Master's degree programs that prepare graduates for success in professional and graduate programs and for careers in the biological and physical sciences and mathematics. The College also supports a strong general education program by providing core curricula in science and mathematics, for students pursuing careers in the health and environmental sciences, engineering, technology, and teacher education. The CSM provides advanced learning opportunities for students via faculty mentored research projects and internships that promote the discovery of new information and the application of new knowledge. The CSM supports the community, region and related professions through outreach including initiatives that enhance economic development, scientific literacy, and K-12 education.

The College offers BS degree programs in biology, chemistry, mathematics, and physics, and a BA in mathematics. The BS in chemistry is certified by the American Chemical Society (ACS). The College also offers graduate programs in natural sciences with MS degrees in biochemistry, biology, and chemistry that can be obtained separately or along with the Bachelor's degree in a combined five-year, 3+2 program.

Departments of biology, chemistry, and mathematics/ physics provide versatile major programs with select emphasis areas and minors characterized by appropriate solid fundamental science and mathematics curricula, coupled with specialized and often interdisciplinary courses. Emphasis areas within major programs and minors provide preparation for future careers in areas as diverse as medicine, pharmacy, teaching (certification for elementary and secondary), environmental health and technology, computational mathematics, biophysics, bioinformatics, and many others.

In addition to offering a modern and career-oriented curriculum, academic programs provide opportunities for faculty-directed undergraduate and master-level research, and internships with local companies, government laboratories and agencies. These experiences are critical to applied student learning and significantly enhance the success of graduates in gaining employment and acceptance into graduate and professional programs at the regional, state and national levels.

Academic programs in the College are housed in three buildings, totaling over 149,000 gross square feet including a technology enhanced infrastructure to deliver state-of-the-art instruction in both lecture and laboratory environments. Programs incorporate use of an impressive

collection of advanced instrumentation, equipment, and software in the curriculum, providing graduates advanced skills and a competitive edge within respective professions in our modern and technologically advanced society.

MASTERS DEGREE IN BIOLOGY 3+2 PLAN (BS/MS)

A feature of the Biology MS program is the 3+2 plan which gives qualified advanced-level undergraduate students the opportunity to simultaneously pursue both the Baccalaureate (BS) and Master of Science (MS) degrees. With this plan, students are moved quickly toward expanding their academic and scientific horizons based on the student's abilities and personal motivation. Students in the 3+2 plan are expected to successfully complete the requirements for both the BS and MS degrees by the end of their fifth year in college. Students are simultaneously awarded both the BS and MS degrees in five years, thus shortening the normal time to receive both degrees from six years to five years. They must apply and be admitted into the Biology MS program by the Spring semester of their junior year (preferred) or by the start of the Fall semester of the senior year and meet the course requirements listed below. Students applying to the 3+2 plan must have a minimum 3.0 overall GPA and a minimum 3.25 GPA in their biology coursework.

The application file for admission to the 3+2 plan must include:

1. A completed Biology MS application form;
2. A CSU-Pueblo transcript;
3. Two letters of recommendation from CSU-Pueblo faculty;
4. A statement of research interests; and
5. Satisfactory combined GRE scores above 300 (students may be admitted into the 3+2 program before taking the GRE; however, they must submit satisfactory GRE scores by the last day of finals at the end of their first semester in the 3+2 Biology MS program to remain in the program).

Before being admitted to the 3+2 plan, students are expected to have completed or be enrolled in the following course work.

Courses		Titles
BIOL	301/L	General Microbiology + Lab
BIOL	350	Mendelian and Population Genetics
BIOL	351	Molecular Biology and Genetics
CHEM	302/L	Organic Chemistry II + Lab
PHYS	202/L	Principles of Physics II + Lab
MATH	156	Introductions to Statistics
		OR
MATH	221	Applied Calculus: An Intuitive Approach

BIOLOGY DEPARTMENT

Department Chair: Brian Vanden Heuvel

Faculty: D. Caprioglio, H. Caprioglio, Diawara, Gabaldón, Martinez, Smith, Steel

The major in biology leads to a Bachelor of Science (BS) Degree. The biology major is sufficiently flexible for students to prepare for a wide variety of professional careers. Carefully supervised career planning is a fundamental strength of the program.

The student majoring in biology may plan to enter the workplace upon graduation or continue study in graduate or professional school. Biomedical Sciences emphasis encompasses prep for pre-professional programs including: pre-chiropractic, pre-optometry, pre-physical therapy, pre-occupational therapy, pre-pharmacy, pre-physician assistant, pre-podiatric medicine, pre-veterinary medicine, pre-dentistry, pre-medicine or pre-osteopathic medicine. Frequently, pre-professional study involves a combination of majors or a major and minor. For example, many pre-medical students choose a double major in biology and chemistry.

Each of the pre-professional programs has an adviser who can provide detailed and current information about the undergraduate work which the student should pursue to provide the foundation necessary for later entry into a professional school. The student should contact the specialized adviser as early as possible. A list of advisers is available in the departmental office (LS 210).

Biology majors also may seek teacher certification at the secondary level. Interested students may obtain a written description of specific degree requirements from the appropriate education and biology advisers. Biology students who are considering attending graduate school should take one year of a foreign language and should plan to take the Graduate Record Examination during the senior year.

The biology department offers several emphasis areas:

*   Basic Biology
*   Biomedical Science
    Tracks
        Pre-Chiropractic
        Pre-Dental
        Pre-Medical
            (including Osteopathic, Podiatric and Optometric)
        Pre-Medical Laboratory Science
        Pre-Occupational Therapy
        Pre-Pharmacy
        Pre-Physical Therapy

Pre-Physician Assistant
Pre-Veterinary Medicine track

- Environmental Biosciences
  Tracks
  Pre-Ecology
  Pre-Forestry/Wildlife
- Cellular and Molecular Biosciences
  (Including Forensics & Bioinformatics)
- Biology/Chemistry Double Major
- Biology Secondary Certification

Department Goals

- To prepare students to become productive, accountable and responsible employees upon entering the work force;
- To prepare students to enter and succeed in graduate or professional schools;
- To develop in students a broad-based theoretical foundation supplemented by laboratory and field experience that allow individual observations, interpretations and applications; and
- To allow those students seeking a minor in biology to supplement and strengthen the major field of study.

Expected Student Outcomes

- Students will develop a broad-based knowledge of concepts and terminology in molecular, cellular, organismal, and ecological biology.
- Students will develop a supporting knowledge of concepts and terminology in the related fields of mathematics, physics, and chemistry.
- Students will develop skills in reading and interpreting the scientific literature and in presenting a synthesis of it accurately in oral and written form.
- Students will demonstrate critical thinking and problem solving skills using experimental design and the scientific method.
- Students will evaluate the scientific validity of information and ideas.

Outcomes Assessment Activities

Assessment of students' improvement in intellectual skills, knowledge and capacities from entrance to graduation will be accomplished through the use of several tools. Exams and course assignments will be used as one measure of the student's proficiency in writing skills, acquisition of knowledge, communication, problem solving and laboratory skills. All majors will take a Senior Seminar that requires scientific literature interpretation along with oral and written presentations evaluated by peers and department faculty. Seniors will also take the Biology Major Field Test, which measures Colorado State University-Pueblo students' content knowledge and analytical skills against national norms.

General Requirements

- Students majoring in biology must receive a grade of C or better (2.000) in all core biology courses.
- Students graduating with a BS in biology must have at least a cumulative GPA of 2.000 in the major area. A cumulative GPA of 2.600 in the major area is required for admission to the teacher education program.
- Transfer students are required to earn a minimum of 15 semester credit hours in approved Biology upper division courses from CSU-Pueblo, including BIOL 493 (Seminar), for graduation with a BS degree in Biology.
- Students majoring in biology must demonstrate computer literacy. This can be met by CIS 100, CIS 103 and CIS 104 courses.
- Graduates are encouraged to complete a minor outside the biology department.

Core Requirements for the Biology Major

BIOL Courses		Titles	Credits
BIOL	171	First Year Seminar	1
BIOL	181/L	College Biology I/Organismal Bio/Lab	4
BIOL	182/L	College Biology II/Cellular Bio/Lab	4
BIOL	201/L	Botany/Lab OR	
BIOL	202/L	Zoology/Lab	4
BIOL	301/L	General Microbiology/Lab	5
BIOL	350	Mendelian & Population Genetics	2
BIOL	351	Molecular Biology and Genetics	2
BIOL	352	Evolutionary Biology and Ecology	3
BIOL	412/L	Cellular Biology/Lab OR	
BIOL	413/L	Plant Physiology/Lab OR	
BIOL	414/L	Vertebrate Physiology/Lab	4
BIOL	493	Seminar	1

TOTAL 30

- ### *Basic Biology Emphasis*

Required Biology Core Courses 30
Adviser-Approved Upper Division Biology
Electives 15

TOTAL 45

Required Support Courses

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
CHEM	301/L	Organic Chemistry I/Lab	5
CHEM	302/L	Organic Chemistry II/Lab	5
MATH	156	Introduction to Statistics	3

MATH	221	Applied Calculus: An Intuitive Approach	4
PHYS	201/L	Principles of Physics I/Lab AND	
PHYS	202/L	Principles of Physics II/Lab	8
		OR	
PHYS	221/L	General Physics I/Lab AND	
PHYS	222/L	General Physics II/Lab	10
COMR	103	Speaking and Listening (H)	3

TOTAL 38-40

Institutional and General Education 21
General Electives 14-16

Total credit hours 120

- *Biomedical Sciences Emphasis*

This emphasis includes pre-professional programs: Chiropractic, Dental, Medical, Medical Laboratory Science, Occupational Therapy, Optometric, Pharmacy, Physical Therapy, Physician Assistant, and Veterinary Medicine.

See Basic Biology Emphasis above and consult with academic adviser for other requirements. Electives vary with professional area.

Students seeking to major in Nutrition can complete five terms of coursework at CSU-Pueblo. Articulation agreements are in place for transfer to undergraduate programs in Nutrition.

- *Environmental Biosciences Emphasis*

This emphasis includes Pre-Ecology and Pre-Forestry/wildlife.

Basic Biology Emphasis above with these required electives:

BIOL Courses	Titles	Credits
Biology Required Core with BIOL 201/L and 202/L		34
Approved Upper Division Biology Electives		11

Upper Division Biology Electives must include:

At least **two** Ecology/Environmental courses from the following list: .... 7-8 credits

BIOL	443/L	Limnology/Lab	4
BIOL	453/L	Ecology/Lab	4
BIOL	454	Behavioral Ecology	3
BIOL	461	Applied Geospatial Technology (GIS/GPS)	3

BIOL	462	Environmental Management	3
BIOL	465	Environmental Toxicology	3
BIOL	486	Field Botany	3

At least **one** Taxonomy course from the following list .... 3-4 credits

BIOL	479/L	Ichthyology/Lab	3
BIOL	481/L	Entomology/Lab	3
BIOL	483/L	Mammalogy/Lab	3
BIOL	484/L	Ornithology/Lab	3
BIOL	485/L	Plant Taxonomy/Lab	4

TOTAL 45

Consult with academic adviser for other requirements, which vary with emphasis.

- *Cellular and Molecular Biosciences Emphasis*

This emphasis includes Cellular & Molecular, Bioinformatics, and Medical Technology. Also prepares students for careers in forensics. Consult with academic adviser for specific requirements.

Cellular and Molecular

Basic Biology Emphasis with the following required courses:

Courses		Titles	Credits
Biology required core with BIOL 412/L			30
BIOL	351L	Advanced Genetics & Molecular Biology Lab	2
CHEM	311	Survey of Biochemistry OR	
CHEM	411	Biochemistry I	3
Adviser approved Upper Division Biology Electives			10

TOTAL 45

Required Support Courses

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
CHEM	301/L	Organic Chemistry I/Lab	5
CHEM	302/L	Organic Chemistry II/Lab	5
CHEM	412/L	Biochemistry II/Lab	5
CIS	171	Introduction to Java Programming	4
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
MATH	256	Probability for Engineers & Scientists	3
MATH	356	Statistics for Engineers & Scientists	3
PHYS	201/L	Principles of Physics I/Lab AND	
PHYS	202/L	Principles of Physics II/Lab	8

OR

PHYS	221/L	General Physics I/Lab	
		AND	
PHYS	222/L	General Physics II/Lab	10
COMR	103	Speaking and Listening (H)	3

TOTAL 56-58

Institutional and General Education 21

Total credit hours..122-124

- *Biology/Chemistry Double Major Emphasis*

Courses	Titles	Credits
Required Biology core with BIOL 493 or		
CHEM 493, Seminar		30
Adviser Approved Biology electives		10

TOTAL 40

Required Support Courses

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
PHYS	201/L	Principles of Physics I/Lab	
		AND	
PHYS	202/L	Principles of Physics II/Lab	8
		OR	
PHYS	221/L	General Physics I/Lab	
		AND	
PHYS	222/L	General Physics II/Lab	10
COMR	103	Speaking and Listening (H)	3

TOTAL 21-23

Chemistry Core

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
CHEM	221/L	Inorganic Chemistry/Lab	4
CHEM	301/L	Organic Chemistry I/Lab	5
CHEM	302/L	Organic Chemistry II/Lab	5
CHEM	317/L	Quantitative Analysis/Lab	5
CHEM	321	Physical Chemistry I	3
CHEM	322	Physical Chemistry II	3
CHEM	419/L	Instrumental Analysis/Lab	5

TOTAL 40

Institutional and General Education 21

Total credit hours..122-124

- *Biology Secondary Certification Emphasis*

Courses		Titles	Credits
BIOL	181/L	College Biology I/Organismal Bio/Lab	4
BIOL	182/L	College Biology II/Cellular Bio/Lab	4
BIOL	201/L	Botany/Lab	
		OR	
BIOL	202/L	Zoology/Lab	4
BIOL	350	Mendelian & Population Genetics	2
BIOL	351	Molecular Biology and Genetics	2
BIOL	206/L	Intro to Microbiology/Lab	
		OR	
BIOL	301/L	General Microbiology/Lab	4-5
BIOL	223/L	Human Physiology & Anatomy I/Lab	
		OR	
BIOL	224/L	Human Physiology & Anatomy II/Lab	
		OR	
BIOL	414/L	Vertebrate Physiology/Lab	4
BIOL	352	Evolutionary Biology and Ecology	3
BIOL	378	Laboratory in Teaching Biology	1
Biology	Upper Division Field Elective/Lab		3-4
Approved Biology Upper Division Elective/Lab			3
BIOL	493	Seminar	1
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
CHEM	211/L	Intro to Organic Chemistry/Lab	
		OR	
CHEM	301/L	Organic Chemistry I/Lab	4-5
GEOL	101/L	Earth Science/Lab	4
MATH	221	Applied Calculus: An Intuitive Approach	4
PHYS	201/L	Principles of Physics I/Lab	4
PHYS	202/L	Principles of Physics II/Lab	4

TOTAL 65-68

Education Minor 34

Institutional and General Education to
include the following courses: 24

PSYCH	151	Human Development	
		OR	
PSYCH	251	Childhood and Adolescence	
COMR	103	Speaking and Listening	
		(grade of B or better required)	

Total credit hours..123-126

- *Elementary Teaching*

See Liberal Studies with Science Emphasis

Institutional and General Education

Please refer to the General Education Requirements in the *Academic Policies* section of this catalog or refer to your individual department's curriculum sheet.

Specific Requirements for the Professional Biology Minor

Courses		Titles	Credits
BIOL	181/L	College Biology I/Organismal Bio/Lab	4
BIOL	182/L	College Biology II/Cellular Bio/Lab	4
Approved Biology Electives			2
Approved Upper-division Electives			10

TOTAL   20

Specific Requirements for the General Biology Minor

Approved Lower-division Electives	12
Approved Upper-division Electives	8

TOTAL   20

Experiential Opportunities

There are many opportunities to participate in experiences that will complement and reinforce a student's academic experience. The activities may be either on- or off-campus and may be used to develop leadership and interpersonal skills. The faculty of the biology department actively encourages student participation in such activities.

MASTERS DEGREE IN CHEMISTRY 3+2 PLAN (BS/MS)

A feature of the Chemistry MS program is the 3+2 plan. This plan gives qualified undergraduate students the opportunity to simultaneously pursue both the Baccalaureate (BS) and Master of Science (MS) degrees. Talented students are thus quickly moved toward expanding their academic and scientific horizons based on individual student's abilities and motivation.

Students in the 3+2 program are expected to successfully complete the requirements for both the BS and MS degree in five academic years. This is shorter than the typical six years that are necessary to complete BS and MS programs independently. Students must apply to the 3+2 program during the Spring semester of their junior year or the Fall semester of their senior year and meet the course requirements listed below. Students applying to the 3+2 program must have a minimum 3.0 overall GPA and a minimum 3.25 GPA in their chemistry courses.

The application file for admission to the Chemistry MS 3+2 plan must include:

1. A completed Chemistry MS application form;
2. A CSU-Pueblo Transcript;
3. Two letters of recommendation from CSU-Pueblo faculty; and
4. Combined GRE scores above 300 (students may be admitted into the 3+2 program before taking the GRE; however, they must submit satisfactory GRE scores by the last day of finals at the end of their first semester in the 3+2 Chemistry MS program to remain in the program).

Prior to being admitted to the Chemistry MS 3+2 plan, students must have completed or be in the process of taking the following courses:

Courses		Titles
CHEM	121/L	General Chemistry I + Lab
CHEM	122/L	General Chemistry II + Lab
CHEM	301/L	Organic Chemistry I + Lab
CHEM	302/L	Organic Chemistry II + Lab
CHEM	221/L	Inorganic Chemistry + Lab
		OR
CHEM	421	Advanced Inorganic Chemistry
PHYS	221/L	General Physics I + Lab
PHYS	222/L	General Physics II + Lab
MATH	224	Calculus & Analytical Geometry II

All other requirements, including core courses, for the 3+2 plan are the same as for the regular Chemistry MS program plan. Dual-listed courses taken by the 3+2 plan students as 400 level courses may be acceptable as electives to meet the minimum program course load requirements with the permission of the specific course instructor and Chemistry MS Program Director. It is expected that students take any 400/500 level courses at the 500 level once they are enrolled in the 3+2 program plan. Students admitted under the 3+2 plan may chose either the thesis or non-thesis (internship) program option.

Additional information about the Chemistry MS program and its requirements is found in the Graduate Programs in Natural Sciences section listed in the *Graduate Programs* section of the catalog.

MASTERS DEGREE IN BIOCHEMISTRY 3+2 PLAN (BS/MS)

A feature of the Biochemistry MS program is the 3+2 plan. This plan gives qualified undergraduate students the opportunity to simultaneously pursue both the Baccalaureate (BS) and Master of Science (MS) degrees. Talented students are thus quickly moved toward expanding their academic and scientific horizons based on individual student's abilities and motivation.

Students in the 3+2 program are expected to successfully complete the requirements for both the BS and MS degree in five academic years. This is shorter than the typical six

years that are necessary to complete BS and MS programs independently. Students must apply to the 3+2 program during the Spring semester of their junior year or the Fall semester of their senior year and meet the course requirements listed below. Students applying to the 3+2 program must have a minimum 3.0 overall GPA and a minimum 3.25 GPA in their chemistry and biology courses.

The application file for admission to the Biochemistry MS 3+2 plan must include:

1. A completed Biochemistry MS application form;
2. A CSU-Pueblo Transcript;
3. Two letters of recommendation from CSU-Pueblo faculty; and
4. Combined GRE scores above 300 (students may be admitted into the 3+2 program before taking the GRE; however, they must submit satisfactory GRE scores by the last day of finals at the end of their first semester in the 3+2 Biochemistry MS program to remain in the program).

Prior to being admitted to the Biochemistry MS 3+2 plan, students must have completed or be in the process of taking the following courses:

Courses		Titles
CHEM	121/L	General Chemistry I + Lab
CHEM	122/L	General Chemistry II + Lab
CHEM	301/L	Organic Chemistry I + Lab
CHEM	302/L	Organic Chemistry II + Lab
BIOL	301/L	General Microbiology + Lab
BOL	351	Molecular Biology and Genetics
MATH	224	Calculus & Analytical Geometry II
		OR
MATH	156	Introduction to Statistics
		AND
PHYS	202/L	Principles of Physics II + Lab
		OR
PHYS	222/L	General Physics II + Lab

All other requirements, including core courses, for the 3+2 plan are the same as for the regular Biochemistry MS program plan. Dual-listed courses taken by the 3+2 plan students as 400 level courses may be acceptable as electives to meet the minimum program course load requirements with the permission of the specific course instructor and Biochemistry MS Program Director. It is expected that students take any 400/500 level courses at the 500 level once they are enrolled in the 3+2 program plan.

Additional information about the Biochemistry MS program and its requirements is found in the Graduate Programs in Natural Sciences section listed in the Graduate Programs in Natural Sciences section listed in the *Graduate Programs* section of the catalog.

CHEMISTRY DEPARTMENT

Department Chair: Chad Kinney

Faculty: Bonetti, Cranswick, Dillon, Druelinger, Farrer, Proctor

The major in chemistry leads to a Bachelor of Science (BS) Degree and the chemistry curriculum is certified by the American Chemical Society.

The chemistry department strives to provide intellectual and professional training for students in the field of chemistry and in support of the American Chemical Society charter "to encourage in the broadest and most liberal manner the advancement of chemistry in all its branches; the promotion of research in chemical science and industry, the improvement of the qualifications and usefulness of chemists through high standards of education to promote scientific interests and inquiry."

Chemistry is a foundation science for many professions. Graduates with degrees in chemistry find employment in such diverse areas as biotechnology, health sciences, forensic science, agricultural and environmental fields, transportation industries, the semi-conductor industry, teaching and research.

Consequently, the chemistry department provides students with a number of diverse programs to assure each student versatility and a sound education in the fundamental areas of modern chemistry.

In addition to curricula for students who wish to pursue chemistry as a profession, programs can be designed for pre-professional areas including pre-pharmacy, pre-medicine, pre-dentistry and pre-veterinary medicine.

A core curriculum for the major exists and many emphasis areas are open to students to combine other interests with a major in chemistry. For example, while medical schools do not mandate any particular major for entering students, biology and chemistry have been the leading majors of students entering medical school. The requirements for a pre-medicine/chemistry major are the same as for the chemistry major emphasis.

Additionally, the student must complete specific courses required by the medical schools to which they are applying. It is recommended that pre-medical and other pre-professional students coordinate the program with the appropriate pre-professional adviser, as well as the chemistry adviser, to assure that specific course requirements are completed.

Program Goals

- To prepare graduates in the discipline of chemistry to become productive members of the profession whether they go on to industry, post-graduate education or other areas.
- To prepare students in the verbal, written and quantitative skills that are prerequisites to advanced study or careers in chemistry.
- To prepare students in the theoretical principals of chemistry as well as in the laboratory approach to problem solving.
- To maintain approval of the chemistry curriculum as defined by the American Chemical Society, Committee on Professional Training.
- To provide the opportunity for a variety of educational programs through the following:

  1) Basic Chemistry
  2) ACS Certified Curriculum
  3) Biochemistry
  4) Chemistry/Teacher Certification
  5) Double Major
  6) Chemistry Minor

Expected Student Outcomes

Chemistry graduates are expected to:

- Understand the concept of and be able to apply the scientific method to problem solution;
- Understand classifications of chemical compounds, general reaction types and quantitative aspects of stoichiometry as applied to chemical reactions;
- Apply basic knowledge of related fields such as mathematics and physics to problem solving, methods of analysis and use of numerical data in the chemical sciences;
- Demonstrate a knowledge of basic laboratory skills, methods and equipment used in chemistry for observation and analysis of chemical systems;
- Read, think and write critically and review current literature in the chemical sciences; and
- Exhibit a comprehensive knowledge of the fundamental theories, concepts and skills necessary in the chemical sciences.

General Requirements

- Students majoring or minoring in chemistry are required to have a cumulative GPA of 2.000 or better in their chemistry courses. In addition, students majoring or minoring in chemistry must receive a grade of "C" or better in all core chemistry courses.
- Proficiency in physics, math and computer science is essential for understanding and applying chemical principles; therefore, graduates must complete approved math and physics courses with an overall GPA of 2.000 or better.
- Transfer students are required to earn a minimum of 20 semester credit hours in approved chemistry courses from CSU-Pueblo for graduation with a BS degree in chemistry. Transfer students wishing to minor in chemistry must earn a minimum of 10 of the 20 credit hours required at CSU-Pueblo.
- Students will be required to take an exit examination during the senior year, covering the undergraduate chemistry curriculum.

Specific Requirements

The following common core is required for all of the chemistry emphasis areas for the Bachelor of Science Degree:

CHEM Courses	Titles	Credits
CHEM 121/L	General Chemistry I/Lab	5
CHEM 122/L	General Chemistry II/Lab	5
CHEM 221/L	Inorganic Chemistry/Lab	4
CHEM 301/L	Organic Chemistry I/Lab	5
CHEM 302/L	Organic Chemistry II/Lab	5
CHEM 317/L	Quantitative Analysis/Lab	5
CHEM 321*	Physical Chemistry I	3
CHEM 322*	Physical Chemistry II	3
CHEM 419/L	Instrumental Analysis/Lab	5
CHEM 493	Seminar	1
	TOTAL	41

- CHEM 322 is not a continuation of CHEM 321 and can be taken before CHEM 321.

All emphasis areas for the chemistry major also require completion of the following institutional and general education requirements.

Institutional and General Education

Please refer to the General Education Requirements in the *Academic Policies* section of this catalog or refer to your individual department's curriculum sheet.

Requirements for the Specific Emphasis Areas

- *Basic Chemistry Emphasis*

Courses	Titles	Credits
Required Chemistry Core		41
CHEM 323	Experimental Physical Chemistry	2
Approved Chemistry Electives		4
CHEM 311	Survey of Biochemistry OR	
CHEM 411	Biochemistry I	3
	TOTAL	50

Other Required Courses

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I 5
MATH	224	Calculus & Analytic Geometry II 5
PHYS	221/L	General Physics I/Lab...........................5
PHYS	222/L	General Physics II/Lab.........................5
		TOTAL	20

Institutional and General Education Courses 24
Free Electives 26

TOTAL 50

Total credit hours..120

- *ACS Certified Emphasis*

Courses		Titles	Credits
Required Chemistry Core...41
CHEM	323	Experimental Physical Chemistry 2
CHEM	411	Biochemistry I 3
CHEM	421	Advanced Inorganic Chemistry.............3
CHEM	492	Research 1
Approved Chemistry Electives 6
		TOTAL	56

Other Required Courses

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I 5
MATH	224	Calculus & Analytic Geometry II 5
PHYS	221/L	General Physics I/Lab...........................5
PHYS	222/L	General Physics II/Lab.........................5
		TOTAL	20

Institutional and General Education 24
Free Electives 20

TOTAL 44

Total credit hours..120

- *Biochemistry Emphasis*

Courses		Titles	Credits
Required Chemistry Core...41
CHEM	411	Biochemistry I 3
CHEM	412/L	Biochemistry II/Lab 5
Approved Chemistry Elective 3
(CHEM 492 or 495 strongly suggested)
		TOTAL	52

Other Required Courses

Courses		Titles	Credits
BIOL	181/L	College Biology I/Organismal Bio/Lab ..4
BIOL	182/L	College Biology II/Cellular Bio/Lab 4
BIOL	301/L	General Microbiology/Lab.....................5
BIOL	350	Mendelian and Population Genetics 2
BIOL	351/L	Molecular Biology and Genetics/Lab 4
BIOL	412/L	Cellular Biology/Lab..............................4
MATH	126	Calculus & Analytic Geometry I 5
MATH	224	Calculus & Analytic Geometry II 5
PHYS	221/L	General Physics I/Lab 5
PHYS	222/L	General Physics II/Lab 5
		TOTAL	43

Institutional and General Education 24
Free Electives 1

Total credit hours..120

- *Double Major Emphasis*

Required Chemistry Core 41
(Including *either* major seminar course)

TOTAL 41

Other Required Courses

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I 5
MATH	224	Calculus & Analytic Geometry II 5
PHYS	201/L	Principles of Physics I/Lab...................4
		OR
PHYS	221/L	General Physics I/Lab 5
PHYS	202/L	Principles of Physics II/Lab..................4
		OR
PHYS	222/L	General Physics II/Lab 5
		TOTAL	18-20

Institutional and General Education 24
Approved Second Major Minimum 39

TOTAL 63

Total credit hours...122-124

- *Secondary Teaching Certification Emphasis*

Required Chemistry Courses

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab.......................5
CHEM	122/L	General Chemistry II/Lab.....................5

CHEM	211/L	Intro to Organic Chemistry/Lab	4
		OR	
CHEM	301/L	Organic Chemistry I/Lab	5
CHEM	311	Survey of Biochemistry	3
CHEM	317/L	Quantitative Analysis/Lab	5
CHEM	321	Physical Chemistry I	3
CHEM	419/L	Instrumental Analysis/Lab	5
		OR	
CHEM	221/L	Inorganic Chemistry/Lab	4
CHEM	493	Seminar	1

TOTAL   30-32

Other Required Courses

Courses		Titles	Credits
BIOL	100/L	Principles of Biology /Lab	4
BIOL	121/L	Environmental Conservation/Lab	4
GEOL	101/L	Earth Science/Lab	4
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PSYCH	151	Human Development	3
		OR	
PSYCH	251	Childhood and Adolescence	3
		OR	
PSYCH	342	Educational Psychology	3
ED	202	Foundation of Education	3
ED	280	Educational Media &Technology	3
ED	301	Frameworks of Teaching	4
ED	412	Teaching Diverse Learners	3
ED	444	Teaching Secondary Science	4
RDG	435	Content Area Literacy	4
ED	485	Capstone Seminar in Education	1
ED	488	Student Teaching Secondary	

TOTAL   69

General Education..21-24
(21 credits if PSYCH 151 or 251 taken as Social Science)

Total credit hours..120-125

- *Pre-Professional*

Students ultimately seeking professional degrees such as Pharmacy, PharmD, MD, DVM, DO, DDS, and DC, may opt to complete a bachelors, or minor, in chemistry as preparation for future professional studies. A solid understanding of the chemistry and analysis of biomolecules, pharmaceuticals, etc. serves as an excellent foundation for professional programs in the health sciences. Selection of the *Biochemistry* or *Double Major Emphasis* is recommended for pre-professional students completing the BS in chemistry. Pre-professional students must work closely with academic advisers to ensure completion of specific curricular requirements needed for admission into specific professional programs.

- *Chemistry Minor*

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
Upper-division CHEM Electives			10

TOTAL   20

Co-curricular Requirements

Students should experience co-curricular activities which enhance, broaden and reinforce the academic experience; therefore, the faculty support and encourage students to participate in science-related, as well as in general activities such as:

1) Science or chemistry clubs
2) Student government
3) Scientific meetings, seminars, symposia, field trips, tours, etc.
4) Internships
5) Research

Outcomes Assessment Activities

- Assessment of chemistry majors occurs through examination of GPA in required courses. Majors are required to maintain a 2.000 GPA in major and minor courses as well as in other required courses.
- Students are required to complete American Chemical Society national standard exams when given during the course of the chemistry degree curriculum. Scores are compared to national averages to determine if students exhibit a comprehensive knowledge of the fundamental theories and concepts necessary in the chemical sciences disciplinary areas.
- Students are required to take an exit examination during the senior year. The ETS Major Field Achievement Test (MFAT) covers the undergraduate chemistry curriculum. Scores are compared to national averages to determine if students exhibit a comprehensive knowledge of the fundamental theories and concepts necessary in the chemical sciences overall.

MATHEMATICS AND PHYSICS DEPARTMENT

Department Chair: Bruce N. Lundberg

MATHEMATICS PROGRAM

Faculty: Barnett, Chacon, Funk-Neubauer, Kreminski, Louisell, Lundberg, Melnykov, Nichols, Poritz, Zizza

The program's mission is to foster students' development in quantitative and analytical reasoning skills, powerful mathematical problem-solving strategies, effective techniques for the communication of results and the capacity for lifelong independent learning. The major in mathematics leads to either a Bachelor of Arts (BA) or a Bachelor of Science (BS) degree. The program's flexible curriculum prepares students for diverse professional careers and for graduate studies. Faculty advisers work directly with majors and minors to design individual programs of study. Students who are potential majors or minors should consult with a faculty adviser as early as possible. Appointments with a faculty adviser can be made anytime by calling the department office.

Program Goals

- Educate students to effectively use quantitative and analytical methods and the language of mathematics.
- Prepare students for professional careers and graduate studies in areas requiring advanced analytical skills, including actuarial science, computer science, engineering, operations research, biomathematics, cryptography, finance, pure and applied mathematics and teaching.
- Promote a scholarly attitude of mind that enables students to effectively use mathematics with the ability to think critically, synthesize their knowledge and move to higher levels of independent thinking.

Expected Student Outcomes

Upon successful completion of the mathematics major, students will:

- Learn, understand and apply mathematics from the core mathematical disciplines of calculus, abstract algebra, analysis, modeling, differential equations, geometry, probability, and statistics.
- Formulate and solve problems using mathematical tools, while working alone or in groups on routine problems, non-routine and open-ended problems, problems involving applications to other fields, problems involving real-world data, and abstract problems within mathematics.

- Create, analyze and apply mathematical abstraction to real problems by understanding and producing formal mathematical arguments with an appreciation for the mathematical standards of rigor, elegance, and beauty.
- Learn independently, locate and use appropriate sources of technical material, and make use of modern computational tools.
- Produce convincing, precise verbal and written communications of technical material.

General Requirements

- All mathematics majors must complete the mathematics core curriculum: MATH 126, 207, 224, 307, 325, 350, 421, and 427. Majors are expected to complete core courses numbered above MATH 325 at CSU-Pueblo.
- All majors must complete a physics course numbered 200 or above.
- Mathematics majors and minors must complete the mathematics courses in their program with grades of C or better.
- MATH 337 is a required elective for all mathematics majors not pursuing secondary education endorsement.
- All majors are required to complete an approved two-term sequence in a laboratory science (CHEM 121/121L and 122/122L, or PHYS 221/221L and 222/222L).
- Mathematics majors must demonstrate proficiency in "an approved" computer language. It is strongly recommended that students complete this requirement within the first 60 credit hours.

Institutional and General Education

Please refer to the General Education Requirements in the *Academic Policies* section of this catalog or refer to the individual department's curriculum sheet.

Specific Requirements for the Mathematics Major

MATH Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	307	Intro to Linear Algebra	4
MATH	325	Intermediate Calculus	3
MATH	337	Differential Equations I	3
MATH	350	Probability	3
MATH	421	Introduction to Analysis	4
MATH	427	Abstract Algebra	4
Upper-division MATH Electives			6
(Excluding MATH 360, 361, 477)			
		TOTAL	39

Other Requirements

Laboratory Science Sequence 10
Computer Programming 4

$$\overline{}$$
TOTAL   14

General Education credits 24
Electives 43

Total credit hours 120

Specific Requirements for the Mathematics Major/ Secondary Certification

MATH Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	307	Intro to Linear Algebra	4
MATH	319	Number Theory	3
MATH	325	Intermediate Calculus	3
MATH	330	Intro to Higher Geometry	3
MATH	350	Probability	3
MATH	356	Statistics for Engineers & Scientists	3
MATH	421	Introduction to Analysis	4
MATH	427	Abstract Algebra	4
MATH	463	History of Mathematics	3
MATH	477	Materials & Techniques of Teaching Secondary School Math	4

TOTAL   46

Other Requirements

Courses		Titles	Credits
ED	202	Foundations of Education	3
ED	280	Educational Media and Technology	3
ED	301	Frameworks of Teaching	4
ED	412	Teaching Diverse Learners..................	3
ED	485	Capstone Seminar in Education	1
ED	488	Secondary Student Teaching	12
PSYCH	151	Human Development	3
		OR	
PSYCH	251	Childhood and Adolescence	3
		OR	
PSYCH	342	Educational Psychology.......................	3
RDG	435	Content Area Literacy	4

TOTAL   33

Laboratory Science Sequence 10
Computer Programming 4
Electives 6

$$\overline{}$$
TOTAL   20

General Education 21

Total credit hours 120

Specific Requirements for the Minor in Mathematics

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
Electives including three upper-division courses*			
(Excluding MATH 360, 361, 362 & 477)			10

TOTAL   20

* Two of these must be taken at CSU-Pueblo.

Specific Requirements for the Minor in Computational Mathematics

Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	307	Introduction to Linear Algebra..............	4
		OR	
MATH	342	Introduction to Numerical Analysis	3
MATH	320	Introductory Discrete Mathematics	3
MATH	345	Algorithms & Data Structures	4

TOTAL   22-23

Requirements for the Computational Mathematics Minor specific to Math Majors

Math majors, in lieu of the first 12 hours above are required to take:

Courses		Titles	Credits
An approved programming elective..................................			3
CIS	171	Intro to Java Programming	4
MATH	242	Introduction to Computation..................	4

$$\overline{}$$
TOTAL   11

Specific Requirements for the Math/Physics Double Major

MATH Courses		Titles	Credits
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	307	Intro to Linear Algebra	4
MATH	325	Intermediate Calculus..........................	3

PHYS Courses		Titles	Credits

MATH 337 Differential Equations I..........................3
MATH 338 Differential Equations II.........................3
MATH 350 Probability
AND
MATH 356 Stats for Engineers & Scientists 6
OR
MATH 550 Statistical Methods...............................3
MATH 421 Introduction to Analysis.........................4
MATH 427 Abstract Algebra 4

TOTAL   36-39

PHYS Courses   Titles   Credits
PHYS 221/L General Physics I/Lab........................5
PHYS 222/L General Physics II/Lab.......................5
PHYS 301 Theoretical Mechanics 4
PHYS 323/L General Physics III/Lab......................5
PHYS 321/322 Thermodynamics/Lab 4
PHYS 431/432 Electricity and Magnetism/Lab 5
PHYS 441 Quantum Mechanics 4
PHYS 480 Practicum in Lab Instruction................1
PHYS 493 Seminar 1

TOTAL   34

Other Requirements

Courses   Titles   Credits
MATH 425 Complex Variables...............................3
OR
PHYS 341/342 Optics/Adv. Laboratory-Optics 4
PHYS 492 Research
OR
MATH 492 Research 1
CHEM 121/L General Chemistry I/Lab.....................5
CHEM 122/L General Chemistry II/Lab....................5
Computer Programming.......................................3

TOTAL   17-18

General Education...24
Electives...5-6

Total credit hours..120

Co-Curricular Requirements

Students have the opportunity to broaden and reinforce the academic experience through participation in a variety of co-curricular activities. All students are encouraged to join the CSU-Pueblo Math Club. Many students serve as tutors in the Math Learning Center.

Outcomes Assessment Activities

- Faculty advisers meet individually with students on a regular basis to help with schedule planning and to discuss the student's progress toward educational and career goals. Advisers maintain a record of each student's performance in his/her program of study.
- During the senior year, each major takes the Mathematics Field Achievement Test. This test measures a student's achievement level in comparison with students throughout the country.

PHYSICS/PHYSICAL SCIENCE PROGRAM

Department Chair: Bruce N. Lundberg

Faculty: Brown

The major in physics leads to a Bachelor of Science (BS) Degree. In addition, supporting courses and general education courses in physics and astronomy are available for students with a wide spectrum of interests, backgrounds and needs. Physics majors must consult with a program adviser as early as possible and must file a departmentally approved plan of study by the beginning of the junior year.

The Bachelor of Science Degree in physics is offered with several emphasis areas:

For the first three (non-teacher) emphasis areas, the recommended sequences of courses presume that the student is ready to begin MATH 126 in the first term of the freshman year. If not, MATH 124 should be taken in the fall and MATH 126 in the spring of the freshman year concurrently with PHYS 221. Otherwise it may not be possible to complete the requirements for a physics degree within four years. Students, especially transfers, who do not strictly adhere to the plan of study, may find that the term of attendance at CSU-Pueblo will be extended beyond four years.

Physics Emphasis

Primarily for students planning graduate study toward a professional career in physics, astronomy or other related fields.

Engineering Emphasis

This emphasis is for students planning to enter positions in industry upon graduation. Courses in engineering enhance the utility of the graduate to potential employers.

Chemical Physics or/Biophysics Emphasis

These emphasis areas are designed to meet specific career objectives for an individual.

Physics Secondary Certification Emphasis

This emphasis provides students with the knowledge and skills necessary to obtain Colorado Department of Education certification as science teachers with an emphasis in physics.

Physical Science Secondary Certification Emphasis

This emphasis provides students with the knowledge and skills necessary to obtain Colorado Department of Education certification as science teachers with an emphasis in physics and chemistry.

Physics/Math Double Major

See Math Program for details.

MINORS

Minors also are available in physics and physical science for students who need a specialized science minor in these fields.

Program Goals

*   To supply students with the necessary background to successfully pursue graduate study towards a professional career in physics, astronomy or a related field.
*   To prepare students upon graduation to enter technical positions in government or industry.
*   To provide students with the knowledge and skills necessary to obtain Colorado Department of Education Certification as science teachers of physics or physical science.

Expected Student Outcomes

Upon successful completion of the physics major, students will be able to:

*   Think critically and logically and use the scientific method in their future investigations.
*   Understand and apply knowledge of various subfields of physics at the undergraduate level and make a successful transition to technical fields, including engineering, teaching, business, and graduate studies.
*   Effectively communicate their results orally and in writing.
*   Learn independently, locate and use appropriate sources of technical material and make use of modern scientific and computational tools.

General Requirements

*   Students graduating with a BS in physics must have at least a 2.000 grade-point average in physics courses and no more than four credits in physics with grades of D.
*   Students graduating with a minor in physics must have at least a 2.000 grade-point average in physics.
*   A 2.500 grade-point average in the major area is required for admission to the teacher education program.
*   At least 12 physics credits applied to the major (seven for minor) must be earned at CSU-Pueblo with a C or better average.
*   Students must have earned a C or better grade in lower-division prerequisite courses before being admitted to upper-division courses in physics.
*   In all but the teaching emphasis areas, students must demonstrate knowledge of computer programming.
*   In all but the teaching emphasis areas, majors are required to take the senior research course, in which students become involved in a theoretical or experimental research problem relating to physics under the supervision of a department faculty member.
*   A fundamental understanding of chemistry and its lab techniques is required of all majors.

Institutional and General Education

Please refer to the General Education Requirements in the *Academic Policies* section of this catalog or refer to your individual department's curriculum sheet.

Specific Requirements for the Physics Emphasis

PHYS Courses		Titles	Credits
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PHYS	301	Theoretical Mechanics	4
PHYS	321	Thermodynamics	3
PHYS	322	Advanced Laboratory - Heat	1
PHYS	323/L	General Physics III/Lab	5
PHYS	341	Optics	3
PHYS	342	Advanced Laboratory - Optics	1
PHYS	431	Electricity and Magnetism	4
PHYS	432	Adv Lab Electricity & Magnetism	1
PHYS	441	Quantum Mechanics	4
PHYS	480	Practicum in Lab Instruction	1
PHYS	492	Research	1
PHYS	493	Seminar	1
PHYS	499	Thesis Research	1
		TOTAL	40

Other Required Courses

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
MATH	242	Introduction to Computation	4
		OR	
EN	103	Problem Solving for Engineers	3
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	325	Intermediate Calculus	3
MATH	337	Differential Equations I	3
MATH	338	Differential Equations II	3
Approved Math Elective			3-4

TOTAL 37-39

General Education....................24
Electives..........................17-19

Total credit hours........................120

Specific Requirements for the Engineering Emphasis

PHYS Courses		Titles	Credits
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PHYS	301	Theoretical Mechanics	4
PHYS	321	Thermodynamics	3
PHYS	322	Advanced Laboratory- Heat	1
PHYS	323/L	General Physics III/Lab	5
PHYS	341	Optics	3
PHYS	342	Advanced Laboratory - Optics	1
PHYS	431	Electricity and Magnetism	4
PHYS	492	Research	1

TOTAL 32

Other Required Courses

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
EN	101	Introduction to Engineering	2
EN	103	Problem Solving for Engineers	3
EN	107	Engineering Graphics	2
EN	211	Engineering Mechanics I	3
EN	212	Engineering Mechanics II	3
EN	231/L	Circuit Analysis I/Lab	5
EN	321	Thermodynamics	3
EN	324/L	Materials Science & Engineering/Lab	4
EN	441/L	Engineering of Manufacturing Processes/Lab	4
EN	443	Quality Control and Reliability	3
EN	471	Operations Research	3
MATH	126	Calculus & Analytic Geometry I	5

MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	325	Intermediate Calculus	3
MATH	337	Differential Equations I	3

TOTAL 63

General Education........................24
Electives................................1

Total credit hours........................120

Specific Requirements for the Biophysics, or Chemical Physics Emphasis

PHYS Courses		Titles	Credits
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PHYS	301	Theoretical Mechanics	4
PHYS	321	Thermodynamics	3
PHYS	322	Advanced Laboratory- Heat	1
PHYS	323/L	General Physics III/Lab	5
PHYS	341/342	Optics/Adv. Laboratory-Optics	4
		OR	
PHYS	431	Electricity and Magnetism	4
PHYS	441	Quantum Mechanics	4
PHYS	492	Research	1

TOTAL 32

Other Required Courses

Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
MATH	242	Introduction to Computation	4
		OR	
EN	103	Problem Solving for Engineers	3
MATH	126	Calculus & Analytic Geometry I	5
MATH	207	Matrix & Vector Algebra with Applications	2
MATH	224	Calculus & Analytic Geometry II	5
MATH	325	Intermediate Calculus	3
MATH	337	Differential Equations I	3
Approved electives in biology			32
		OR	
Approved electives in chemistry			22

TOTAL 53-64

General Education........................24
Electives................................11-0

Total credit hours........................120

*A MATH/PHYSICS double major is also available in the department. (See MATH department requirements.)

Specific Requirements for the Physics Secondary Certification Emphasis

PHYS Courses		Titles	Credits
PHYS	110	Astronomy	3
PHYS	140/L	Light, Energy and the Atom/Lab	4
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PHYS	321/322	Thermodynamics/Lab	4
PHYS	323/L	General Physics III/Lab	5
PHYS	341/342	Optics/Adv. Laboratory-Optics	4
PHYS	480	Practicum in Lab Instruction	1

TOTAL 31

Other Required Courses

Courses		Titles	Credits
BIOL	100/L	Principles of Biology/Lab	4
BIOL	121/L	Environmental Conservation/Lab	4
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
ED	202	Foundation of Education	3
ED	280	Educational Media & Technology	3
ED	301	Frameworks of Teaching	4
ED	412	Teaching Diverse Learners	3
ED	444	Teaching Secondary Science	4
ED	485	Capstone Seminar in Education	1
ED	488	Student Teaching Secondary	12
GEOL	101/L	Earth Science/Lab	4
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
PSYCH	151	Human Development	3
		OR	
PSYCH	251	Childhood and Adolescence	3
		OR	
PSYCH	342	Educational Psychology	3
RDG	435	Content Area Literacy	4

TOTAL 69

General Education 21

Total credit hours 121

Specific Requirements for the Physical Science Secondary Certification Emphasis

PHYS Courses		Titles	Credits
PHYS	110	Astronomy	3
PHYS	140/L	Light, Energy and the Atom/Lab	4
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PHYS	323/L	General Physics III/Lab	5

TOTAL 22

CHEM Courses		Titles	Credits
CHEM	121/L	General Chemistry I/Lab	5
CHEM	122/L	General Chemistry II/Lab	5
CHEM	211/L	Intro to Organic Chemistry/Lab	4
		OR	
CHEM	301/L	Organic Chemistry I/Lab	4
CHEM	317/L	Quantitative Analysis/Lab	5
CHEM	321	Physical Chemistry I	3
CHEM	378	Practicum in Lab Instruction	1

TOTAL 23

Other Required Courses

Courses		Titles	Credits
BIOL	100/L	Principles of Biology/Lab	4
BIOL	121/L	Environmental Conservation/Lab	4
ED	202	Foundations of Education	3
ED	280	Educational Media & Technology	3
ED	301	Frameworks of Teaching	4
ED	412	Teaching Diverse Learners	3
ED	444	Teaching Secondary Science	4
ED	485	Capstone Seminar in Education	1
ED	488	Student Teaching Secondary	12
GEOL	101/L	Earth Science/Lab	4
MATH	126	Calculus & Analytic Geometry I	5
MATH	224	Calculus & Analytic Geometry II	5
PSYCH	151	Human Development	3
		OR	
PSYCH	251	Childhood and Adolescence	3
		OR	
PSYCH	342	Educational Psychology	3
RDG	435	Content Area Literacy	4

TOTAL 62

General Education 21

Total credit hours 125

Specific Requirements for the Minor in Physics

PHYS Courses		Titles	Credits
PHYS	221/L	General Physics I/Lab	5
PHYS	222/L	General Physics II/Lab	5
PHYS	323/L	General Physics III/Lab	5
Approved Upper-division Electives in Physics			5

TOTAL 20

Specific Requirements for the Minor in Physical Science

A minimum of 24 credits must be selected from the courses listed below:

Courses		Titles	Credits
PHYS	110/L	Astronomy/Lab	4
PHYS	150	Elementary Concepts in Physics and Chemistry I	4
PHYS	201/L	Principles of Physics I/Lab	4
PHYS	202/L	Principles of Physics II/Lab	4
CHEM	111/L	Principles of Chemistry/Lab	4
EN	103	Problem Solving for Engineers	3
GEOL	101/L	Earth Science/Lab	4
		TOTAL	27

Co-Curricular Requirements

The program faculty believes that students should have co-curricular experiences that complement and reinforce their academic experiences. Therefore, the faculty encourages students to join and participate in events sponsored by the department and the Society of Physics Students (SPS), Sigma Pi Sigma initiations, physics expositions, picnics, graduation dinners, potluck dinners, etc. to foster a spirit of camaraderie.

Outcomes Assessment Activities

The Physics Program faculty will assess the skills, capacities, and knowledge of its majors as follows:

- The student must complete a senior research project including a formal presentation of results both in writing and orally to at least two members of the physics faculty (except for those in the teaching emphasis areas).
- The student must take the Physics Major Field Achievement Test offered by The Educational Testing Services (ETS) or another departmentally approved exam covering the sub-fields in physics at some point during his/her senior year (except for those in the teaching emphasis areas).
- By maintaining a portfolio for each student which contains college grades, records of special skills acquired, senior research project results, Field Achievement Test results and a record of co-curricular activities. The portfolio will remain on file in the department and will be added to as additional information is obtained from student or employer.

The program faculty believes that improvement in the skills, capacities, and knowledge of its minors can be assessed through required course work. The course grade will be a measure of the student's grasp of the basics in each discipline.

THE HASAN SCHOOL OF BUSINESS

Dr. Bruce C. Raymond, Dean

HSB Majors and Minors

Majors: Accounting (BSBA)
          Business Management (BSBA)
             Emphasis Areas:
                Information Technology
                Marketing
                Sports Industry Management
          Computer Information Systems (BS)
          Economics (BSBA)
             Emphasis Area:
                Finance
          Joint BSBA/MBA
          Joint BS-CIS/MBA
          MBA
             (See the *Graduate Studies* section of this catalog for more information.)

Minors: Accounting
          Business Administration
          Computer Information Systems
          Computer Security
          Economics
          Finance
          Marketing
          Supervisory Management

Accreditation

The business majors (BSBA) of the Hasan School of Business are accredited by AACSB International – The Association to Advance Collegiate Schools of Business. AACSB is a not-for-profit corporation of educational institutions, corporations and other organizations devoted to the promotion and improvement of higher education in business administration and management. Organized in 1916, AACSB International is the premier accrediting agency for bachelor's, master's and doctoral degree programs in business administration and accounting.

Mission

The mission of the Hasan School of Business at Colorado State University-Pueblo is to provide quality undergraduate and graduate business education for a diverse student population through our strong professional focus on contemporary business practices. Our educational programs prepare our students to assume team member and leadership roles in business by:

- Developing their skills in communication and critical thinking, and
- Instilling in them awareness of the global economy and ethical behavior.

The intellectual pursuits of our faculty focus primarily on applied scholarship and instructional development. Our outreach activities – developed in partnership with the community – serve to enhance the quality of life and economic well-being in southeastern Colorado.

Learning Outcomes Assessment

The Hasan School of Business is committed to continuous improvement through a rigorous assessment program focused on measuring learning outcomes and implementing measures to enhance students' chances of success. Within each individual course, faculty members utilize a variety of assessment techniques, including: student presentations, projects, peer evaluations, examinations, and student surveys.

Learning Goals for the Business Undergraduate Program

The Hasan School of Business faculty works diligently to provide undergraduates with a high-quality education that prepares them for entry into business or into a graduate program. Our programs prepare students through achievement of five primary learning goals.

1) **Communication**

   Our students will be able to communicate effectively.

2) **Problem Solving**

   Our students will be able to analyze problems and develop solutions.

3) **Global Awareness**

   Our students will be able to apply global business concepts.

4) **Ethical Awareness**

   Our students will be able to recommend ethical alternatives and appropriate actions.

5) **Team Skills**
   Our students will be able to demonstrate effective team skills.

Undergraduate Majors

The Hasan School of Business offers undergraduate majors in accounting, business management, business management with an information technology emphasis, business management with a marketing emphasis,

business management with a sports industry management emphasis, computer information systems, economics and economics with a finance emphasis. Graduates will be able to successfully compete for appropriate entry-level positions in private firms, nonprofit organizations or government. The *accounting* major prepares graduates for professional careers in accounting. The knowledge and skills acquired in the *business management* major can be used in a number of areas including human resource and operations management. The *business management major with an emphasis in marketing* prepares the graduate to successfully promote and sell goods and services. The *business management major with an emphasis in sports industry management* will be done as a collaborative curricular effort through the Exercise Science and Health Promotion Department. Students seeking this major will have specialized managerial skills in the sports management and outdoor recreation industry. The *CIS* major prepares graduates for successful careers in the computer information systems and information technology (IT) fields. *Economics* majors are particularly well prepared to enter graduate programs in business, in addition to assuming entry-level positions in business firms, nonprofit organizations or government, as well as, positions in banking, financial analysis, and related financial services industries.

NOTE: Students planning to take professional certification exams in any field are encouraged to consult with their faculty adviser to understand any additional requirements.

General Requirements for Business Majors (Accounting, Business Management and Economics*)*

All undergraduate business majors (accounting, business management and economics) take the **Business Core**. The Core prepares business majors with general business knowledge and skills. The Core also provides students with an understanding of and appreciation for the intellectual discipline needed for successful completion of a business major.

These courses provide students with the common body of knowledge needed for imaginative and responsible citizenship and leadership roles in business and society, domestically and globally. The Business Core is designed to provide students with the opportunity to integrate their educational experiences in business within a specific discipline and across disciplines.

An overall GPA of 2.000 is required in General Education Skills Component courses. The Hasan School of Business prerequisite course requirement is a D, so that a student may progress to the next course. All business majors are required to earn a C or better in Business Core courses and in 300/400-level major courses to fulfill degree requirements. In addition, students must have completed the 100/200-level Business Core courses prior to enrolling

in 300/400-level business courses. Additional prerequisites for Business Core courses and major courses are specified in the *Course Descriptions* section of the catalog. Business Core courses are listed alphabetically by prefix. Academic Planning Sheets are available in HSB.

Independent Studies, Directed Studies, Internships, and Special Projects will not be substituted for core or required courses. They may count as electives.

Business Core

Courses		Titles	Credits
ACCTG	201	Financial Accounting	3
ACCTG	202	Managerial Accounting	3
BUSAD	101	Business Careers and Opportunities	1
BUSAD	265	Inferential Statistics and Problem Solving	3
BUSAD	270	Business Communications	3
BUSAD	302	Ethics in Business	3
BUSAD	360	Advanced Business Statistics	3
BUSAD	493	Senior Seminar	1
CIS	100	Introduction to Word and Windows	1
CIS	103	PowerPoint and Web Publishing	1
CIS	104	Excel Spreadsheets	1
ECON	201	Principles of Macroeconomics	3
ECON	202	Principles of Microeconomics	3
FIN	330	Principles of Finance	3
MATH	220	Quantitative Analysis for Business	4
MGMT	201	Principles of Management	3
MGMT	301	Organizational Behavior	3
MGMT	311	Operations and Quality Management	3
MGMT	485	Strategic Management	3
MKTG	340	Principles of Marketing	3

TOTAL 51

Majors and Emphasis Areas
(Specific course requirements are detailed later.)

Select one:

Accounting 24
Business Management 24
Business Management/Information Technology 37
Business Management/Marketing 24
Business Management/Sports Industry Management 39
Economics 24
Economics/Finance 24

Business majors may take a second major in a business discipline that is **not related** to their first major discipline, provided that the additional 300/400-level credits associated with the second major are in addition to the credits needed to complete the first major (i.e., If the first major is 120 credits and the second major is 24 credits, then the total credits to complete the first major and the second major will be a minimum of 144). For example, a

student earning the BSBA in business management could also major in accounting or economics.

Business majors may take a minor in a business discipline that is **not related** to their major discipline, provided that the additional 300/400-level credits associated with the minor are in addition to the credits needed to complete their major (i.e., If the major is 120 credits and the additional credits in the minor are 9 credits, then the total credits to complete the major and the minor will be a minimum of 129). For example, a student earning the BSBA in business management could also minor in accounting or economics.

Graduation Requirements for Business Majors (Accounting, Business Management, and Economics)

Students must satisfy the University general education requirements, the general institutional requirements, and have at least 120 total credit hours with a cumulative GPA of 2.000 to graduate.

An overall GPA of 2.000 is required in General Education Skills Component courses. The Hasan School of Business prerequisite course requirement is a D, so that a student may progress to the next course. All business majors are required to earn a C or better in Business Core courses and 300/400-level major courses to fulfill degree requirements.

Credit Policy

To earn a BSBA from CSU-Pueblo, students must complete no fewer than 30 semester hours in business at the 3/400 level in residence at CSU-Pueblo. "In residence" courses will include Business or CIS courses offered through CSU-Pueblo Extended Studies Programs. Students who complete junior- and senior-level courses at other colleges or universities with grades of C- or better, and wish to apply the credits earned toward their degree, must request approval through the Dean or Faculty Chair. Courses taken without such approval will not be counted toward the fulfillment of degree requirements.

Only the Dean or the Faculty Chair may waive any portion of these requirements and only upon written petition by a student who has demonstrated extraordinary ability.

Transfer Students

Undergraduate transfer work from other institutions is evaluated first by the Registrar's Office, but final degree determination is made by the Hasan School of Business. The School of Business reserves the right to disallow any credit that is not appropriate degree credit as determined by the School.

Summary of Graduation Requirements (Accounting, Business Management, and Economics)

General Education *36
Business Core..*45
Major 24-39
Open Electives...0-15

TOTAL (minimum credits) 120

*ECON 201 and ECON 202 are counted in General Education.

Summary of Graduation Requirements (CIS):

General Education *36
Quantitative Analysis Requirement 10
Required Related 9
Open Electives..13
Major 52

TOTAL (minimum credits) 120

*Must include COMR 103 or equivalent; ECON 201 and 202, and MATH 121.

Co-Curricular Opportunities

Co-curricular activities are encouraged for all Hasan School of Business students. Included are internships, student clubs, and seminar programs. A current list of clubs is available in the Hasan School of Business or on the CSU-Pueblo web site.

Outcomes Assessment Activities

Assurance of Learning

The use of direct measures of student performance in the Hasan School of Business provides a relevant set of performance data. Reviewed by faculty, discipline groups, the School's Assurance of Learning Committee, and administrators, results of these measures are used to make program improvements. In addition to course grades, direct measures of student performance in the school of Business include:

- **The Educational Testing Service (ETS) Major Field Test in Business**. This test, administered nationwide, assesses what students have learned in courses common to all business majors. Results are compared with those of other business students enrolled at selected peer institutions, as well as nationally. In the Hasan School of Business, the Major Field Test is given to students in the BUSAD 493 capstone course in their senior year.
- **Course-Embedded Measures**. Exams, papers, presentations, and projects include course-embedded

measures that can be used to assess student performance.

The Hasan School of Business compiles information to assess the success of graduates. Information is obtained from the CSU-Pueblo Alumni Office, the Career Center, and other sources.

Advising

All pre-business students, business majors, and CIS majors are advised in the Hasan School of Business. Students are required to meet with an HSB adviser each term to plan their course schedules for the upcoming term. In addition, consulting with an adviser is necessary in declaring a business major, applying for an internship and filing a graduation planning sheet.

Student Files

Student files are maintained to help track each student's progress at various checkpoints. Files are kept in a central file in the Hasan School of Business, accessible to the administration, the student, the student's adviser, and the faculty of the school.

ACCOUNTING MAJOR

Faculty: Eriksen

The major in accounting leads to the Bachelor of Science in Business Administration (BSBA). The primary objective is to provide an academic program that covers the conceptual basis of accounting as well as the application of accounting doctrine in current accounting practice. The programs of study are functional in that they provide the broad base of knowledge required by the accounting profession.

Requirements for the Accounting Major

Courses		Titles	Credits
ACCTG	301	Intermediate Accounting I	3
ACCTG	302	Intermediate Accounting II	3
ACCTG	311	Federal Income Tax	3
ACCTG	320	Cost Accounting	3
ACCTG	330	Accounting Information Systems	3
ACCTG	401	Advanced Financial Accounting	3
ACCTG	404	CPA Law	3
ACCTG	410	Auditing	3

TOTAL 24

Requirements for the Accounting Minor

Courses		Titles	Credits
ACCTG	201	Financial Accounting	3
ACCTG	202	Managerial Accounting	3
ACCTG	301	Intermediate Accounting I	3
ACCTG	320	Cost Accounting	3
ACCTG	3/400	Elective	3
ECON	202	Principles of Microeconomics	3
MGMT	201	Principles of Management	3

TOTAL 21

A GPA of 2.000 or higher is required for the minor.

BUSINESS MANAGEMENT MAJOR

Faculty: Ahmadian, Brennan, Fowler, Gilbreath, Kwon, Shah, Wakefield

The major in business management leads to the Bachelor of Science in Business Administration (BSBA) and provides students with the theoretical and conceptual basis of business as well as application skills to assume leadership roles in industry, government and education.

The undergraduate business management major permits students to select one area as an emphasis. The knowledge and skills acquired with the major in business management can be used in a number of areas, such as human resource and operations management. The business management major with an information technology emphasis prepares students for careers in managing technology in modern organizations.

The business management major with a specialization in marketing prepares the graduate to successfully promote and sell goods and services.

Requirements for the Business Management Major

Courses		Titles	Credits
MGMT	318	Human Resource Management	3
MGMT	365	Management Information Systems	3
MGMT	475	International Management OR	
MKTG	475	International Marketing	3
MGMT	3/400	Electives	9
Business Electives (3/400-level)			6

TOTAL 24

Requirements for the Business Management Major with Information Technology Emphasis

Courses		Titles	Credits
MGMT	318	Human Resource Management	3

MGMT	368	Project Management 3	
MGMT	475	International Management OR	
MKTG	475	International Marketing 3	
CIS	150	Computer Information Systems *3	
CIS	171	Introduction to Java Programming........ *4	
CIS	185	PC Architecture *3	
CIS	240	Object Oriented Analysis and Design... *3	
CIS	289	Network Concepts *3	
CIS	311	Introduction to Web Development 3	
CIS	350	Data Base Systems 3	
MGMT	3/400	Elective...3	
Business/CIS		Elective (3/400-level) 3	

TOTAL   37

*CIS 150, 171, 185, 240, and 289 replace the 15 credits of open electives in the Business Management graduation requirements.

Additional Requirements

Courses	Credits
Open Electives 2	

TOTAL   2

Requirements for the Business Management Major with Marketing Emphasis

Courses		Titles	Credits
MGMT	365	Management Information Systems.........3	
MKTG	441	Marketing Strategies..............................3	
MKTG	3/400	Electives..12	
Business Electives (3/400-level) 6			

TOTAL   24

Requirements for the Business Management Major with Sports Industry Management Emphasis

Courses		Titles	Credits
MGMT	318	Human Resource Management..............3	
MKTG	342	Promotional Strategy 3	
MGMT	365	Management Information Systems.........3	
MGMT	368	Project Management 3	
MKTG	388	Sports Industry Marketing......................3	
MGMT	488	Sports Industry Management 3	
MGMT	498	Internship...3	
BUS/CIS/EXHP		Elective...3	
EXHP	101	Introduction to EXHPR 2	
PSYCH	205	Introduction to Sport Psychology............3	
REC	240	Recreation Program Design 3	
REC	250	Commercial Recreation and Tourism 3	
REC	485	Recreation Facility Design/Management 3	
EXHP		Elective..1	

TOTAL   39

Business Minors

Requirements for the Business Administration Minor (Open to non-business majors only)

Courses		Titles	Credits
ACCTG	201	Financial Accounting 3	
ACCTG	202	Managerial Accounting..........................3	
ECON	201	Principles of Macroeconomics...............3	
ECON	202	Principles of Microeconomics................3	
FIN	330	Principles of Finance 3	
MGMT	201	Principles of Management......................3	
MKTG	340	Principles of Marketing 3	

TOTAL   21

Requirements for the Marketing Minor (Open to Accounting, Economics, and non-business majors only)

Courses		Titles	Credits
ACCTG	201	Financial Accounting 3	
ECON	202	Principles of Microeconomics................3	
MGMT	201	Principles of Management......................3	
MKTG	340	Principles of Marketing 3	
MKTG	3/400	Marketing Electives 9	

TOTAL   21

Requirements for the Supervisory Management Minor (Open to non-business majors only)

Courses		Titles	Credits
ACCTG	201	Financial Accounting 3	
ACCTG	202	Managerial Accounting..........................3	
ECON	202	Principles of Microeconomics................3	
MGMT	201	Principles of Management......................3	
MGMT	301	Organizational Behavior 3	
MGMT	318	Human Resource Management..............3	
MGMT	410	Labor Management 3	

TOTAL   21

A GPA of 2.000 or higher is required for the minors.

COMPUTER INFORMATION SYSTEMS DEPARTMENT

Faculty: Cho, Huff, Long, Mejias

The Bachelor of Science (BS) degree in Computer Information Systems (CIS) prepares graduates for successful careers in the computer information systems and information technology (IT) fields. Students complete a comprehensive, relevant, computer information systems

curriculum that delivers high-demand knowledge, skills, and abilities in: software and web application development, system analysis and design, network design and administration, database design and development, operating systems, and IT security.

The CIS program also includes a Computer Security certificate for non-degree seeking students awarded by the CIS department.

Program Objectives

The program seeks to develop a deeper understanding of the role of information systems within organizations and the processes that support technology-enabled business development. At the conclusion of the CIS program, students will demonstrate the ability to:

1) Analyze, design, implement, and maintain an information system.
2) Communicate clearly and effectively in writing and speaking.
3) Work effectively as a team member for a common purpose.
4) Identify ethical issues and provide alternatives or solutions.

Outcomes Assessment Activities

The CIS program primarily uses a direct-assessment approach. Artifacts of student work pertinent to a particular learning outcome are collected. These artifacts are then evaluated by faculty external to the course in which the artifact was collected to determine students' level of mastery. Each learning outcome has been separated into sub-skills, or "measurable objectives", that are components of the overall learning objectives. Students' level of mastery is assessed using rubrics which have been developed for this purpose. To ensure inter-rater reliability, we implement processes whereby raters meet before and after artifacts are assessed. In addition, for follow-up (loop-closing) activities on subsequent artifact evaluation, the same raters are utilized when possible, for consistency and reliability.

The CIS program includes a senior capstone project course required of all majors. This course requires students to apply the communication, problem solving, and technical skills they have learned during the completion of the CIS program. Each team of students is assigned a live project in the Pueblo community (or sometimes surrounding areas). The team is evaluated on not only the final IT product they develop, but the process they follow in completing the project.

Finally, the CIS program meets annually with the CIS Industrial Advisory Committee to get feedback on the effectiveness of the CIS curriculum in meeting the needs of the IT industry along the Colorado Front Range. The CIS program also requires CIS graduates to complete a survey to determine the effectiveness of the program and curriculum in preparing them for jobs in IT.

General Requirements

- Students majoring in computer information systems must maintain grades of C or higher in all CIS courses. In addition, all required CIS prerequisites must be completed with a grade of C or higher.
- Students must complete at least 120 semester hours in an approved program of study, including 52 hours in the major.
- Students must complete a minimum of 21 credits of CIS upper-division course work. At least 16 of these upper-division CIS credits must be taken in residence.
- Students must complete a course planning worksheet and participate in the advisement process with a CIS faculty adviser.

Specific Requirements

CIS majors complete a total of 120 credits. These credits include 36 credit hours of general education, 52 credits in CIS major courses, 10 credits of quantitative analysis, 9 credits of required related non CIS courses and 13 credits of electives. CIS majors are encouraged to complete a minor in Business Administration or another Business-related minor. The minor may be completed within the 13 elective credits. The general elective courses must include the specific courses listed below.

General Education

Please refer to the General Education Requirements in the *Undergraduate Programs* section of this catalog. In meeting CSU-Pueblo's general education requirement, CIS majors must include the following:

Humanities: 3 credits of COMR 103 or equivalent

Social Science: ECON 201 and ECON 202

Mathematics: MATH 121

Quantitative Analysis Requirement

Courses		Titles	Credits
MATH	220	Quantitative Analysis for Business	4
BUSAD	265	Inferential Statistics and Problem Solving	3
BUSAD	360	Advanced Business Statistics	3

Required Related Courses

BUSAD	270	Business Communications	3
MGMT	201	Principles of Management	3
MGMT	368	Project Management	3

CIS Major Courses:

CIS Courses		Titles	Credits
CIS	100	Intro to Word & Windows	1
CIS	103	PowerPoint & Web Publishing	1
CIS	104	Excel Spreadsheets	1
CIS	105	MS Access DBMS	1
CIS	150	Computer Information Systems	3
CIS	171	Intro to Java Programming	4
CIS	185	PC Architecture	3
CIS	240	Object-Oriented Analysis & Design	3
CIS	271	Adv. Program Design with Java	4
CIS	289	Network Concepts	3
CIS	311	Introduction to Web Development	3
CIS	315	UNIX Operating System	3
CIS	350	Database Management	3
CIS	432	Senior Professional Project	6
CIS	493	Senior Seminar	1
CIS	3/400	Emphasis Area Electives	12

TOTAL 52

Students may select from the wide range of CIS electives listed below. By carefully selecting from the list, students may focus their CIS major in one of the following areas: computer security, software and web application development, systems analysis and design, database design and development, and network design and administration.

Special Projects and Internships will not be substituted for required CIS Major courses. They may count only as electives.

CIS Electives (must total 12 credits)

CIS Courses		Titles	Credits
CIS	356	Mobile Application Development	3
CIS	359	Advanced Programming with C#	3
CIS	360	IT Security	3
CIS	401	Network Systems Admin	3
CIS	402	Linux Networks & Routing	3
CIS	411	Internet Server-Side Programming	3
CIS	450	Advanced Data Analytics	3
CIS	461	IT Security Management	3
CIS	462	Computer Forensics	3
CIS	481	IT Implementation	3
CIS	482	IT Strategy	3
CIS	490	Special Projects	1-5
CIS	491	Special Topics	1-5
CIS	498	Internship	1-5

Business Environment

In addition to the requirement to complete (BUSAD 265, BUSAD 270, BUSAD 360, ECON 201, ECON 202, MGMT 201, MGMT 368, MATH 121 and MATH 220), CIS majors are strongly encouraged to complete a minor in Business Administration.

CIS MINOR

Non-CIS majors who wish to minor in CIS have several options. They may build their own minor based on the completion of seven core courses and one of five separate tracks. Students must complete a minimum of six credits of upper-division CIS courses.

Computer Information Systems Minor

Students who prefer a minor complete the following core and one of the listed tracks.

CIS Minor Core

CIS Courses		Titles	Credits
CIS	100	Introduction to Word and Windows	1
CIS	103	PowerPoint & Web Publishing	1
CIS	104	Excel Spreadsheets	1
CIS	105	MS Access DBMS	1
CIS	150	Computer Information Systems	3
CIS	171	Introduction to Java Programming	4
CIS	240	Object Oriented Analysis and Design	3

SUB-TOTAL 14

Personal Computers/Local Area Network Support

CIS Courses		Titles	Credits
CIS		Minor Core	14
CIS	185	PC Architecture	3
CIS	289	Network Concepts	3
CIS	401	Network Systems Administration OR	
CIS	402	Linux Networks and Routing	3

TOTAL 23

Information Analyst

CIS Courses		Titles	Credits
CIS		Minor Core	14
CIS	311	Introduction to Web Development	3
CIS	350	Database Management	3
CIS	450	Advanced Data Analytics	3

TOTAL 23

Web Development Specialist

CIS Courses		Titles	Credits
CIS		Minor Core	14
CIS	271	Advanced Program Design with Java	4
CIS	311	Introduction to Web Development	3
CIS	411	Internet Server-Side Programming	3

TOTAL 24

Software Engineer/Programmer

CIS Courses		Titles	Credits
CIS		Minor Core	14
CIS	271	Adv. Program Design with Java	4
CIS	356	Mobile Application Development	3
CIS	359	Advanced Programming with C#	3
			TOTAL 24

Computer Security

CIS Courses		Titles	Credits
CIS		Minor Core	14
CIS	360	IT Security	3
CIS	461	IT Security Management	3
CIS	462	Computer Forensics	3
			TOTAL 23

COMPUTER SECURITY CERTIFICATE

Non-degree seeking students may earn a Computer Security certificate from the CSU-Pueblo CIS program by completing the following courses. Students interested in the certificate program should contact the CIS department for further information. Certificates do not appear on the CSU-Pueblo transcript.

CIS Courses		Titles	Credits
CIS	185	PC Architecture	3
CIS	289	Network Concepts	3
CIS	315	Unix Operating Systems	3
CIS	360	IT Security	3
CIS	461	IT Security Management	3
CIS	462	Computer Forensics	3
CIS	401	Network Systems Administration OR	
CIS	402	Linux Networks and Routing	3
			SUB-TOTAL 21

ECONOMICS MAJOR

Faculty: Duncan, Hassan, Regassa, Whited

The major in economics leads to the Bachelor of Science in Business Administration (BSBA) and provides students with the theoretical and conceptual basis of economics. Economics majors are particularly well prepared to enter graduate programs in business in addition to assuming entry-level positions in business firms, nonprofit organizations or government. The major in economics also prepares the graduate for positions in banking, financial analysis, and related financial services industries.

Requirements for the Economics Major

Courses		Titles	Credits
ECON	302	Intermediate Microeconomics	3
ECON	310	Money and Banking	3
ECON	420	Regional Economic Analysis	3
FIN	3/400	Elective	3
BUSAD	480	Business Consulting	3
MGMT	414	Entrepreneurship	3
Business Electives (3/400-level)			6
			TOTAL 24

Requirements for the Economics Major with Finance Emphasis

Courses		Titles	Credits
ECON	302	Intermediate Microeconomics	3
ECON	310	Money and Banking	3
FIN	3/400	Electives	12
Business Elective 3/400-level			3

One elective from the following:			3
ACCTG	301	Intermediate Accounting I	3
BUSAD	480	Business Consulting	3
MGMT	414	Entrepreneurship	3
			TOTAL 24

Requirements for the Economics Minor

Courses		Titles	Credits
ACCTG	201	Financial Accounting	3
ECON	201	Principles of Macroeconomics	3
ECON	202	Principles of Microeconomics	3
ECON	302	Intermediate Microeconomics	3
ECON	310	Money and Banking	3
MGMT	201	Principles of Management	3

One elective from the following			3
ECON	420	Regional Economic Analysis	3
FIN	3/400	Elective	3
BUSAD	480	Business Consulting	3
MGMT	414	Entrepreneurship	3
			TOTAL 21

Requirements for the Finance Minor

Courses		Titles	Credits
ACCTG	201	Financial Accounting	3
ECON	201	Principles of Macroeconomics	3
ECON	202	Principles of Microeconomics	3
FIN	330	Principles of Finance	3
FIN	3/400	Electives	6
MGMT	201	Principles of Management	3
			TOTAL 21

A GPA of 2.000 or higher is required for the minors.

JOINT BSBA/MBA
(3 PLUS 2 PROGRAM)

Admission Requirements

The BSBA/MBA program is unique. It allows qualified students to earn both a BSBA and an MBA concurrently.

Students are required to take the Graduate Management Admissions Test (GMAT). An admission index formula of 200 times the undergraduate GPA (4.000 system) plus the GMAT score is used as an admission score. The undergraduate GPA must be based on a minimum of 90 semester hours of course work including MGMT 201, FIN 330, and MKTG 340. Students must have a minimum GPA of 3.25 and a GMAT of at least 450 (i.e., an index of 1100) to be admitted to the program.

Prior to enrolling in the first 500-level course, students are expected to have completed a significant portion of the requirements for their undergraduate major and must have submitted an acceptable GMAT.

NOTE: Students are strongly encouraged to complete an internship prior to enrolling in graduate-level courses.

General Requirements

Students in the joint BSBA/MBA program must complete:

- The Undergraduate Business Core (excluding BUSAD 302, MGMT 301, MGMT 311, and MGMT 485);
- BUSAD 493;
- A major within the Hasan School of Business; and
- All remaining specified MBA courses.

In addition, students must satisfy all GPA requirements for the BSBA and the MBA (see the MBA listing under the *Graduate Programs* section of the catalog).

MBA Core

Courses		Titles	Credits
ACCTG	510	Managerial Accounting	3
BUSAD	502	Business Ethics and Environment	3
BUSAD	575	International Business	3
ECON	510	Economics for Managers	3
FIN	530	Financial Management	3
MGMT	511	Production/Operations Management	3
MGMT	520	Management of Organizational Behavior	3
MGMT	565	Management Information Systems	3
MGMT	585	Management Policy & Strategy	3
MKTG	540	Marketing Management	3

In addition, the following MBA courses must be completed:

Courses	Credits
Approved Graduate Electives	6
TOTAL GRADUATE	**36**

In summary, the joint degree plan has the following requirements:

General Education	36
Open Electives	15
Business Core	*33
Business Major	24
MBA requirements	36
JOINT DEGREE TOTAL	**144**

*ECON 201 and ECON 202 are counted in General Education.

Independent Studies, Directed Studies, Internships, and Special Projects will not be substituted for core or required courses. They may count only as electives.

Students who complete part of the joint degree plan but decide to opt out of the MBA program and continue towards earning **only** the BSBA are granted credit towards the BSBA for 500-level courses taken as follows:

500-Level Course Taken		300- and 400-Level Course Credit	
ACCTG	510	ACCTG	495
BUSAD	502	BUSAD	302
ECON	510	ECON	308
MGMT	511	MGMT	311
MGMT	520	MGMT	301
MGMT	585	MGMT	485
MKTG	540	MKTG	495
ACCTG, BUSAD, ECON, FIN, MGMT, MKTG			
	575		475

JOINT BS-CIS/MBA
(3 PLUS 2 Program)

Admission Requirements

The BS-CIS/MBA program is unique. It allows qualified students to earn both a BS degree in CIS and an MBA concurrently.

Students are required to take the Graduate Management Admissions Test (GMAT). An admission index formula of 200 times the undergraduate GPA (4.000 system) plus the GMAT score is used as an admission score. The

undergraduate GPA must be based on a minimum of 90 semester hours of course work, including MGMT 201, FIN 330, and MKTG 340. Students must have a minimum GPA of 3.5 and a GMAT of at least 450 (i.e., an index of 1100) to be admitted to the program.

Prior to enrolling in the first 500-level course, students are expected to have completed a significant portion of the requirements for their undergraduate major and must have submitted an acceptable GMAT.

NOTE: Students are strongly encouraged to complete an internship prior to enrolling in graduate-level courses.

General Requirements

Students in the joint BS-CIS/MBA program must complete:

- The CIS required and required-related courses excluding CIS 350 and CIS 432;
- ACCTG 201, ECON 202, FIN 330 and MKTG 340;
- The CIS major within the Hasan School of Business; and
- All remaining specified MBA courses.

In addition, students must satisfy all GPA requirements for the BS in CIS and the MBA (see the MBA listing under the *Graduate Programs* section of the catalog).

Special Projects and Internships will not be substituted for required CIS major courses. Independent Studies will not be substituted for required MBA courses.

MBA Required Courses

Courses		Titles	Credits
ACCTG	510	Managerial Accounting	3
BUSAD	502	Business Ethics and Environment	3
ECON	510	Economics for Managers	3
FIN	530	Financial Management	3
MGMT	511	Production/Operations Management	3
MGMT	520	Management of Organizational Behavior	3
MGMT	585	Management Policy & Strategy	3
MKTG	540	Marketing Management	3

In addition, the following CIS courses must be completed:

Courses		Titles	Credits
CIS	532	Senior Professional Project	6
CIS	550	Data Base Systems	3
CIS	581	IT Implementation OR	
CIS	582	IT Strategy	3

TOTAL GRADUATE   36

In summary, the joint degree plan has the following requirements:

General Education 36
Quantitative Analysis... 10
Required-related Courses 9
Courses toward Business Administration Minor 13
CIS Required Courses 31
CIS Elective Courses 9
MBA Requirements... 36

JOINT DEGREE TOTAL   144

Students who complete part of the joint degree plan but decide to opt out of the MBA program and continue toward earning **only** the BS in CIS are granted credit toward the BS for 500-level courses taken as follows:

500-Level Course Taken		300- and 400-Level Course Credit	
ACCTG	510	ACCTG	495
BUSAD	502	BUSAD	302
ECON	510	ECON	308
MGMT	511	MGMT	311
MGMT	520	MGMT	301
MGMT	585	MGMT	485
MKTG	540	MKTG	495
CIS	532	CIS	432
CIS	550	CIS	350
CIS	581	CIS	481
CIS	582	CIS	482

COURSE DESCRIPTION INFORMATION

Colorado State University-Pueblo does not offer all the courses listed in this catalog every semester or every year.

Each semester the University creates an on-line course offering module listing a detailed schedule of courses offered and the times and places of instruction. Courses listed in the on-line course offering module are subject to change.

EXPLANATORY NOTES

Numbering of Courses

Course numbering is based on the content level of material presented in courses.

Courses numbered:

000-099	Remedial; do not count toward graduation
100-299	Freshmen/Sophomore level (lower division)
300-499	Junior/Senior level (upper division)
500-699	Graduate level
900-999	Post-master's

Variable Credit Courses

(1-3 VAR) indicates variable credit; the minimum and maximum credit limitations. An example:

> **494   Field Experience (1-5 VAR)**
> Off-campus individual experience providing transition from classroom instruction to on-the-job experience. Supervised by instructor and job supervisor. Prerequisite: senior standing and permission of instructor.

Cross-listed Courses

Courses in which students may earn credit under either (but not both) of two prefixes (e.g., SOC or HIST) for the same offering.

Corequisite

A requirement which must be taken concurrently with another course of instruction.

Prerequisite

A requirement which must be fulfilled before a student can enroll in a particular course.

Minimum Grade for Prerequisite

The University policy for prerequisite grades is a C; however, the department has the authority to override individual course requirements.

Repeatable

Some specified courses may be repeated for credit. These courses are designated by the word Repeatable in the Course Description section of this catalog. The number after the word Repeatable indicates the maximum number of credits that may be used toward degree requirements.

General Education Courses

E	Written Communication (English Composition)
M	Quantitative Reasoning (Mathematics)
H	Humanities
SS	Social Science
HS	History
ST	Natural and Physical Science
GT	Guaranteed transfer to Colorado two-year and four-year institutions

Cross Cultural Requirement

CC	Course meets Cross-Cultural requirement

Cancellation of Courses

The University reserves the right to cancel courses not selected by an adequate number of students or not suitably staffed by qualified faculty.

KEYS TO SYMBOLS

Course descriptions include a variety of symbols conveying essential information. The following standard course description with explanation of symbols serves as a model:

MUS 127 Functional Piano I: Beginning 1(0-2)
For students with no piano experience. Introduces fundamentals, with emphasis on providing skills necessary for successful completion of the Proficiency Exam. May be repeated. (F,S) Repeatable (2)

MUS......................course prefix

127........................course number

Functional Piano I: Beginning .. course title

1(0-2).....................number of credits (clock hours in lecture per week – clock hours in laboratory demonstration or studio experiences per week)

"For students" ....explanation of course content

(F,S)......................taught fall, spring

Repeatable (2) .....course may be repeated and counted toward graduation for a maximum of 2 credits

Note: Not all of the above information may be noted in each course. Additional symbols include:

F	Taught fall semester
S	Taught spring semester
SS	Taught summer session
*	Offered upon demand
O	Taught odd numbered years
E	Taught even numbered years

VAR   Variable credit course

L   Suffix indicating lab course

IP   Grade of IP (In Progress) available

S/U   Grade of S or U available

UNIVERSITY-WIDE "HOUSE-NUMBERED" COURSES

200, 300, 400, 500, 600, 900	Workshop
290, 390, 490, 590, 690, 990	Special Project
291, 391, 491, 591, 691, 991	Special Topics
292, 392, 492, 592, 692, 992	Research
293, 393, 493, 593, 693, 993	Seminar
294, 394, 494, 594, 694, 994	Field Experience
295, 395, 495, 595, 695, 995	Independent Study
296, 396, 496, 596, 696, 996	Cooperative Ed
297, 397, 497, 597, 697, 997	Studio Series
298, 398, 498, 598, 698, 998	Internship
599, 699, 999	Thesis Research

COURSE PREFIXES

Courses of instruction are identified by the following approved prefixes:

ACCTG	–	Accounting
AIM	–	Automotive Industry Management
ANTHR	–	Anthropology
ART	–	Art
ASL		American Sign Language
AT		Athletic Training
BBE	–	Bilingual Bicultural Education
BIOL	–	Biology
BUSAD	–	Business Administration
CET	–	Civil Engineering Technology
CHEM	–	Chemistry
CIS	–	Computer Information Systems
COMR		Communication & Rhetoric
CM	–	Construction Management
CR	–	Continuous Registration
CS	–	Chicano Studies
DS		Diversity Studies
ECON	–	Economics
ED	–	Education
EE	–	Electrical Engineering
EN	–	Engineering
ENG	–	English
ESL	-	English as a Second Language
EXHP	–	Exercise Science and Health Promotion
FIN	–	Finance
FL	–	Foreign Language
FRN	–	French
GEOG	–	Geography
GEOL	–	Geology
GER	–	German
HIST	–	History
HONOR		Honors
INTL	–	International Studies
ITL	–	Italian
MATH	–	Mathematics
MCCNM	–	Mass Communications/Center New Media

ME	–	Mechanical Engineering
MGMT	–	Management
MKTG	–	Marketing
MSL	–	Military Science and Leadership
MUS	–	Music
NSE		National Student Exchange
NSG	–	Nursing
PHIL	–	Philosophy
PHYS	–	Physics
PLP	–	President's Leadership Program
POLSC	–	Political Science
PSYCH	–	Psychology
RDG	–	Reading
REC	–	Recreation
RUS	–	Russian
SCI	–	Science
SOC	–	Sociology
SOCSC	–	Social Science
SPN	–	Spanish
SW	–	Social Work
TH	–	Theatre
US	–	University Studies
WS	–	Women's Studies

COURSE DESCRIPTIONS

ACCOUNTING (ACCTG)

UNDERGRADUATE COURSES

ACCTG 201 Principles of Financial Accounting 3(3-0)
Introduction to accounting as the language of business. Emphasis on reasoning and logic of external reporting model. May include computer-based applications. Prerequisite: MATH 109 or MATH 121 or MATH 156 or BUSAD 265. (*)

ACCTG 202 Principles of Managerial Accounting 3(3-0)
Managerial uses of accounting information, including cost-based, decision making, differential accounting, and responsibility accounting. May include computer-based applications. Prerequisite: ACCTG 201, (*)

ACCTG 301 Intermediate Accounting I 3(3-0)
Conceptual framework, accounting cycle, financial statements, time value of money, revenue recognition, and accounting for cash, receivables, inventory, and long-term assets. Prerequisite: ACCTG 202 and junior standing. (F)

ACCTG 302 Intermediate Accounting II 3(3-0)
Investments, liabilities, bonds, leases, income taxes, pensions, employee benefit plans, shareholder equity, earnings per share, accounting changes and errors, and the statement of cash flows. Prerequisite: ACCTG 301. (S)

ACCTG 311 Federal Income Tax 3(3-0)
Federal income tax as applied to income recognition, exclusions from income and property transactions of individuals. Introduction to tax research resources and techniques. Prerequisite: ACCTG 202. (*)

ACCTG 320 Cost Accounting 3(3-0)
Accounting procedures applicable to industries with emphasis on job order process costs, standard cost and profit planning including differential costs, internal profit and price policies, and capital budgeting. Prerequisite: ACCTG 202 and junior standing. (*)

ACCTG 330 Accounting Information Systems 3(3-0)
The study of design and implementation of accounting information systems. Attention directed to the traditional accounting model and its relationship to computerized accounting information systems. Prerequisite: ACCTG 201. (*)

ACCTG 401 Advanced Financial Accounting 3(3-0)
Application of fundamental theory to partnerships, international operations, consolidated statements, and business combinations; introduction to government. Prerequisite: ACCTG 302. (*)

ACCTG 404 CPA Law 3(3-0)
Business law as found in the Regulation section of the Uniform CPA examination. Prerequisite: senior standing, accounting major. (*)

ACCTG 410 Auditing 3(3-0)
A study of the systematic process by which external financial statements and other management assertions are verified and reported upon by independent, internal, and governmental auditors. Prerequisite: ACCTG 302 and 330. (*)

ACCTG 411 Corporate, Estate and Gift Tax 3(3-0)
Taxation of corporations, partnerships, estates/trusts. Analysis of mergers and dissolution of corporations. Introduction to estate/gift taxes and international taxation. Prerequisite: ACCTG 311. (*)

ACCTG 491 Special Topics (1-3 VAR)
(*) Repeatable (6)

ACCTG 495 Independent Study (1-3 VAR)
Prerequisite: senior standing, accounting major and adviser permission. (*) Repeatable (6)

ACCTG 498 Internship (1-6 VAR)
Supervised field work in selected business, social and governmental organizations; supplemented by written reports. (S/U grading.) Prerequisite: junior or senior standing in School of Business and permission of internship coordinator. (*) Repeatable (6)

GRADUATE COURSES

ACCTG 501 Fundamentals of Accounting 1.5(1.5-0)
This class, as an MBA leveling course, provides a basic understanding of financial reporting accounting, including the accounting cycle, financial statement preparation, and internal controls. Prerequisite: admission to MBA. (*)

ACCTG 505 Principles of Financial Accounting 3(3-0)
Introduction to accounting as the language of business. Emphasis on reasoning and logic of external reporting model. May include computer-based applications. (*)

ACCTG 510 Managerial Accounting 3(3-0)
Accounting concepts and methods utilized in managerial planning, budgeting, controlling, and evaluating to optimize decision making. Prerequisite: admission to MBA or permission of MBA Director. (*)

ACCTG 511 Tax Planning and Research 3(3-0)
Advanced study of tax research methodology, IRS and professional guidelines on tax positions, appreciation of research skills, planning techniques to individual, corporate, partnership cases. Prerequisite: ACCTG 311. (*)

ACCTG 520 Advanced Cost Management Systems 3(3-0)
Cost systems supporting new management philosophies–JIT, total quality management, continuous improvement, process reengineering. Activity-based costing, target costs, cost of quality. Prerequisite: ACCTG 320 and admission to MBA or permission of MBA Director. (*)

ACCTG 591 Special Topics 3(3-0)
Critical review and discussion of relevant accounting topics. (*) Repeatable (6)

ACCTG 595 Independent Study (1-3 VAR)
Individual study of a subject determined by the instructor and student with permission of the director. Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

AUTOMOTIVE INDUSTRY MANAGEMENT (AIM)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

AIM 105 Introduction to the Parts and Service Industry 1(1-0)
Introduction to the industry from viewpoint of history, social impact, organization structure, manpower needs, and future growth. (F)

AIM 115 Automotive Engine Design, Operation and Repair 5(3-4)
Design, operation and repair techniques of current and future automotive engines. (F)

AIM 125 Automotive Suspension and Brake Systems 3(3-0)
Design and theory of front and rear automotive suspensions, steering, and brake systems. (F)

AIM 125L Automotive Suspension and Brake Systems Lab 1(0-2)
Corequisite: AIM 125. (F)

AIM 155 Automotive Parts Operations 4(4-0)
Study of automotive industry management theory and styles of store operations including customer service skills, associate interaction, managerial responsibilities. Product and parts catalog knowledge/advertising. (F)

AIM 165 Automotive Power Trains and Drive Lines 3(3-0)
Design and theory of standard and automatic transmissions, clutches, drive lines, differentials, and transaxles. Corequisite: AIM 165L. (S)

AIM 165L Automotive Power Trains and Drive Lines Lab 1(0-2)
Corequisite: AIM 165. (S)

AIM 235 Automotive Fuel Systems and Exhaust Emissions 3(3-0)
Design and theory of automotive fuel systems, fuel injection, and supercharging; functions and design of automotive emissions systems. Prerequisite: AIM 115 and AIM 245. Corequisite: AIM 235L. (S)

AIM 235L Automotive Fuel Systems and Exhaust Emissions Systems Lab 1(0-2)
Corequisite: AIM 235. (S)

AIM 245 Automotive Electrical Systems I 3(3-0)
Design and theory of operation of automotive electrical circuits; ignition, starting, charging, and accessory circuits, with study of diagnostic equipment used to diagnose system malfunctions. (F)

AIM 245L Automotive Electrical Systems Laboratory I 1(0-2)
Corequisite: AIM 245. (F)

AIM 255 Automotive Electrical Systems II 3(3-0)
Design and operational theory of solid state ignitions systems and computer-controlled systems including engine, braking, transmission, emission, and comfort systems. Prerequisite: AIM 245/245L. Corequisite: AIM 255L. (S)

AIM 255L Automotive Electrical Systems II Lab 1(0-2)
Corequisite: AIM 255. (S)

AIM 265 Automotive Parts Management Systems 4(3-2)
A study of automotive parts service management software systems utilized by industry in distribution, inventory, basic procedures. Prerequisite: AIM 155. (S)

AIM 296 Cooperative Education Placement (1-5 VAR)
Supervised industrial field work. Prerequisite: freshman or sophomore standing, AIM major. (F,S)

AIM 305 Regulatory, Enviro, Health Issues 3(3-0)
A study of automotive regulatory issues to include, OSHA, SDS, environmental and concerns. (F)

AIM 325 Fuels and Lubricant Production, Marketing and Conservation 3(3-0)
Petroleum industry; basic production processes, marketing techniques, alternate fuel sources, and conservation techniques. (F)

AIM 335 Automotive Shop Practices 5(2-6)
Diagnosis of electrical, fuel, engine, brake and transmission systems; study of service management and service writer duties. Prerequisite: AIM 125/125L, 165/165L, 235/235L, 255/255L and AIM 345. (S)

AIM 345 Advanced Automotive Systems 5(3-4)
Theory and lab experience on new concepts in automotive electrical, fuel and suspension systems. Prerequisite: AIM 125/125L, 165/165L, 235/235L, 255/255L. (F)

AIM 405 Personal Selling Methods and Techniques 4(3-2)
Research, preparation and presentation methods and techniques for selling in the automotive milieu. (F)

AIM 425 Automotive Financial Management 5(4-2)
A study of financial management and analysis used by automotive aftermarket and original equipment businesses. Prerequisite: AIM 155 and AIM 265. (S)

AIM 490 Special Projects (1-5 VAR)
Special interest area. (*) Repeatable (10)

AIM 491 Special Topics (1-5 VAR)
(F,S) Repeatable (10)

AIM 495 Independent Study (1-4 VAR)
Directed, independent study of topics agreed upon by the student and instructor. (F,S,SS) Repeatable (10)

AIM 496 Cooperative Education Placement (1-5 VAR)
Supervised industrial field work. Prerequisite: junior or senior standing, AIM major. (F,S) Repeatable (10)

ANTHROPOLOGY (ANTHR)

UNDERGRADUATE COURSES

ANTHR 100 Cultural Anthropology 3(3-0)
Introduction to the concepts by which anthropology understands particular lifestyles, and to the constructs by which it accounts for similarities and differences among lifestyles. (*) (Gen Ed: SS, GT-SS3) (CC)

ANTHR 104 Human Origins 3(3-0)
Biological nature of humans; emphasis on how forces of evolution have shaped human nature. (*)

ANTHR 106 (ENG 106) Language, Thought and Culture 3(3-0)
Cross-cultural introduction to language processes in human society. (*) (Gen Ed: SS) (CC)

ANTHR 212 (SOC 212) The Forensics of Bones 3(3-0)
Familiarize students with the basic procedures used by forensic anthropologists to obtain evidence in criminal investigations. (*)

ANTHR 250 (SOC 250) The Sacred in Culture 3(3-0)
Concepts of the supernatural studied cross-culturally and in particular cultures. Analysis of the role of religion in helping individuals adjust to stress and aging. (*)

ANTHR 291 Special Topics (1-3 VAR) (*) Repeatable

ANTHR 301 Peoples and Cultures of the Southwest 3(3-0)
Examination of the region's multiethnic and pluralistic society; emphasis on adverse adaptations to distinctive nature and cultural environments. Prerequisite: ANTHR 100. (*)

ANTHR 310 (SOC 310) Social and Cultural Theory 3(3-0)
From classical to contemporary theory in sociology and anthropology. Prerequisite: SOC 101 or ANTHR 100. (*)

ANTHR 401 (SOC 401) Health, Culture and Society 3(3-0)
Analysis of cultural, social, and psychological factors influencing health and health-care. Prerequisite: junior or senior standing. (*)

ANTHR 402 (SOC 402) Aging, Culture and Society 3(3-0)
Cultural, sociological, and psychological dimensions of aging. Prerequisite: junior or senior standing. (*)

ANTHR 416 (SOC 416) Crime and the Mind 3(3-0)
Examination of "crime" as an ongoing aspect of human existence. Prerequisite: SOC 101 or ANTHR 100. (*)

ANTHR 451 (SOC 451) Culture/Deviance/Psychopathology 3(3-0)
Analysis of the relationship between culture and the causes and manifestations of deviance and psycho-pathology. Prerequisite: SOC 101 or ANTHR 100. (*)

ANTHR 452 (SOC 452) Self and Society 3(3-0)
Examination of the self and society within anthropological theory. Special emphasis will be placed on symbolic interactionism and cross-cultural approaches. Prerequisite: SOC 101 or ANTHR 100 or SOC 352 or PSYCH 352. (*)

ANTHR 491 Special Topics (1-3 VAR) (*) Repeatable

ANTHR 492 (SOC 492) Research 3(3-0)
Qualitative and quantitative methods and designs in sociological research. Prerequisite: junior or senior standing and permission of instructor. (*)

ANTHR 493 Seminar (2-4 VAR) (*)

ANTHR 494 Field Experience (3, 4, 5, 6, 12 VAR)
Practical experience in an agency setting. Prerequisite: junior or senior standing and permission of instructor. (*) Repeatable

ANTHR 495 Independent Study (1-10 VAR)
Directed study for students interested in specific areas of anthropological concern. Prerequisite: permission of instructor. (*) Repeatable

ART (ART)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

ART 100 Visual Dynamics 3(3-0)
Appreciation and understanding of visual experiences and techniques reflecting the cultural dynamics of creativity. (F,S, SS) (Gen Ed: H, GT- AH1) (CC)

ART 110 Art Career Orientation 1(1-0)
Guided development of individual job objectives. (S/U grading) (F)

ART 115 Two-Dimensional Design 3(1-4)
The foundation of visual form, emphasizing two-dimensional design and color theory. (F,SS)

ART 116 Three-Dimensional Design 3(1-4)
The foundation of visual form, emphasizing three dimensional design. (F,S)

ART 141 Drawing I 3(1-4)
Development of perception and technical skills in rendering. (F,S)

ART 211 History of Art I 3(3-0)
A survey of world art from prehistory to ca. 1300 CE. Introduces issues related to visual design, historical context, and interpretation of works of art. (F,*) (Gen Ed: H, GT-AH1) (CC)

ART 212 History of Art II 3(3-0)
A survey of world art from ca. 1300 CE to contemporary times. Introduces issues related to visual design, historical context and interpretation of works of art. (S,*) (Gen Ed: H, GT-AH1) (CC)

ART 233 Sculpture I 3(1-4)
Basic problems in sculpture relating specific concerns of visual form and process. Prerequisite: ART 116 or permission of instructor. (F,S)

ART 234 Painting I 3(1-4)
Introduction to painting in oil and acrylic where the control of space will be approached through the use of color. Prerequisite: ART 115 and ART 141 or permission of instructor. (F,S,SS)

ART 242 Drawing II 3(1-4)
Continued development of perception and technical skills in rendering, utilizing the human figure. Detail investigation of the skeleton and muscle forms are explored. Prerequisite: ART 141. (S,SS)

ART 247 Ceramics I 3(1-4)
Essential skills in ceramic processes; emphasis on form and function as related to students' needs and creative intent. (F,S,SS)

ART 270 Printmaking I 3(1-4)
Introduction to multiple image production utilizing relief printing including woodcut, linocut and collagraph. Introduction to shop techniques, safety procedures and history of the medium. Prerequisite: Art core or permission of instructor. (F,S)

ART 274 Digital Art I 3(1-4)
This course is an introduction to two-dimensional Digital Art. The student will learn to create original imagery through the use of art-oriented software. (F)

ART 276 Photography I 3(1-4)
Photography as an art form and as an adjunct to other art media. Prerequisite: Art core or permission of instructor. (F,S)

ART 281 Graphic Design I 3(1-4)
A basic treatment of graphic processes and techniques related to advertising design and visual communication. Prerequisite: ART 115 and ART 141 or permission of instructor. (S)

ART 291 Special Topics (1-5 VAR)
(F,S,SS) Repeatable

ART 301 Late Twentieth-Century Aesthetics 3(3-0)
This course introduces the classic writings in ancient and modern philosophy theory and criticism informing American and European art of the late twentieth century. (SS)

ART 310 Portfolio Review 1(1-0)
Art majors must present a portfolio of their artwork or art history research prospectus for the art faculty to evaluate. Prerequisite: Art core classes. (S/U grading) (F)

ART 311 Ancient Art 3(3-0)
A study of the visual arts of the major civilizations of the ancient Mediterranean world, including Egypt, Greece and Rome. Prerequisite: ART 211. (*)

ART 312 Medieval Art 3(3-0)
A study of the art and architecture produced in Europe during the Middle Ages from ca. 325 to 1300 CE. Prerequisite: ART 211. (*)

ART 313 Renaissance Art 3(3-0)
A study of art and architecture in Italy and the Netherlands from ca. 1300 to 1600 CE. Prerequisite: ART 212. (*)

ART 314 Baroque and Rococo Art 3(3-0)
A study of art in Europe from ca. 1600 to 1785. Examines the diverse art forms in Italy, Spain, England, Holland and France. Prerequisite: ART 212. (*)

ART 315 Nineteenth-Century Art 3(3-0)
A study of art produced during the nineteenth-century in Europe and the Americas, with emphasis on France and the United States. Prerequisite: ART 212. (*)

ART 333 Sculpture II: Site Art 3(1-4)
Creating sculptural elements whose form and content are a response to its site and context. Prerequisite: ART 233 or permission of instructor. (F,S) Repeatable (9)

ART 334 Painting II 3(1-4)
Techniques in oil and acrylic emphasizing the application of materials to subject matter and composition. Prerequisite: ART 234 (F,S,SS)

ART 342 Drawing III 3(1-4)
Advanced course in pursuit of increased skills of perception and artistic anatomy. Prerequisite: ART 141, 242. (F,SS) Repeatable (9)

ART 347 Ceramics II 3(1-4)
In-depth development of specific ceramic techniques; skills and personalization of style. Students will load and fire all the kilns as well as mix glazes. Prerequisite: ART 247 or permission of instructor. (F,S,SS) Repeatable (9)

ART 370 Printmaking II 3(1-4)
Introduction to traditional and non-traditional methods of Intaglio printing including line etch, aquatint, dry point, resist methods, photo processes and color printing. Prerequisite: ART 270. (F,S) Repeatable (9)

ART 374 Digital Art II 3(1-4)
Introduction to time-based Digital Art. The student will learn the creative potential of the art of the moving image through digital video oriented software. Prerequisite: ART 274. (S)

ART 376 Photography II 3(1-4)
Photography as an art form and an adjunct to other art media. Prerequisite: ART 276. (S)

ART 381 Graphic Design II 3(1-4)
Intermediate graphic design techniques including typography, pre-press and client relations. Prerequisite: ART 281 or permission of instructor. (F)

ART 382 Illustration 2(0-4)
Images rendered in varying techniques to express ideas related to commercial application. Prerequisite: ART 381 or permission of instructor. (F,S,SS)

ART 383 Exhibition Design 2(0-4)
Communication and design principles applied to the display of objects. Special attention to museum and gallery installations. Prerequisite: permission of instructor. (F,S,SS)

ART 397 Studio Series (1-3 VAR)
Advanced studio offerings for students who have completed all other course offerings in a specific discipline. Scheduled concurrently with lower-division studios. Prerequisite: permission of instructor. (F,S,SS) Repeatable (9)

ART 410 Senior Career Orientation 1(1-0)
Formal presentation of student's portfolio or art history research to the art faculty. Senior exhibition, artist's statement, resumes and job placement interviews. Prerequisite: senior standing. (S/U grading) (S)

ART 411 Twentieth-Century Art 3(3-0)
A survey of major developments in the visual arts, art theory, and criticism during the twentieth century. Prerequisite: ART 212. (F)

ART 412 Contemporary Art (1-3 VAR)
A study of selected recent developments in the visual arts. Reading, viewing, and discussion of new developments in media, art theory and criticism. Prerequisite: ART 411. (*)

ART 413 Native American Art 3(3-0)
A study of art and visual design in Native North American cultures from prehistory to contemporary times. Prerequisite: ART 212. (*)

ART 414 Asian Art 3(3-0)
A survey of art from major cultures of Asia and the Far East from ancient to contemporary times. Prerequisite: ART 211. (*)

ART 415 Latin American Art 3(3-0)
A survey of art of Latin America from ancient to the contemporary times. Includes Chicano art. Prerequisite: ART 212. (*)

ART 433 Advanced Site Art 3(1-4)
Advanced projects in Site Art that involve the presentation and creation of site specific sculptural forms. Prerequisite: ART 333 or permission of instructor. (F,S) Repeatable (9)

ART 434 Painting III 3(1-4)
Advanced painting with an emphasis on individual development. Focus pertains to formal, pictorial and technical problems met in developed personal imagery. Prerequisite: ART 334. (F,S,SS) Repeatable (9)

ART 442 Drawing IV 3(1-4)
Emphasis on development of individual skills of perception and exploration of new techniques and materials. May be repeated twice. Prerequisite: ART 342. (F,S,SS) Repeatable (9)

ART 447 Advanced Ceramics/ Kiln Construction 3(1-4)
This course explores advanced theories and techniques involved in working with clay: forming, firing, glazing, kiln design and construction. Prerequisite: ART 347 or permission of instructor. (F,S,SS) Repeatable (9)

ART 470 Printmaking III 3(1-4)
Introduction to lithography printing using stones, aluminum plates and photo processes in black and white and multiple color techniques. Prerequisite: ART 370. (F,S) Repeatable (9)

ART 474 Digital Art III 3(1-4)
In this course the student will learn to further develop the potential of Digital Art through the exploration of internet art, video and sound art. Prerequisite: ART 374. (F) Repeatable (9)

ART 476 Photography III 3(1-4)
Students are encouraged to pursue specific areas of interest, and advance their personal imagery while continuing study of postmodern themes in contemporary photography. Prerequisite: ART 376. (F,S) Repeatable (9)

ART 481 Advanced Graphic Design I 3(1-4)
Using advanced principles, this workshop operates as a professional studio with designers, an art director, production manager, copywriter, computer manager, etc., producing posters, logos and brochures. Prerequisite: ART 281, 381 or permission of instructor. (S) Repeatable (9)

ART 491 Special Topics (1-5 VAR) (F,S,SS) Repeatable

ART 494 Field Experience (1-5 VAR)
Off-campus individual experience providing transition from classroom instruction to on-the-job experience. Prerequisite: senior standing and permission of instructor. (F,S,SS)

ART 495 Independent Study (1-5 VAR)
Individual tutorial experience. Prerequisite: junior or senior standing and permission of instructor. (F,S,SS)

ART 496 Cooperative Education Placement (1-4 VAR)
Prerequisite: permission of instructor. (F,S,SS)

ART 497 Studio Series (1-3 VAR)
Advanced sections of studio offerings. Prerequisite: ART 397 or permission of instructor. (F,S,SS) Repeatable

GRADUATE COURSES

ART 500 Workshop (1-5 VAR)
Using materials and techniques based on advanced concepts and ideas. Prerequisite: permission of instructor and graduate standing. (F,S,SS) Repeatable

ART 511 Twentieth-Century Art (1-3 VAR)
Graduate study of artists, their biographies and art, politics and culture, from the middle of the nineteenth through the end of the twentieth century. Prerequisite: permission of instructor. (F,S,SS) Repeatable

ART 512 Contemporary Art 3(3-0)
Advanced study in contemporary art and associated criticism, aesthetics and the philosophy of art through the end of the twentieth century. Prerequisite: ART 212 or permission of instructor. (*)

ART 533 Graduate Level Sculpture/Public Art 3(0-6)
Graduate level work in sculpture/public art including explorations in content, context, critique and techniques. Prerequisite: three semesters of undergraduate sculpture or permission of instructor. (F,S) Repeatable

ART 542 Graduate Drawing 3(1-4)
Professional drawing practices utilizing quality papers and display presentation. Prerequisite: ART 412. (*)

ART 547 Ceramics (1-3 VAR)
Graduate level work in clay including explorations in ceramic content, context, critique and techniques (forming, firing and glazing). Prerequisite: three semesters of undergraduate ceramics or permission of instructor. (F,S,SS) Repeatable

ART 570 Graduate Printmaking 3(0-6)
Graduate students will develop their personal, creative approach to image making through innovative exploration of relief, intaglio or lithography. Prerequisite: ART 470. (*)

ART 591 Special Topics (1-3 VAR)
Prerequisite: permission of instructor and graduate standing. (F,S,SS) Repeatable

ART 597 Studio Series (1-3 VAR)
Graduate level studies. Prerequisite: permission of instructor. (F,S,SS) Repeatable

AMERICAN SIGN LANGUAGE (ASL)

UNDERGRADUATE COURSES

ASL 101 Beginning American Sign Language I 3(3-0)
Development of skills for communicative interaction with and among the deaf by means of hand symbolization and cultural understanding. (F) (Gen Ed: H) (CC)

ASL 102 Beginning American Sign Language II 3(3-0)
Continuation of the development of skills for communicative interaction with and among the deaf by means of hand symbolization and cultural understanding. Prerequisite: ASL 101 or permission of instructor. (S) (Gen Ed: H) (CC)

ASL 201 Intermediate American Sign Language I 3(3-0)
Development of intermediate skills for communicative interaction with and among the deaf by means of hand symbolization and cultural understanding. Prerequisite: ASL 102. (*)

ASL 202 Intermediate American Sign Language II 3(3-0)
Development of intermediate to advanced skills for communicative interaction with and among the deaf by means of hand symbolization and cultural understanding. Prerequisite: ASL 102. (*)

ATHLETIC TRAINING (AT)

UNDERGRADUATE COURSES

AT 101 Introduction to Athletic Training 2(2-0)
Introduction to the profession and overview of the fundamentals of athletic training. (F,S)

AT 232 First Aid 2(1-1)
Knowledge and skills in current first-aid and CPR procedures for the Lay Responder. Red Cross certification. (F,S,SS)

AT 233 Emergency Care in Athletic Training 1(1-1)
CPR/AED training for the Professional Rescuer. Also, covers other emergency care skills used by athletic trainers. Prerequisite: AT 232 with a grade of B or better. (F,S,SS)

AT 260 Care and Prevention of Athletic Injuries 3(2-2)
Procedures in the prevention, care and treatment of injuries sustained during activity and athletic participation. (F,S)

AT 279 Practicum in Athletic Training I 2(0-4)
Instruction, practice and evaluation of assigned NATA psychomotor competencies and clinical proficiencies. Prerequisite: AT 232 with a grade of B or better and AT 260 with a grade of C or better. (F,S)

AT 291 Special Topics (1-5 VAR) (F,S) Repeatable

AT 323 Functional Exercise Training 2(1-2)
Course applications include exercise program design, aspects of functional training, and components of various types of exercise regimens as related to injury prevention and recovery. Prerequisite: EXHP 364. (S)

AT 330 Lower Extremity Evaluation 3(2-2)
An in-depth study of assessment techniques and protocols applicable to injuries to the lower extremities. Prerequisite: AT 279 with a grade of B or better, BIOL 223, 223L with grades of C or better and approval of program director. (F)

AT 331 Upper Extremity Evaluation 3(2-2)
An in-depth study of assessment techniques and protocols applicable to injuries to the upper extremities. Prerequisite: AT 279 with grade of B or better, BIOL 223, 223L with grades of C or better and approval of program director. (S)

AT 332 Head, Neck, and Spine Evaluation 3(2-2)
An in-depth study of assessment techniques and protocols applicable to injuries to the head, neck and spine. Prerequisite: AT 330 and AT 331 with a grade of C or better. (F)

AT 339 Clinical Pathology and Assessment 3(2-2)
Study of differential signs and symptoms produced by systemic diseases affecting physical activity in individuals to enable the athletic trainer in making sound clinical decisions. Prerequisite: AT 330 with a grade of C or better, or approval of program director. (S)

AT 379 Practicum in Athletic Training II 1(0-2)
Continued instruction, practice and evaluation of clinical proficiencies, and clinical experience. Prerequisite: AT 279 with grade of B or better and approval of the program director. (F)

AT 389 Practicum in Athletic Training III 1(0-2)
Continued instruction, practice and evaluation of clinical proficiencies, and clinical experience. Prerequisite: AT 379 with grade of B or better. (S)

AT 400 Workshop (1-5 VAR)
Learning experiences in athletic training offered n large block of time not corresponding to the weekly meeting times of the regular course offerings. Prerequisite: approval of the program director. (*) Repeatable

AT 419 Athletic Training Field Experience (3-0)
Learning experiences to be conducted in an actual athletic training or related environment and supervised by an approved Athletic Training clinical instructor (ACI). Prerequisite: acceptance into clinical portion of program and approval of the program director. Pre or corequisite: one of the following courses: AT 379, 389, 479, 489 with grades of B or better. (F,S,SS) Repeatable

AT 430 Therapeutic Modalities 3(2-2)
Study of theories and application of modalities used in the athletic training setting for the treatment of injuries. Prerequisite: AT 279 with grade of B or better and approval of program director. (F)

AT 431 Therapeutic Exercise 3(2-2)
Study of current rehabilitation theories and application in the athletic training setting. Prerequisite: AT 430 with a grade of C or better and approval of the program director. (F)

AT 443 Administration in Athletic Training 3(3-0)
An examination of current topics in athletic training including legal liability, athletic training administration issues, and budgetary concerns. Prerequisite: approval by program director. (S)

AT 479 Practicum in Athletic Training IV 1(0-2)
Continued instruction, practice and evaluation of clinical proficiencies, and clinical experience. Prerequisite: AT 389 with a grade of B or better. (F)

AT 488 BOC Test Prep 1(0-2)
Instruction, practice, evaluation and application of the Clinical Proficiencies and education competencies of NATA. Prerequisite: AT 479 with a grade of B or better. Corequisite: AT 489 (S)

AT 489 Practicum in Athletic Training V 1(0-2)
Continued instruction, practice and evaluation of clinical proficiencies, and clinical experience. Prerequisite: AT 479 with a grade of B or better. (S)

AT 491 Special Topics (1-5 VAR)
Prerequisite: permission of program director. (*) Repeatable

AT 494 Field Experience (1-5 VAR)
Learning experience to be conducted in athletic training related clinical environment and supervised by the athletic training education program. Prerequisite: approval of program director. (S/U grading) (*) Repeatable

AT 495 Independent Study (1-5 VAR)
Prerequisite: approval of program director. (S/U grading) (*) Repeatable

BILINGUAL BICULTURAL EDUCATION (BBE)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

BBE 400 Workshop (1-3 VAR)
Development of classroom materials and curriculum in bilingual education. (*) Repeatable

BBE 401 Teaching English Language Learners 3(3-0)
Methods and techniques of teaching English to children of linguistically diverse backgrounds; K-6 and 7-12 focus. Field experience required. Prerequisite: admission to Teacher Education Program. (SS)

BBE 403 Content Instruction for EL Learners 3(3-0)
Methods and techniques for teaching content area subjects to students of linguistically different backgrounds; K-6 and 7-12 focus. Field experience required. Prerequisite: admission to Education. (F)

BBE 420 Literacy for EL Learners 3(3-0)
Methods and techniques of teaching Literacy to K-12 English Language Learners. Field experience required. Prerequisite: admission to Teacher Education and either RDG 410 or RDG 435. (SS)

BBE 460 ELL Assessment & Administration 3(3-0)
Study of state, federal, and local laws and policies concerning ELL programs; language proficiency instruments used by teachers for assessment and placement of Ells. Prerequisite: admission to Education (SS)

BBE 471 Teaching Listening & Speaking 3(3-0)
Prepares teachers to teach speaking and listening to English learners. Prerequisite: admission to Education. (*) Repeatable

BBE 481 Practicum with English Learners (1-6 VAR)
Supervised practicum and seminar. Prerequisite: admission to Education or graduate standing. (F,S,SS) Repeatable

BBE 495 Independent Study (1-2 VAR)
For the student specializing in bilingual education. (F,S) Repeatable

GRADUATE COURSES

BBE 500 Workshop (1-3 VAR)
Practical in development of classroom materials/ curriculum in bilingual education. Prerequisite: graduate standing. (*) Repeatable

BBE 501 Teaching English Language Learners 3(3-0)
Methods and techniques of teaching English to children of linguistically diverse backgrounds; K-6 and 7-12 focus. Field experience required. Prerequisite: admission to Education, graduate standing. (SS)

BBE 503 Content Instruction for EL Learners 3(3-0)
Methods and techniques for teaching content area subjects to students of linguistically different backgrounds; K-6 and 7-12 focus. Field experience required. Prerequisite: admission to Education, graduate standing. (F)

BBE 520 Literacy for EL Learners 3(3-0)
Methods and techniques of teaching Literacy to K-12 English Language Learners. Field experience required. Prerequisite: admission to Teacher Education, graduate standing, and RDG 410 or RDG 435. (SS)

BBE 541 Survey of Research in Bilingual Education 2(2-0)
Prerequisite: graduate standing. (*)

BBE 560 ELL Assessment & Administration 3(3-0)
Study of state, federal, and local laws and policies concerning ELL programs; language proficiency instruments used by teachers for assessment and placement of ELLs. Prerequisite: admission to Education, graduate standing. (SS)

BBE 571 Teaching Listening & Speaking 3(3-0)
Prepares graduate students to apply theory and research to teach speaking and listening to English learners. Prerequisite admission to Teacher Education, graduate standing. (*) Repeatable

BBE 581 Practicum with English Learners (1-6 VAR)
Supervised practicum and seminar. Prerequisite: admission to Education or graduate standing. (F,S,SS) Repeatable

BBE 595 Independent Study (1-2 VAR)
For the student specializing in bilingual education. Prerequisite: graduate standing. (*) Repeatable

BIOLOGY (BIOL)

UNDERGRADUATE COURSES

BIOL 100 Principles of Biology 3(3-0)
Introduction to basic principles common to all facets of biology. Topics include a brief history of biology, the scientific method, the diversity of life, cell structure and reproduction, and metabolism. Corequisite: BIOL 100L. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 100L Principles of Biology Lab 1(0-2)
To expose the student to problem-solving skills emphasizing the importance of observation and data accumulation. Corequisite: BIOL 100. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 112 Nutrition 3(3-0)
Analysis of personal dietary habits and behavior in relation to basic human nutritional needs and food composition. (F,S)

BIOL 121 Environmental Conservation 3(3-0)
Historical review of humankind's interrelationship with and impact on the natural environment. Basic principles of ecology and current issues relating to the use of natural resources and environmental problems. Corequisite: BIOL 121L. (F,S,SS) (Gen Ed: ST, GT-SC1)

BIOL 121L Environmental Conservation Lab 1(0-2)
Field studies to accompany BIOL 121. Corequisite: BIOL 121. (F,S,SS) (Gen Ed: ST, GT-SC1)

BIOL 171 First Year Seminar 1(1-0)
Biology majors entering the program are provided guidance on studying and skills specific to science. Biological career diversity and planning for degree completion are discussed. (F,S)

BIOL 181 College Biology I/Organismal Bio 3(3-0)
Biological diversity and structure-function relationships, evolution and ecology. Prerequisite: Math placement at college algebra level or higher. BIOL 100/100L is recommended. Corequisite: BIOL 181L. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 181L College Biology I/Organismal Bio Lab 1(0-2)
Corequisite: BIOL 181. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 182 College Biology II/Cellular Biology 3(3-0)
Continuation of BIOL 181. Basic cell structure and function, reproduction and heredity. Prerequisites: BIOL 181/181L and CHEM 121/121L. Corequisite: BIOL 182L. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 182L College Biology II/Cellular Bio Lab 1(0-2)
Prerequisite: BIOL 181/181L and CHEM 121/121L. Corequisite: BIOL 182. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 183 College Biology I Recitation 1(1-0)
Critical thinking for College Biology I topics. Corequisite: BIOL 181. (S/U grading) (F,S)

BIOL 184 College Biology II Recitation 1(1-0)
Critical thinking for College Biology II topics. Corequisite: BIOL 182. (S/U grading) (F,S)

BIOL 201 Botany 2(2-0)
Forms, basic structures, relationships, life histories and evolutionary trends of representatives of the major autotrophic plant groups. Prerequisite: BIOL 181/181L and BIOL 182/182L. Corequisite: BIOL 201L. (S) (Gen Ed: ST, GT-SC1)

BIOL 201L Botany Laboratory 2(0-4)
Prerequisite: BIOL 181/181L and BIOL 182/182L. Corequisite: BIOL 201. (S) (Gen Ed: ST, GT-SC1)

BIOL 202 Zoology 2(2-0)
Study of structure, function, evolution, biodiversity, behavior, and ecology of vertebrates and invertebrates, including protozoans and human parasites. Prerequisite: BIOL 181/181L and BIOL 182/182L. Corequisite: BIOL 202L. (F) (Gen Ed: ST)

BIOL 202L Zoology Laboratory 2(0-4)
Prerequisite: BIOL 181/181L and BIOL 182/182L. Corequisite: BIOL 202. (F) (Gen Ed: ST)

BIOL 203 Zoology Recitation 1(1-0)
Recitation to accompany BIOL 202. Corequisite: BIOL 202/202L. (S/U grading) (F)

BIOL 206 Introduction to Microbiology 3(3-0)
For students of nursing and allied health. Applied aspects of medical microbiology. Prerequisite: BIOL 100/100L or BIOL 223/223L; and CHEM 111/111L. Corequisite: BIOL 206L. (F)

BIOL 206L Introduction to Microbiology Lab 1(0-3)
Corequisite: BIOL 206. (F)

BIOL 220 Medical Terminology 2(2-0)
Basic prefixes, word roots, combining forms and suffixes of medical terminology and human anatomy are covered, including pronunciation and patient charting. (S)

BIOL 223 Human Physiology and Anatomy I 3(3-0)
Study of human physiology and anatomy designed for students who require or desire a thorough understanding of the functional and structural aspects of the human body. Not for the majority of biology majors except Teacher Education. Topics include body orientation, physiologically important molecules, the cell, tissues, integument, skeleton, muscle, nervous system, and special senses. BIOL 100/100L and CHEM 111/111L are highly recommended. Corequisite: BIOL 223L. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 223L Human Physiology and Anatomy I Lab 1(0-2)
Corequisite: BIOL 223. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 224 Human Physiology and Anatomy II 3(3-0)
Structure and function of the human body. Topics include endocrine systems, respiration, digestion, metabolism, excretion, fluid-electrolyte balance, cardiovascular and reproductive functions and special senses. Prerequisite: BIOL 223/223L. Corequisite: BIOL 224L. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 224L Human Physiology and Anatomy II Lab 1(0-2)
Corequisite: BIOL 224. (F,S) (Gen Ed: ST, GT-SC1)

BIOL 291 Special Topics (1-4 VAR) (F,S,SS) Repeatable

BIOL 292 Research (1-3 VAR)
Faculty directed research project for undergraduate student. May be repeated for a maximum of 3 credits, total. Prerequisite: approval of department chair. (F,S,SS) Repeatable (3)

BIOL 294 Field Experience (1-4 VAR)
Volunteer work experience under program director, department coordinator and faculty supervisor. (S/U grading) (F,S,SS) Repeatable

BIOL 301 General Microbiology 3(3-0)
Introduction to the bacteria and viruses, including microbial genetics and physiology. Prerequisite: BIOL 182/182L, and CHEM 301/301L. CHEM 302/302L and MATH 221 are strongly recommended. Corequisite: BIOL 301L. (F)

BIOL 301L General Microbiology Lab 2(0-4)
Corequisite: BIOL 301. (F)

BIOL 302 Medical Microbiology 2(2-0)
Survey of pathogenic bacteria, viruses and fungi Prerequisite: BIOL 301/301L or BIOL 206/206L. Corequisite: BIOL 302L. (S,O)

BIOL 302L Medical Microbiology Lab 2(0-4)
Prerequisite: BIOL 301L or BIOL 206L. Corequisite: BIOL 302. (S,O)

BIOL 321 Comparative Vertebrate Anatomy 3(3-0)
Comparative study of developmental and functional anatomy of vertebrate animals. Prerequisite: BIOL 202/202L. Corequisite: BIOL 321L. (S)

BIOL 321L Comparative Vertebrate Anatomy Lab 2(0-4)
Prerequisite: BIOL 202/202L. Corequisite: BIOL 321. (S)

BIOL 350 Mendelian and Population Genetics 2(2-0)
Survey of basic Mendelian genetics, genetic mapping and population genetics. Prerequisite: BIOL 182/182L, and MATH 121. MATH 156 is strongly recommended. (F,S)

BIOL 351 Molecular Biology and Genetics 2(2-0)
Study of the molecular flow of genetic information, gene regulation and cancer genetics. Prerequisite: BIOL 350 and CHEM 122/122L. (F,S)

BIOL 351L Advanced Genetics and Molecular Biology Laboratory 2(0-4)
Molecular biology investigations of gene regulation and recombinant DNA. Prerequisite: BIOL 350 and CHEM 122/122L. Corequisite: BIOL 351. (S)

BIOL 352 Evolutionary Biology and Ecology 3(3-0)
Historical view of the theory of evolution with emphasis on the relationship between organisms and the environment, and the mechanisms and forces that produce evolutionary change. Prerequisite: BIOL 181/181L and BIOL 182/182L. BIOL 350 is recommended. (F,S)

BIOL 378 Laboratory in Teaching Biology 1(0-2)
Laboratory preparation, safety, instruction and methods under the guidance and supervision on an instructor. Prerequisite: approval of instructor. (F,S) Repeatable

BIOL 392 Research (1-3 VAR)
Faculty directed research project for undergraduate student. May be repeated for a maximum of 3 credits, total. Prerequisite: approval of department chair. (F,S,SS) Repeatable (3)

BIOL 394 Field Experience (1-4 VAR)
Volunteer work experience under program director, program coordinator, and faculty supervisor (S/U grading) (F,S,SS) Repeatable

BIOL 402 Immunology 3(3-0)
Humoral and cell-mediated immunity including immune disorders and theories of immunological techniques. Prerequisite: BIOL 301/301L. (S)

BIOL 403 Virology 3(3-0)
Molecular aspects of viral infection of bacteria, plants, and animals including viral replication, host range, host defenses, antiviral drugs, and viral ecology. Prerequisite: BIOL 301 or BIOL 351. Corequisite: BIOL 403L. (F,E)

BIOL 403L Virology Lab 1(0-2)
Prerequisite: BIOL 301 or BIOL 351. Corequisite: BIOL 403. (F,E)

BIOL 412 Cellular Biology 3(3-0)
Structural and functional organization of the cell, life cycles of cells, intracellular digestion, protein synthesis and cell death. Prerequisite: CHEM 301/301L, BIOL 301/301L and BIOL 351. CHEM 302/302L is strongly recommended. Corequisite: BIOL 412L. (S)

BIOL 412L Cellular Biology Lab 1(0-3)
Prerequisite: CHEM 301/301L, BIOL 301/301L, and BIOL 351. Corequisite: BIOL 412. (S)

BIOL 413 Plant Physiology 2(2-0)
Thorough examination of general physiology and function of plant body systems. Prerequisite: BIOL 201/201L and CHEM 301/301L. Corequisite: BIOL 413L. (S,O)

BIOL 413L Plant Physiology Lab 2(0-4)
Prerequisite: BIOL 201/201L and CHEM 301/301L. Corequisite: BIOL 413. (S,O)

BIOL 414 Vertebrate Physiology 3(3-0)
General physiology and the functions of animal and human body systems. Prerequisite: BIOL 202 and CHEM 301/301L. CHEM 302/302L and MATH 156 are strongly recommended. Corequisite: BIOL 414L. (F)

BIOL 414L Vertebrate Physiology Lab 1(0-2)
Corequisite: BIOL 414. (F)

BIOL 421 Histology 2(2-0)
A microscopic study of vertebrate tissues and organs. Prerequisite: BIOL 182/182L and CHEM 122/122L. Corequisite: BIOL 421L. (S,O)

BIOL 421L Histology Lab 2(0-4)
Corequisite: BIOL 421. (S,O)

BIOL 432 Developmental Biology 2(2-0)
Theory and principles of the development of representative vertebrate and invertebrate animals, with particular emphasis on the frog, chick, and Drosophila. Prerequisite: BIOL 351. Corequisite: 432L. (S,E)

BIOL 432L Developmental Biology Lab 2(0-4)
Corequisite: BIOL 432. (S,E)

BIOL 440 Molecular Genetics 2(2-0)
Molecular and Biochemical basis of heredity. Regulation of gene expression. Prerequisite: BIOL 351. Corequisite: BIOL 440L. (S)

BIOL 440L Molecular Genetics Lab 1(0-2)
Corequisite: BIOL 440 (S)

BIOL 441 Freshwater Invertebrate Zoology 2(2-0)
Classification, phylogeny, systematics, morphology, physiology, and natural history of freshwater invertebrates inclusive of insects. Prerequisite: BIOL 202/202L. Corequisite: BIOL 441L. (S,O)

BIOL 441L Freshwater Invertebrate Zoology Lab 2(0-4)
Corequisite: BIOL 441. (S,O)

BIOL 443 Limnology 2(2-0)
Biology, chemistry and physics of lakes and rivers. Prerequisite: BIOL 201/201L and BIOL 202/202L. Corequisite: BIOL 443L. (S,E)

BIOL 443L Limnology Lab 2(0-4)
Corequisite: BIOL 443 (S,E)

BIOL 452 Advanced Microscopy 2(2-0)
Theory and application of microscopy to the biological sciences. Includes preparation of cells and tissues for examination, scope, operation, and image analysis. Prerequisite: BIOL 301/301L or permission of instructor. Corequisite: BIOL 452L. (*)

BIOL 452L Advanced Microscopy Lab 2(0-4)
Corequisite: BIOL 452. (*)

BIOL 453 Ecology 2(2-0)
Interrelationships among organisms and their environment, employing quantitative methods and conceptual models. Prerequisite: BIOL 352 and MATH 221 or MATH 126. Corequisite: BIOL 453L. (F,E)

BIOL 453L Ecology Field Studies 2(0-4)
Corequisite: BIOL 453. (F,E)

BIOL 454 Behavioral Ecology 3(3-0)
Evolution and adaptive significance of animal behaviors with a focus on current research. Prerequisite: BIOL 352 or permission of instructor. (F,O)

BIOL 461 Applied Geospatial Technology (GIS/GPS) 3(3-0)
Theory and practice of using Geographic Information Systems (GIS) and Global Positioning Systems (GPS) for geographic data analysis, and to georeference data. (F,O)

BIOL 462 Environmental Management 3(3-0)
Scientific basis of environmental regulations applied to air/water quality, solid waste, and hazardous waste; technologies and procedures used by generators to achieve compliance. Prerequisite: BIOL 352. (S,O)

BIOL 465 Environmental Toxicology 3(3-0)
Basic principles of toxicology, interaction of xenobiotics with living organisms and the environment, and the impact of pollutants on the ecosystem. Prerequisite: BIOL 181/181L and BIOL 182/182L. CHEM 302/302L is strongly recommended. (F,E)

BIOL 473 Med. Tech. Clinical Rotation I 12(5-14)
Coursework and clinical training in an affiliated medical laboratory sciences facility. Specific course of study determined by facility. Prerequisite: consent of instructor. (*)

BIOL 474 Med. Tech. Clinical Rotation II 12(5-14)
Coursework and clinical training in an affiliated medical laboratory sciences facility. Specific course of study determined by facility. Prerequisite: consent of instructor. (*)

BIOL 475 Med. Tech. Clinical Rotation III 6(3-6)
Coursework and clinical training in an affiliated medical laboratory sciences facility. Specific course of study determined by facility. Prerequisite: consent of instructor. (*)

BIOL 479 Ichthyology 2(2-0)
The morphology, taxonomy and ecology of fishes; an introduction to fishery biology and aquaculture. Field trips are an integral part of the course. Prerequisite: BIOL 202/202L. Corequisite: BIOL 479L. (F,O)

BIOL 479L Ichthyology Lab 1(0-2)
Corequisite: BIOL 479. (F,O)

BIOL 481 Entomology 2(2-0)
Evolutionary biology and management of insects. Impact of arthropods on the balance of nature. Medical and veterinary entomology. Arthropods as vectors of human and animal diseases. Prerequisite: BIOL 202/202L. Corequisite: BIOL 481L. (F,O)

BIOL 481L Entomology Lab 1(0-2)
Corequisite: BIOL 481. (F,O)

BIOL 483 Mammalogy 2(2-0)
Evolution, classification and biology of mammals; practice in identifying and preparing specimens. Prerequisite: BIOL 202/202L. Corequisite: BIOL 483L. (S,E)

BIOL 483L Mammalogy Lab 1(0-2)
Corequisite: BIOL 483. (S,E)

BIOL 484 Ornithology 2(2-0)
Classification, life history, laboratory and field identification of birds. Prerequisite: BIOL 202/202L. Corequisite: BIOL 484L. (S,O)

BIOL 484L Ornithology Lab 1(0-2)
Corequisite: BIOL 484. (S,O)

BIOL 485 Plant Taxonomy 2(2-0)
Identification of the common vascular plant families of Colorado with an emphasis on the flowering plants; study of their systematic relationships. Prerequisite: BIOL 201/201L. Corequisite: BIOL 485L. (F)

BIOL 485L Plant Taxonomy Lab 2(0-4)
Corequisite: BIOL 485. (F)

BIOL 486 Field Botany 3(3-0)
Principles and applications of field techniques used in vegetation assessment, surveys, and vegetation monitoring. Prerequisite: BIOL 201/201L. (*)

BIOL 491 Special Topics (1-4 VAR) (F,S,SS) Repeatable

BIOL 492 Research (1-3 VAR)
Faculty directed research project for undergraduate student. May be repeated for a maximum of 3 credits, total. Prerequisite: approval of department chair. (F,S,SS) Repeatable (3)

BIOL 493 Seminar 1(1-0)
Seminar for majors and minors concerning unique, current, or unusual topics in biology. Speakers may include guests, faculty, or students. Required of majors. Prerequisite: senior standing and completion of all biology core courses. (F,S)

BIOL 494 Field Experience (1-4 VAR)
Volunteer work experience under program director, program coordinator and faculty supervisor. (S/U grading). (F,S,SS) Repeatable

BIOL 495 Independent Study (1-4 VAR)
Prerequisite: junior standing, biology major, permission of instructor and department. (F,S,SS) Repeatable

BIOL 498 Internship (5-15 VAR)
Work experience in the Biology discipline under the combined supervision of the selected organization and a faculty member. Prerequisite: permission of department chair. (S/U grading) (F,S,SS) Repeatable

GRADUATE COURSES

BIOL 502 Immunology 3(3-0)
Humoral and cell-mediated immunity including immune disorders and theories of immunological techniques. Prerequisite: BIOL 301/301L. (S)

BIOL 503 Virology 3(3-0)
Molecular aspects of viral infection of bacteria, plants, and animals including viral replication, host range, host defenses, antiviral drugs, and viral ecology. Prerequisite: BIOL 301 or BIOL 351. Corequisite: BIOL 503L. (F,E)

BIOL 503L Virology Lab 1(0-2)
Prerequisite: BIOL 301 or BIOL 351. Corequisite: BIOL 503. (F,E)

BIOL 510 Foundations in Graduate Studies 3(3-0)
Laboratory safety. Effective sourcing, use, and interpretation of the literature. Scientific methodology, writing, and review of research ethics. Development of a thesis or internship plan. Prerequisite: admission into MS program. (F)

BIOL 512 Cellular Biology 3(3-0)
Structural and functional organization of the cell, life cycles of cells, intracellular digestion, protein synthesis and cell death. Prerequisite: CHEM 301/301L, BIOL 301/301L and BIOL 351. CHEM 302/302L is strongly recommended. Corequisite: BIOL 512L. (S)

BIOL 512L Cellular Biology Lab 1(0-3)
Corequisite: BIOL 512 (S)

BIOL 513 Plant Physiology 2(2-0)
Thorough examination of general physiology and function of plant body systems. Prerequisite: BIOL 201/201L and CHEM 301/301L. Corequisite: BIOL 513L. (S,O)

BIOL 513L Plant Physiology Lab 2(0-4)
Prerequisite: BIOL 201/201L and CHEM 301/301L. Corequisite: BIOL 513. (S,O)

BIOL 521 Histology 2(2-0)
A microscopic study of vertebrate tissues and organs. Prerequisite: BIOL 182/182L and CHEM 122/122L. Corequisite: BIOL 521L. (S,O)

BIOL 521L Histology Lab 2(0-4)
Corequisite: BIOL 521. (S,O)

BIOL 532 Developmental Biology 2(2-0)
Theory and principles of the development of representative vertebrate and invertebrate animals, with particular emphasis on the frog, chick, and Drosophila. Prerequisite: BIOL 351. Corequisite: BIOL 532L. (S,E)

BIOL 532L Developmental Biology Lab 2(0-4)
Corequisite: BIOL 532. (S,E)

BIOL 540 Molecular Genetics 2(2-0)
Molecular and biochemical basis of heredity. Regulation of gene expression. Prerequisite: BIOL 351. Corequisite: BIOL 540L. (S)

BIOL 540L Molecular Genetics Lab 1(0-2)
Corequisite: BIOL 540. (S)

BIOL 541 Freshwater Invertebrate Zoology 2(2-0)
Classification, phylogeny, systematics, morphology, physiology, and natural history of freshwater invertebrates inclusive of insects. Prerequisite: BIOL 202/202L. Corequisite: BIOL 541L. (S,O)

BIOL 541L Freshwater Invertebrate Zoology Lab 2(0-4)
Corequisite: BIOL 541. (S,O)

BIOL 543 Limnology 2(2-0)
Biology, chemistry, and physics of lakes and rivers. Prerequisite: BIOL 201/201L and BIOL 202/202L. Corequisite: BIOL 543L. (S,E)

BIOL 543L Limnology Lab 2(0-4)
Corequisite: BIOL 543. (S,E)

BIOL 552 Advanced Microscopy 2(2-0)
Theory and application of microscopy to the biological sciences. Includes preparation of cells and tissues for examination, scope operation, and image analysis. Corequisite: BIOL 552L. (*)

BIOL 552L Advanced Microscopy Lab 2(0-4)
Corequisite: BIOL 552. (*)

BIOL 553 Ecology 2(2-0)
Interrelationships among organisms and their environment, employing quantitative methods and conceptual models. Prerequisite: BIOL 352 and MATH 221. Corequisite: BIOL 553L. (F,E)

BIOL 553L Ecology Field Studies 2(0-4)
Corequisite: BIOL 553. (F/E)

BIOL 554 Behavioral Ecology 3(3-0)
Evolution and adaptive significance of animal behaviors with a focus on current research. Prerequisite: BIOL 352 or permission of instructor. (F,O)

BIOL 561 Applied Geospatial Technology (GIS/GPS) 3(3-0)
Theory and practice of using Geographic Information Systems (GIS) and Global Positioning Systems (GPS) for geographic data analysis, and to georeference data. (F,O)

BIOL 562 Environmental Management 3(3-0)
Scientific basis of environmental regulations applied to air/water quality, solid waste, and hazardous waste; technologies and procedures used by generators to achieve compliance. Prerequisite: BIOL 352. (S,O)

BIOL 565 Environmental Toxicology 3(3-0)
Basic principles of toxicology, interaction of the xenobiotics with living organisms and the environment, and the impact of pollutants on the ecosystem. Prerequisite: BIOL 182/182L. CHEM 302 is strongly recommended. (F,E)

BIOL 578 Practicum in Laboratory Instruction 1(0-2)
Laboratory preparation, instruction, and methods under the guidance and supervision of a professor. May be repeated for a maximum of 4 credits. Prerequisite: graduate standing or permission of department chair. (S/U grading) (F,S) Repeatable (4)

BIOL 579 Ichthyology 2(2-0)
The morphology, taxonomy and ecology of fishes; an introduction to fishery biology and aquaculture. Field trips are an integral part of the course. Prerequisite: BIOL 202/202L. Corequisite: BIOL 579L. (F,O)

BIOL 579L Ichthyology Lab 1(0-2)
Corequisite: BIOL 579. (F,O)

BIOL 581 Entomology 2(2-0)
Evolutionary biology and management of insects. Impact of arthropods on the balance of nature. Medical and veterinary entomology. Arthropods as vectors of human and animal diseases. Prerequisite: BIOL 202/202L. Corequisite: BIOL 581L. (F,O)

BIOL 581L Entomology Lab 1(0-2)
Corequisite: BIOL 581. (F,O)

BIOL 583 Mammalogy 2(2-0)
Evolution, classification and biology of mammals; practice in identifying and preparing specimens. Prerequisite: BIOL 202/202L. Corequisite: BIOL 583L. (S,E)

BIOL 583L Mammalogy Lab 1(0-2)
Corequisite: BIOL 583 (S,E)

BIOL 584 Ornithology 2(2-0)
Classification, life history, laboratory and field identification of birds. Prerequisite: BIOL 202/202L. Corequisite: BIOL 584L. (S,O)

BIOL 584L Ornithology Lab 1(0-2)
Corequisite: BIOL 584. (S,O)

BIOL 585 Plant Taxonomy 2(2-0)
Identification of common vascular plant families of Colorado with an emphasis on the flowering plants; study of their systematic relationships. Prerequisite: BIOL 201/201L. Corequisite: BIOL 585L. (F)

BIOL 585L Plant Taxonomy Lab 2(0-4)
Corequisite: BIOL 585. (F)

BIOL 586 Field Botany 3(3-0)
Principles and applications of field techniques used in vegetation assessment, surveys, and vegetation monitoring. Prerequisite: graduate standing. (*)

BIOL 588 Internship Seminar 1(1-0)
Graduate internship presentation and examination for completion of MS degree option within the Graduate Programs in Natural Sciences. Prerequisite: graduate standing. (F,S,SS)

BIOL 589 Thesis Defense 1(1-0)
Thesis presentation for completion of MS degree option within the Graduate Programs in Natural Sciences. Prerequisite: graduate standing. (F,S,SS)

BIOL 591 Special Topics (1-4 VAR) (F,S,SS) Repeatable

BIOL 592 Research (1-6 VAR)
Faculty directed research project for graduate students. Prerequisite: graduate standing and approval of department chair or program director. (S/U grading) (F,S,SS) Repeatable

BIOL 593 Seminar 1(1-0)
An interdisciplinary seminar on topics appropriate to the application of natural sciences. Prerequisite: BIOL 510. (*)

BIOL 595 Independent Study (1-4 VAR)
Prerequisite: graduate standing, biology major, permission of instructor and department. (F,S,SS)

BIOL 598 Graduate Internship (1-4 VAR)
Volunteer or paid work experience under the combined supervision of the selected organization and a faculty member. Prerequisite: graduate standing. (S/U grading) (F,S,SS)

BIOL 599 Thesis Research (1-6 VAR)
Repeatable for a maximum of 6 credits. Continued enrollment is dependent upon satisfactory progress in thesis work. Prerequisite: graduate standing and approval of department chair. (F,S,SS) Repeatable (6)

BUSINESS ADMINISTRATION (BUSAD)

UNDERGRADUATE COURSES

BUSAD 101 Business-Careers and Opportunities 1(1-0)
Introduction to the world of business that will provide insights on careers, business disciplines, and the world of business. (F,S)

BUSAD 102 Introduction to Personal Finance 1(1-0)
This introductory course serves as a vehicle to deliver fundamental personal financial management skills to students, providing the tools necessary to make good financial decisions. (*)

BUSAD 250 Business Law 3(3-0)
Explores the legal environment of business. Topics include contracts, torts, agency, ethical and criminal implications of business actions, and property laws. Prerequisite: ENG 101 and 102, BUSAD 101. (F,S)

BUSAD 265 Inferential Statistics and Problem Solving 3(3-0)
Statistical methods in business, sampling, parameter estimation, hypothesis testing, correlation, multiple regression and chi square tests. Use of problem solving methods. Prerequisite: MATH 121. (F,S)

BUSAD 270 Business Communications 3(3-0)
Means of extending management capabilities through effective internal and external communications, including data organization and presentation. Prerequisite: ENG 101 and 102. (F,S)

BUSAD 302 Ethics in Business 3(3-0)
Examination of issues addressing ethical, legal, social and environmental responsibilities of businesses toward government, customers, employees, and the general public. Prerequisite: BUSAD 270. (F,S)

BUSAD 360 Advanced Business Statistics 3(3-0)
Development of advanced statistical techniques to support business decision-making. Topics include advanced multiple regression analysis, analysis of variance and nonparametric techniques. Prerequisite: BUSAD 265. (F,S)

BUSAD 475 International Business 3(3-0)
Opportunities and problems of multinational firms including environmental factors and formulation of strategies and policies for all functional areas of business. Prerequisite: FIN 330, MGMT 301 and MKTG 340. (F,S)

BUSAD 480 Business Consulting 3(3-0)
Integrating prior studies in business into a realistic approach to assist in solving problems faced by selected firms and organizations in the community. Prerequisite: BUSAD 360, FIN 330, MGMT 301, MGMT 311, and MKTG 340. (*)

BUSAD 490 Special Projects (1-6 VAR) (*) Repeatable (6)

BUSAD 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable (6)

BUSAD 493 Senior Seminar 1(1-0)
Designed to help majors draw connections among the business disciplines. The course provides an in-depth examination of contemporary issues in the business environment. Prerequisite: senior standing. (F,S)

BUSAD 495 Independent Study (1-3 VAR)
Prerequisite: senior standing and permission of department chair. (*) Repeatable (6)

BUSAD 498 Internship (1-6 VAR)
Supervised field work in selected business, social and governmental organizations; supplemented by written reports (S/U grading). Prerequisite: junior or senior standing in the School of Business and permission of internship coordinator. (*) Repeatable (6)

GRADUATE COURSES

BUSAD 501 Fundamentals of Statistics 3(3-0)
This class prepares students to solve business problems using statistics and business research methods using statistical estimation, hypothesis testing, and advanced statistical methods. Prerequisite: admission to MBA. (*)

BUSAD 502 Business Ethics and Environment 3(3-0)
The impact of continued social, political, economic, technological, and legal pressures upon ethical business issues and managerial decision making. Prerequisite: admission to MBA or permission of MBA Director. (*)

BUSAD 505 Inferential Statistics and Problem Solving 3(3-0)
Statistical methods in business, sampling, parameter estimation, hypothesis testing, correlation, multiple regression and chi square tests. Use of problem solving methods. (*)

BUSAD 545 Advanced Quantitative Analysis for Business 3(3-0)
This class prepares students to solve business problems using advanced quantitative methods and business modeling techniques. Prerequisite: admission to MBA. (*)

BUSAD 575 International Business 3(3-0)
The objective of this course is to familiarize students with the dynamics and complexity of managing business across the globe. Prerequisite: admission to MBA or permission of MBA Director. (*)

BUSAD 580 Business Research Methodology 3(3-0)
Fundamentals of qualitative and quantitative research design including development of hypothesis and assessment techniques in preparation for undertaking research projects. Prerequisite: admission to MBA or permission of MBA Director. (*)

BUSAD 591 Special Topics 3(3-0)
Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

BUSAD 592 Research (1-6 VAR)
The student will work under the close supervision of a graduate faculty member in basic or applied research resulting in a thesis or report of high academic quality. (IP and S/U grading) (*)

BUSAD 595 Independent Study (1-3 VAR)
Individual study of a subject determined by the instructor and student with permission of the director. Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

CIVIL ENGINEERING TECHNOLOGY (CET)

UNDERGRADUATE COURSES

CET 101 Intro to Civil Engineering Technology 2(1-2)
Introduction to the field of Civil Engineering Technology: review career opportunities, study the engineering design process, explore issues of professional ethics, and do team projects. (F)

CET 102 Surveying I 3(0-6)
Beginning course in plane surveying; covers proper chaining techniques, care and use of engineering levels, differential leveling, traversing, and construction surveying. (F)

CET 103 Surveying II 3(0-6)
Introduction to land, topographic, and construction surveying. Prerequisite: CET 102, or permission of instructor. Corequisite: CET 116. (S)

CET 115 Civil Drafting I 3(0-6)
An introduction to basic drafting, AutoCAD and Structural Detail drafting. Corequisite: CET 102. (F)

CET 116 Civil Drafting II 3(0-6)
An introduction to maps, traverses, contours, plans and profiles, cut and fills. An introduction to architectural plans, elevations and section. Prerequisite: CET 115. Corequisite: CET 103. (S)

CET 202 Statics 3(3-0)
Basic concepts and application of static forces, couples, resultants, equilibrium, friction, frames, trusses, free body diagrams, and centroids. Prerequisite: MATH 122 or MATH 124. (F)

CET 206 Strength of Materials 4(3-2)
A study of the response of materials to loads with attention to stresses, strains, elastic and plastic responses to loading. Experiments demonstrate those principles. Prerequisite: CET 202. (S)

CET 207 Construction Materials and Methods 3(3-0)
Properties, uses and methods of assembly of building materials as they apply to the construction industry. (F)

CET 208 Concrete and Asphalt Materials 3(2-2)
Study of Portland cement concrete and bituminous pavements. Manufacturing, mix design, placing and finishing of these materials. The laboratory includes ASTM testing of these materials. (S)

CET 222 Dynamics 3(3-0)
A study of the basic equations of motion, kinematics, kinetics, momentum, potential energy, work, and highway dynamics. Prerequisite: CET 202. (S)

CET 226 Engineering Problem Solving 2(1-2)
An introduction to computer programming to solve engineering problems that apply to the complete spectrum of civil engineering technology courses. Prerequisite: CIS 101 and 104 and MATH 121. (F)

CET 303 Construction Management 3(3-0)
Job specifications, contractor, organization, bonding, contracts, insurance and labor relations. Prerequisite: CET 207. (S)

CET 304 Building Cost Estimating 3(3-0)
Estimating related to building construction industry. Quantity take-off, labor and material costs, records and assembling a general contractor's bid. (*)

CET 305 Heavy/Highway Cost Estimating 3(3-0)
Estimating relating to heavy and highway construction. Covers heavy equipment selection and use, project scheduling and production rates. Prerequisite: junior standing or permission of instructor. (F)

CET 312 Route Surveying 3(2-2)
Highway and route surveys, horizontal and vertical curves, grades, slope staking and earthwork. Prerequisite: CET 103 and MATH 124. (*)

CET 315 Soil Mechanics Technology 3(2-2)
Basic principles of soil mechanics and foundation design as they apply to design and construction. ASTM field tests will be done in the laboratory. Prerequisite: CET 206. (S)

CET 316 Structural Analysis 3(3-0)
Introduction to the analysis of statically determinate and indeterminate structures. Prerequisite: CET 206, MATH 126, PHYS 201/L. (F)

CET 317 Hydraulics 3(2-2)
Study of non-compressible fluids including the flow of water in pipes and open channels. Laboratory involves measuring static pressure, head losses, and flow rates. Prerequisite: CET 202, MATH 126, PHYS 201/L. (F)

CET 372 Traffic Analysis and Control 3(2-2)
Introduction to traffic engineering including traffic system characteristics, traffic studies, capacity analysis, and traffic control. Laboratory activities include traffic data collection and analysis. (S)

CET 401 Land Surveying 3(3-0)
Boundary control, property descriptions, deeds, subdivisions, emphasizing the legal aspects of land law and surveying. (*)

CET 404 Structural Steel Design 3(3-0)
Structural steel design of beams, columns, girders and trusses to AISC standards. Prerequisite: CET 316 (S)

CET 405 Reinforced Concrete Design 3(3-0)
Design of reinforced concrete beams, columns, girders and floor systems to conform to current ACI code. Prerequisite: CET 316. (F)

CET 412 Hydrology 3(3-0)
Hydrologic cycle including precipitation, streamflow, ground-water runoff and the preparation of hydro graphs and frequency analysis. Prerequisite: CET 317 (S)

CET 414 Bridge Design 3(3-0)
Design of bridge slabs, beams, abutments, wingwalls, piers, and footings. Prerequisite: CET 316 (*)

CET 415 Water and Sewer System Design 3(3-0)
Fundamental principles of water supply and sewage design. Prerequisite: CET 317, CHEM 111. (F)

CET 437 LEED LAB 3(2-2)
Actively pursue certification for campus building or facility, including working on prerequisites, credits and supporting documentation. Prerequisite: sophomore standing. (F,S)

CET 455 Senior Project Seminar 1(1-0)
Students formulate a proposal for their senior project and make written and oral presentations of the proposal. Speakers from industry present real-world examples. (S/U grading) (F)

CET 456 Senior Project 3(1-4)
Practical realistic projects relating to CET discipline are selected for design, analysis, and execution. Students prepare reports and make oral presentations. Prerequisite: CET 455. (S)

CET 473 Highway Design 3(3-0)
A study of highway planning and design. Prerequisite: MATH 126, CET 208, CET 315, CET 372. (F)

CET 475 Engineer-In-Training Preparation 3(3-0)
This course is designed as preparation for the state Engineer-In-Training examination. Subjects include general engineering and civil engineering topics. (S)

CET 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

CET 495 Independent Study (1-3 VAR)
Directed study for students interested in specific areas of CET. Prerequisite: junior standing in CET and permission of instructor. (F,S) Repeatable

CET 496 Cooperative Education Placement (1-4 VAR)
Industrial cooperative education work experience under the direction of a field supervisor and faculty member. (F,S,SS) Repeatable

CHEMISTRY (CHEM)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

CHEM 101 Chemistry and Society 3(3-0)
Chemistry related to the everyday world. Drugs, food, pollution, pesticides, consumer products, energy, and home health. Principally for non-science majors. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 101L Chemistry and Society Lab 1(0-2)
Laboratory is optional. Experiments to exemplify the logical steps of problem solving and explore the physical and chemical world. Pre or corequisite: CHEM 101. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 111 Principles of Chemistry 3(3-0)
Fundamental laws, theories and principles of chemical reactions. Credit not applicable for chemistry majors or minors. Prerequisite: MATH 099 or equivalent math placement score or permission of instructor. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 111L Principles of Chemistry Lab 1(0-2)
Experiments using common chemical equipment and techniques to aid the student in learning what occurs in the chemical laboratory. Pre or corequisite: CHEM 111. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 121 General Chemistry I 4(4-0)
For science, engineering and pre-professional curricula. Atomic theory, chemical bonding, periodic properties, states of matter, oxidation-reduction, stoichiometry, thermo-chemistry, inorganic nomenclature. Recommended: one year high school chemistry or equivalent. Prerequisite: MATH 121 or equivalent math placement score. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 121L General Chemistry Lab I 1(0-2)
Pre or corequisite: CHEM 121. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 122 General Chemistry II 4(4-0)
Continuation of CHEM 121. Thermodynamics, kinetics, equilibria, nuclear chemistry, electrochemistry, acids and bases, solutions, descriptive inorganic chemistry. Prerequisite: CHEM 121. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 122L General Chemistry Lab II 1(0-2)
Laboratory component to CHEM 122. Prerequisite: CHEM 121L. Pre or corequisite: CHEM 122. (F,S) (Gen Ed: ST, GT-SC1)

CHEM 125 Environmental Science 3(3-0)
An overview of terrestrial and aquatic environments, the atmosphere, energy, climate change, and natural resources. Emphasis is placed on sustainability needs and challenges. (*) (Gen Ed: ST, GT-SC1)

CHEM 125L Environmental Science Laboratory 1(0-2)
Laboratory course to accompany CHEM 125. Pre or corequisite: CHEM 125. (*) (Gen Ed: ST, GT-SC1)

CHEM 150 (PHYS 150) Elementary Concepts in Physics and Chemistry 4(3-2)
Hands-on standards-based approach to understanding basic concepts of physics and chemistry. Integrated lecture, lab and discussion periods. Recommended: enrollment in the Teacher Education Program. (F,S,SS)

CHEM 160 Introduction to Forensic Science 3(3-0)
Overview of Forensic Science. Crime scene investigation. Evidence collection. Microscopy techniques. Arson analysis. Fingerprints. Serology and DNA use. (F,S,SS) (Gen Ed: ST, GT-SC1)

CHEM 160L Intro to Forensic Science Lab 1(0-2)
Overview of Forensic Science Laboratory. Evidence handling and collection. Microscopy techniques. Arson analysis, Fingerprints. DNA fingerprinting. Pre or corequisite: CHEM 160. (F,S,SS) (Gen Ed: ST, GT-SC1)

CHEM 211 Introduction to Organic Chemistry 3(3-0)
Survey of organic chemistry chemical structure, reactivity and functional groups are presented in context of relevance to society. Prerequisite: CHEM 111. (S)

CHEM 211L Introduction to Organic Chemistry Lab 1(0-2)
Survey of organic chemistry laboratory course. Basic organic laboratory techniques and skills, both micro and macro scale are presented. Pre or corequisite: CHEM 211. (S)

CHEM 221 Inorganic Chemistry 3(3-0)
Basic principles of inorganic chemistry. The main properties, reaction chemistry, and descriptive chemistry of inorganic elements and compounds. Prerequisite: CHEM 122. Corequisite: CHEM 221L. (F)

CHEM 221L Inorganic Chemistry Lab 1(0-3)
Inorganic laboratory techniques, inorganic qualitative analysis, synthesis and characterization. Corequisite: CHEM 221. (F)

CHEM 260 Forensic Chemistry I 3(3-0)
Investigation of comparative/visual forensic analysis techniques. Topics include fingerprinting, bloodstain pattern analysis, fiber comparisons, and firearms analysis. Prerequisite: CHEM 111 or CHEM 121 and CHEM 160. (S)

CHEM 260L Forensic Chemistry I Laboratory 1(0-3)
Development of laboratory skills for comparative/visual forensic analysis. Topics include fingerprinting, bloodstain pattern analysis, fiber comparisons, and firearms analysis. A more in-depth examination of CHEM 160L topics. Prerequisite: CHEM 111 or CHEM 121 and CHEM 160 and CHEM 160L. Pre or corequisite: CHEM 260. (S)

CHEM 291 Special Topics (1-5 VAR)
Prerequisite: permission of instructor. (*) Repeatable

CHEM 292 Research (1-3 VAR)
Faculty directed research project for undergraduate first or second-year student. May be repeated for a maximum of 3 credits total. Prerequisite: permission of instructor. (F,S,SS) Repeatable (3)

CHEM 301 Organic Chemistry I 3(3-0)
For majors and pre-professional students requiring a strong background in organic chemistry. Organic reactions and mechanisms as related to molecular structure. Prerequisite: CHEM 122. (F,S)

CHEM 301L Organic Chemistry Lab I 2(0-6)
Prerequisite: CHEM 122L. Pre or corequisite: CHEM 301. (F,S)

CHEM 302 Organic Chemistry II 3(3-0)
Continuation of CHEM 301. Prerequisite: CHEM 301. (F,S)

CHEM 302L Organic Chemistry Lab II 2(0-6)
Prerequisite: CHEM 301L. Pre or corequisite: CHEM 302. (F,S)

CHEM 311 Survey of Biochemistry 3(3-0)
Survey of biochemistry. For pre-health professional students. Intermediary metabolism is taught at an intermediate level and in the context of human nutrition and clinical applications. Prerequisite: CHEM 301. Pre or corequisite: CHEM 302. (F)

CHEM 317 Quantitative Analysis 3(3-0)
Volumetric and gravimetric analysis integrated with instrumental analysis, both optical and electrometric methods. Prerequisite: CHEM 122. (F)

CHEM 317L Quantitative Analysis Lab 2(0-6)
Pre or corequisite: CHEM 317. (F)

CHEM 321 Physical Chemistry I 3(3-0)
Chemical thermodynamics, chemical dynamics, quantum chemistry, chemical structure and spectroscopy. Prerequisite: CHEM 122 and MATH 126. Pre or corequisite: MATH 224 and PHYS 201 or PHYS 221. (S)

CHEM 322 Physical Chemistry II 3(3-0)
Continuation of CHEM 321. Prerequisite: CHEM 122 and MATH 126. Pre or corequisite: MATH 224 and PHYS 201 or PHYS 221. (F)

CHEM 323 Experimental Physical Chemistry 2(0-4)
Laboratory techniques in thermodynamics, chemical equilibria, phase phenomena, kinetics, spectroscopy. Prerequisite: CHEM 321 or permission of instructor. (*)

CHEM 378 Practicum in Laboratory Instruction 1(0-2)
Laboratory preparation, instruction, safety, and methods under the guidance of an instructor. May be repeated for a maximum of two credits. Prerequisite: permission of instructor. (F,S) Repeatable (2)

CHEM 389 Scientific Literature Review 1(1-0)
Surveys of both print and web-based chemical and biochemical literature. May be repeated twice. Prerequisite: CHEM 302. (F,S) Repeatable (2)

CHEM 401 Advanced Organic Chemistry 3(3-0)
Topics of advanced organic chemistry, including organic reactions, mechanisms, natural products, and spectroscopy. Prerequisite: CHEM 302 or permission of instructor. (*)

CHEM 401L Advanced Organic Chemistry Lab 1(0-3)
Laboratory course to accompany CHEM 401. Molecular structure determination by chemical and instrumental methods. Corequisite: CHEM 401. (*)

CHEM 403 Polymer Chemistry 3(3-0)
Study of synthetic polymers including synthesis, mechanisms of formation, structure of elucidation, reactivity, properties, and industrial application. Biopolymers also will be considered. Prerequisite: CHEM 302/302L. (*)

CHEM 411 Biochemistry I 3(3-0)
Chemistry of constituents of living matter, including proteins, carbohydrates, nucleic acids and lipids. An introduction to enzymes and coenzymes. Prerequisite: CHEM 302 or permission of instructor. (F)

CHEM 412 Biochemistry II 3(3-0)
Continuation of CHEM 411. Intermediary metabolism of carbohydrates, lipids, and amino acids. Bioenergetics. Prerequisite: CHEM 411 or CHEM 511 or permission of instructor. (S)

CHEM 412L Biochemistry II Lab 2(0-6)
Prerequisite: CHEM 302. Pre or corequisite: CHEM 412. (*)

CHEM 413 Molecular Basis of Disease 3(3-0)
This advanced seminar course explores the molecular nature of disease and engages students in the study of diseases using current topical biochemical literature. Prerequisite: CHEM 411 or 511 or permission of instructor. (*)

CHEM 419 Instrumental Analysis 3(3-0)
Instrumental techniques in chemical separations, electrochemistry, atomic, and molecular spectroscopy. Prerequisite: CHEM 317 and CHEM 322 or permission of instructor. (S)

CHEM 419L Instrumental Analysis Lab 2(0-6)
Prerequisite: CHEM 317 and CHEM 322 or permission of instructor. Pre or corequisite: CHEM 419. (S)

CHEM 421 Advanced Inorganic Chemistry 3(3-0)
Structure and bonding, coordination theory, periodic relations, equilibrium, kinetics, thermodynamics, descriptive chemistry. Prerequisite: CHEM 221 and CHEM 322 or permission of instructor. (S)

CHEM 425 Environmental Chemistry 3(3-0)
Chemical process in air, water and soil. Air, water analysis and treatment, pollution. Prerequisite: CHEM 321 or permission of instructor. (*)

CHEM 431 Advanced Physical Chemistry 3(3-0)
Emphasizes latest developments in applied physical chemistry, including advanced theory, and instrumental and computational applications. Prerequisite: CHEM 321 and CHEM 322 or permission of instructor. (F,O)

CHEM 460 Forensic Chemistry II 2(2-0)
Investigation of identification techniques for forensic analysis. Topics include arson, biological fluid and drug identification, and DNA analysis. Prerequisite: CHEM 260 and CHEM 260L and CHEM 302 and CHEM 302L or permission of instructor. (F)

CHEM 460L Forensic Chemistry II Lab 2(0-4)
The laboratory will accompany CHEM 460, Forensic Chemistry II lecture. Prerequisite: CHEM 260 and CHEM 260L and CHEM 302 and CHEM 302L or permission of instructor. Pre or corequisite: CHEM 460. (F)

CHEM 491 Special Topics (1-5 VAR)
Prerequisite: permission of instructor. (*) Repeatable

CHEM 492 Research (1-3 VAR)
Faculty directed research project for undergraduate student. May be repeated for a maximum of 3 credits, total. Prerequisite: permission of instructor. (F,S,SS) Repeatable (4)

CHEM 493 Seminar 1(1-0)
Presentation of a formal presentation on chemical research or a current topic in the chemical literature using software-based delivery methods. May be repeated once. (F,S) Repeatable (2)

CHEM 495 Independent Study (1-7 VAR)
Prerequisite: permission of instructor. (*) Repeatable

CHEM 498 Internship (1-6 VAR)
Work experience in the chemistry discipline under the combined supervision of the selected organization and a faculty member. Prerequisite: permission of instructor. (F,S,SS) Repeatable

GRADUATE COURSES

CHEM 501 Advanced Organic Chemistry 3(3-0)
Topics of advanced organic chemistry including organic reactions, mechanisms, natural products, spectroscopy, and industrial applications. Prerequisite: CHEM 302 or permission of instructor. (*)

CHEM 501L Advanced Organic Chemistry Lab 1(0-3)
Molecular structure determination by chemical and instrumental methods. Advanced synthetic techniques. Pre or corequisite: CHEM 501. (*)

CHEM 503 Polymer Chemistry 3(3-0)
Study of synthetic polymers including synthesis, mechanisms of formation, structure elucidation, reactivity, properties, and industrial application. Biopolymers also will be considered. Prerequisite: CHEM 302, or permission of instructor. (*)

CHEM 510 Foundations in Graduate Studies 3(3-0)
Laboratory safety. Effective sourcing, use, and interpretation of the literature. Scientific methodology, writing, and review of research ethics. Development of a thesis or internship plan. Prerequisite: graduate standing. (F)

CHEM 511 Biochemistry I 3(3-0)
Chemistry of constituents of living matter, including proteins, carbohydrates, nucleic acid and lipids. An introduction to enzymes and coenzymes. Prerequisite: CHEM 302 or permission of instructor. (F)

CHEM 512 Biochemistry II 3(3-0)
Intermediary metabolism of carbohydrates, lipids and amino acids. Bioenergetics. Prerequisite: CHEM 411 or CHEM 511 or permission of instructor. (S)

CHEM 512L Biochemistry II Lab 2(0-6)
Prerequisite: CHEM 302. Pre or corequisite: CHEM 512. (*)

CHEM 513 Molecular Basis of Disease 3(3-0)
This advanced seminar course explores the molecular nature of disease and engages students in the study of diseases using current topical biochemical literature. Prerequisite: CHEM 411 or CHEM 511 or permission of instructor. (*)

CHEM 519 Instrumental Analysis 3(3-0)
Instrumental techniques in chemical separations, electro-chemistry, atomic, and molecular spectroscopy. Prerequisite: CHEM 317 and CHEM 322 or permission of instructor. (S)

CHEM 519L Instrumental Analysis Lab 2(0-6)
Prerequisite: CHEM 317 and CHEM 322 or permission of instructor. Pre or corequisite: CHEM 519. (S)

CHEM 521 Advanced Inorganic Chemistry 3(3-0)
Structure and bonding, coordination theory, periodic relations, equilibrium, kinetics, thermodynamics, descriptive chemistry, industrial applications. Prerequisite: CHEM 221 and CHEM 322 or permission of instructor. (S)

CHEM 525 Environmental Chemistry 3(3-0)
Chemical processes in the air, water and soil. Air, water soil analysis and treatment. Special emphasis upon the problems and effects of industrial and other pollution. Prerequisite: CHEM 321 or permission of instructor. (*)

CHEM 529 Advanced Analytical Chemistry 3(3-0)
Emphasizes latest developments in applied analytical chemistry, including advanced theory, wet chemical methods, and the design and application of advanced instrumentation. Prerequisite: CHEM 419 and CHEM 419L and CHEM 321 or permission of instructor. (S,E)

CHEM 531 Advanced Physical Chemistry 3(3-0)
Emphasizes latest developments in applied physical chemistry, including advanced theory, and instrumental and computational applications. Prerequisite: CHEM 321 and CHEM 322 or permission of instructor. (F,O)

CHEM 550 Industrial Chemistry 2(2-0)
The economic importance and special characteristics of the chemical industry. Feedstocks, intermediates and products of the chemical industry including thermoplastics, thermosetting plastics, paints and coatings, elastomers, fibers, surfactants, pharmaceuticals, agricultural chemicals, paper, acids, etc. Market demands, price and cost factors, scale, research, process chemistry and process control, product development. Case studies illustrating above topics. (*)

CHEM 560 Forensic Chemistry II 2(2-0)
Investigation of identification techniques for forensic analysis. Topics include arson, biological fluid and drug identification, and DNA analysis. Prerequisite: CHEM 260 and CHEM 260L and CHEM 302 and CHEM 302L or permission of instructor. Corequisite: CHEM 560L. (F)

CHEM 560L Forensic Chemistry II Laboratory 2(0-4)
The laboratory will accompany CHEM 560, Forensic Chemistry II lecture. Prerequisite: CHEM 260 and CHEM 260L and CHEM 302 and CHEM 302L or permission of instructor. Pre or corequisite: CHEM 560. (F)

CHEM 578 Practicum in Laboratory Instruction 1(0-2)
Laboratory preparation, instruction and methods under the guidance and supervision of an instructor. May be repeated for a maximum of four credits. Prerequisite: graduate standing or permission of instructor. (S/U grading) (F,S,SS) Repeatable (4)

CHEM 580 Graduate Writing in the Sciences 1(1-0)
This one-credit course is designed to help prepare students for the rigors of academic writing at the graduate and professional levels. (*)

CHEM 588 Internship Defense 1(1-0)
Graduate internship presentation, satisfactory report, and examination for completion of MS degree option within the Graduate Programs in Natural Sciences. Prerequisite: graduate standing and permission of instructor. (F,S,SS)

CHEM 589 Thesis Defense 1(1-0)
Thesis presentation and satisfactory written thesis for completion of MS degree option within the Graduate Programs in Natural Sciences. Prerequisite: graduate standing and permission of instructor. (F,S,SS)

CHEM 591 Special Topics (1-4 VAR)
Prerequisite: permission of instructor. (*) Repeatable

CHEM 592 Research (1-6 VAR)
Faculty directed research project for graduate students. Prerequisite: graduate standing and permission of instructor. (S/U grading) (F,S,SS) Repeatable

CHEM 593 Seminar 1(1-0)
An interdisciplinary seminar on topics appropriate to the application of natural sciences. Prerequisite: CHEM 510 and graduate standing. (*)

CHEM 595 Independent Study (1-4 VAR)
Prerequisite: permission of instructor. (*) Repeatable

CHEM 598 Graduate Internship (1-4 VAR)
Volunteer or paid work experience under the combined supervision of the selected organization and a faculty member. Prerequisite: graduate standing and permission of instructor. (S/U grading). (F,S,SS) Repeatable

CHEM 599 Thesis Research (1-6 VAR) (*) Repeatable
Prerequisite: permission of instructor.

COMPUTER INFORMATION SYSTEMS (CIS)

UNDERGRADUATE COURSES

CIS 100 Introduction to Word and Windows 1(1-0)
A competency-based course, topics include: file management, formatting, fonts, editing, reports, footnotes, desktop publishing, clip art, styles, outlines, tables, and mail merge. (F,S,SS)

CIS 103 PowerPoint and Web Publishing 1(1-0)
An introduction to PowerPoint and FrontPage. Includes: presentation templates, charts, object embedding, slide shows, Internet search methods, web page design, web site creation and publishing. (F,S,SS)

CIS 104 Excel Spreadsheets 1(1-0)
Includes worksheet design, text and formula manipulation, charts, lists, pivot tables, ranges, lookup tables, data analysis, functions, and macros. (F,S,SS)

CIS 105 MS Access DBMS 1(1-0)
Course includes relational database design, table creation, data manipulation, queries, forms, reports, web access, and interface design. (F,S,SS)

CIS 150 Computer Information Systems 3(3-0)
Survey of Computer Information Systems includes data representation, operating systems, networks, the Internet and information system design. Discussion of careers in CIS. (F,S)

CIS 171 Introduction to Java Programming 4(3-2)
An introduction to computer programming, design and testing using the Java object-oriented programming language. Topics include language constructs, functions, file handling, inheritance and UML. (F,S,SS)

CIS 185 PC Architecture 3(2-2)
In depth study of personal computer hardware, peripherals, and interfaces. Course examines processors, disk drives, buses, video cards, memory and diagnostic software. (F,S)

CIS 240 Object Oriented Analysis and Design 3(3-0)
Practical methods for analyzing business problems and designing large-scale software solutions using object oriented techniques, tools, methodologies, with in-depth focus on the Unified Modeling Language. Prerequisite: CIS 171. (F,S)

CIS 271 Advanced Program Design with Java 4(3-2)
Continuation of CIS 171, includes advanced Java programming constructs such as data structures, multi-threading, collections, database connectivity, remote objects and GUI's. Prerequisite: CIS 171. (F,S)

CIS 289 Network Concepts 3(2-2)
Fundamental hardware, software, and data communication concepts necessary to understand computer networks. (F,S)

CIS 290 Special Projects (1-5 VAR)
Individual projects designed to extend student knowledge beyond offerings in the current curriculum. Examples include program, database, Web site or network research or development. Prerequisite: sophomore standing and permission of instructor. (F,S,SS) Repeatable (3)

CIS 291 Special Topics (1-5 VAR)
Study of new and emerging topics and technologies in the computing field. May be repeated for credit. Prerequisite: sophomore standing. (*) Repeatable (3)

CIS 298 Internship (1-5 VAR)
IT-related industrial work experience under the direction of a field supervisor and faculty member. (S/U grading) (F,S,SS) Repeatable (6)

CIS 311 Introduction to Web Development 3(3-0)
An introduction to web site design and implementation using HTML, JavaScript, XML and other state of the art web development tools and languages. Prerequisite: CIS 171. (F,S)

CIS 315 Unix Operating System 3(3-0)
Explore UNIX features, covering command language, file system, mail, and editing. Shell language tools include pipes, filters and I/O redirection. Prerequisite: CIS 171. (F,S)

CIS 350 Database Management 3(3-0)
Design, implementation and use of database management systems; comparison of available software packages; concepts of query languages and security considerations. Laboratory assignments utilize a relational database system. Prerequisite: CIS 240 or permission of instructor. (F)

CIS 356 Mobile Application Development 3(3-0)
Design and development of mobile applications using objective-C or Java for iOS or Android operating systems. Prerequisite: CIS 271. (*)

CIS 359 Advanced Programming with C# 3(3-0)
Design and develop desktop and web-based applications using C# and .NET. Emphasis on advanced programming concepts and technique. Prerequisite: CIS 171. (S)

CIS 360 Information Technology Security 3(2-2)
Applied course emphasizing: need for security, planning, cryptography, physical, email, web, wireless, and security technologies. Develops skills needed for CompTIA Security+ certification. Corequisite: CIS 289. (F,S)

CIS 383 E-Commerce 3(3-0)
This course focuses on key issues including e-commerce strategy, business models, technology infrastructure, security and payment systems, e-marketing, and ethical behavior. Prerequisite: MGMT 201 and junior standing. (*)

CIS 401 Network Systems Administration 3(2-2)
Concepts and skills necessary to function as network system supervisor in both Microsoft and a Novell networking environment. Prerequisite: CIS 289. (F)

CIS 402 Linux Networks and Routing 3(2-2)
Examination and practice of the concepts and skill necessary to function as a system administrator in a Linux environment. Basic concepts of network routing. Prerequisite: CIS 315. (*)

CIS 411 Internet Server-Side Programming 3(3-0)
Server based web programming and scripting. Includes data base access methods, open source tools, and web application construction from the server side. Prerequisite: CIS 311, CIS 350. (F)

CIS 432 Senior Professional Project 6(3-6)
Student Teams design and implement database, network, web and other computer-based projects in the local community. Modern analysis, design and modeling techniques are emphasized. Prerequisite: all required CIS classes, MGMT 368. Corequisite: graduating semester or consent of instructor. (S)

CIS 450 Advanced Data Analytics 3(3-0)
Introduction to data analytics, including fundamental analytical modeling and contemporary computing techniques. Using applications to build analytical models, practice technology tools, and solve business problems. Prerequisite: CIS 350, or permission of instructor. (*)

CIS 461 IT Security Management 3(3-0)
Students learn to assess, design, develop, and implement information security programs for organizations. Covers on-going management of security programs. (S)

CIS 462 Computer Forensics 3(2-2)
Focus on the detection, isolation and response to information security breaches and attacks. Provides a detailed examination of the entire computer forensic process. Prerequisite: CIS 289. (F)

CIS 481 Information Technology Implementation 3(3-0)
Prepares managers to address the complex issues and dynamics surrounding technology-driven change in organizations that introduce new technology. Prerequisite: senior standing or consent of instructor. (F)

CIS 482 Information Technology Strategy 3(3-0)
Prepares information systems workers and other professionals to develop an IT strategy that aligns business strategy with IT infrastructure; emphasis on IT for competitive advantage. Prerequisite: senior standing or consent of instructor. (S)

CIS 490 Special Projects (1-5 VAR)
Individual projects designed to extend student knowledge beyond offerings in the current curriculum. Examples include program, database, Web site or network research or development. Prerequisite: permission of instructor. (F,S,SS) Repeatable (6)

CIS 491 Special Topics (1-5 VAR)
Study of new and emerging topics and technologies in the computing field. May be repeated for credit. Prerequisite: junior or senior standing. (F,S,SS) Repeatable (9)

CIS 493 Senior Seminar 1(1-0)
Seminar concerning appropriate career topics in computer information systems. Speakers may include guests, faculty or students. Student outcomes will be assessed. Required of majors. Prerequisite: all required CIS classes. Corequisite: CIS 432. (S/U grading) (S)

CIS 498 Internship (1-5 VAR)
IT-related industrial work experience under the direction of a field supervisor and faculty member. Prerequisite: junior or senior standing. (S/U grading) (F,S,SS) Repeatable (6)

GRADUATE COURSES

CIS 532 Professional Project 6(3-6)
Student teams design and implement database, network, web and other computer-based projects in the local community. Modern analysis, design and modeling techniques are emphasized. Prerequisite: all required CIS classes, MGMT 368. (F,S)

CIS 550 Data Base Systems 3(3-0)
Design implementation and use of database management systems. Comparison of available software packages. Discussion of query languages, security, and recovery. Prerequisite: CIS 240 or MGMT 365 or MGMT 565 or permission of instructor. (F)

CIS 560 Information Technology Security 3(2-2)
Applied course emphasizing: need for security, planning, cryptography, physical, email, web, wireless, and security technologies. Develops skills needed for CompTIA Security+ certification. Prerequisite: CIS 289 or consent of instructor. (F,S)

CIS 561 IT Security Management 3(3-0)
Students learn to assess, design, develop, and implement information security programs for organizations. Covers on-going management of security programs. Prerequisite: any Introduction to Management course. (S)

CIS 562 Computer Forensics 3(2-2)
Focus on the detection, isolation and response to information security breaches and attacks. Provides a detailed examination of the entire computer forensic process. Prerequisite: consent of instructor. (F)

CIS 581 Information Technology Implementation 3(3-0)
Prepares managers to address the complex issues and dynamics surrounding technology-driven change in organizations that introduce new technology. Prerequisite: graduate standing. (F)

CIS 582 Information Technology Strategy 3(3-0)
Prepares information systems workers and other professionals to develop an IT strategy that aligns business strategy with IT infrastructure; emphasis on IT for competitive advantage. Prerequisite: graduate standing. (S)

CIS 583 E-Commerce 3(3-0)
This course focuses on key issues including e-commerce strategy, business models, technology infrastructure, security and payment systems, e-marketing, and ethical behavior. Prerequisite: admission to MBA or permission of MBA Director. (*)

CIS 591 Special Topics (1-5 VAR)
Study of new and emerging topics and technologies in the computing field. May be repeated for credit. Prerequisite: graduate student standing and instructor permission. (F,S,SS)

COMMUNICATION & RHETORIC (COMR)

UNDERGRADUATE COURSES

COMR 103 Speaking and Listening 3(3-0)
Introduces principles of speaking and listening with emphasis on exposition and its application to public speaking. (F,S,SS) (Gen Ed: H)

COMR 115 Forensics Activity I 3(3-0)
On- and off- campus activities including intercollegiate forensic competition, programs for students and public. Communication skill and experience development. (*)

COMR 204 (ENG 204) Introduction to Rhetoric 3(3-0)
Provides an introduction to the rhetorical tradition in relationship to the needs of various cultural, technological, and professional contexts. (*)

COMR 212 Argumentation 3(3-0)
Argumentation focuses on the methods advocates employ to make rational decisions and to win assent to others' statements. Particular emphasis on the nature and skills of reasoned discourse. (*)

COMR 221 Interpersonal Communication 3(3-0)
The principles and skills of speaking applied to informal speaking situations. Topics covered include openness, genuineness, and talking appropriately to people. (*)

COMR 260 Language Acquisition and Linguistics 3(3-0)
Normal processes of development of language in children, growth of language, including structure, comprehension, use of oral and written language, other symbolic behavior. (F)

COMR 291 Special Topics (1-3 VAR) (*) Repeatable

COMR 295 Independent Study (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

COMR 312 Persuasion (2-3 VAR)
Examination of the principles and theories of persuasion and their application to persuasive settings. Emphasis on using language to secure belief and action. (*)

COMR 335 (ENG, WS 335) Gender and Communication 3(3-0)
This course examines the ways that gender affects communication behaviors and helps develop an awareness of the processes that affect gender socialization and stereotyping. (*)

COMR 350 Communicating in Professions 3(3-0)
Introduces the basics of professional communication in the workplace. The course attends to both theory and practice in interpersonal, small group, organizational and intercultural communication. Prerequisite: junior or senior standing. (F)

COMR 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

COMR 493 Seminar 3(3-0)
This course will synthesize skills learned in the minor exposing students to theories and practices of communication training and development with an applied focus. Prerequisite: junior or senior standing. (S)

COMR 495 Independent Study (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

GRADUATE COURSE

COMR 583 Contemporary Cultural Communication 3(3-0)
The purpose of this course is to explore Intercultural Communication with the intent to better understand and appreciate cultural differences. (*)

CONSTRUCTION MANAGEMENT (CM)

UNDERGRADUATE COURSES

CM 101 Intro to Construction Management 2(1-2)
Identify and understand the relationships among participants in the construction process and its history. Including risks, construction processes, construction law, regulations and construction project delivery. (F)

CM 231 Statics and Structures 4(4-0)
Introduction to statics, strength of materials, and theory of structures, its applications to building construction and the use of trigonometry in solution of statics problems. Prerequisite: MATH 121. Pre or corequisite: PHYS 201, 201L. (F)

CM 320 Soils in Construction 3(2-2)
A study of soil as a construction material; including investigation, testing, classification, engineering properties and modification techniques, excavations, fills, slope stability, and pavement subgrades. Prerequisite: CM 231. (S)

CM 330 Wood Structural Systems 3(2-2)
A study of production and properties of wood, design methods for wood structural elements and fasteners, and production and erection methods of wood structures. Prerequisite: CM 231. (F)

CM 341 Concrete and Steel Structures 4(3-2)
A study of concrete and steel structures including design elements and construction methods for simple structural systems, joints, connections, fasteners, and concrete formwork. Prerequisite: CM 231. (S)

CM 351 Construction Planning & Scheduling 3(2-2)
Principles and techniques of planning and scheduling for construction projects. Topics include bar charts, Critical Path Method, precedence networks and cost-time takeoffs. Prerequisite: CET 304 or CET 305. (S)

CM 391 Special Topics (1-3 VAR) (*) Repeatable

CM 445 Construction Safety 2(2-0)
The study of safe construction techniques, workers compensation insurance, OSHA regulations and requirements, cost of accidents, and ethical conduct regarding safety. Prerequisite: CET 207. (S)

CM 451 Mechanical & Electrical Systems 4(4-0)
The study of mechanical and electrical systems associated with building construction: climate control systems, water and waste water systems, electric power and electronic communication systems. Prerequisite: PHYS 201, CET 207. (F)

CM 461 Construction Law 3(3-0)
Legal documents and operation in construction management including business ownership and organization, business development through bidding and negotiations, contracts, communication during construction, insurance and accounting. Prerequisite: CET 303. (F)

CM 465 Construction Accounting & Finance 3(3-0)
Construction project analysis/financial control including, cash flow analysis and management, overhead cost and break even analysis, time value of money, banking, and bonding. Prerequisite: ACCTG 201. (S)

CM 475 Senior Project 3(1-4)
An exercise in construction project analysis cost estimating, scheduling, and the preparation and professional presentation of a project bid package for an organization. Prerequisite: senior standing in CM; must be within 2 semesters of graduation. (S)

CM 491 Special Topics (1-3 VAR) (*) Repeatable

CM 495 Independent Study (1-3 VAR)
Directed study for students interested in a specific area of CM. (F,S) Repeatable (2)

CHICANO STUDIES (CS)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

CS 101 Introduction to Chicano Studies 3(3-0)
Overview of the historical, political and socio-cultural experience of the Chicano. (F,S,SS) (Gen Ed: HS, GT HI1) (CC)

CS 136 (HIST 136) The Southwest United States 3(3-0)
This course traces the culture and historical development of the southwestern United States, including cultural contributions of the American Indian and Hispanic peoples. (F,S) (Gen Ed: HS, GT-HI1) (CC)

CS 220 (ENG 220) Survey of Chicano Literature 3(3-0)
Survey of outstanding contemporary Chicano works. Literature deals with Chicano themes, including analysis of folklore and myth. (*) (Gen Ed: H, GT-AH2) (CC)

CS 230 (SW 230) Chicano: Social and Psychological Study 3(3-0)
Social and psychological forces faced in the Chicano community. (F) (Gen Ed: SS, GT-SS3) (CC)

CS 235 Ballet Folklorico 3(1-2)
The Mexican Folkloric Ballet class is designed with the interest of learning the history and art of an important part of Mexican culture, "Dance." (*) Repeatable (6)

CS 291 Special Topics (1-3 VAR)
Topics in Chicano studies, identified by student/faculty interest. Prior work in Chicano studies desirable. (*) Repeatable

CS 303 Chicano Labor History in the United States 3(3-0)
Chicano experience in the American labor market from 1848 to present. (*)

CS 306 (WS 306) La Chicana 3(3-0)
A social cultural and historical overview of the Chicana experience and contributions. (F,S)

CS 325 (SW 325) Health in the Chicano Community 3(3-0)
Health care traditions and current health care systems in the barrio. (S)

CS 341 (WS 341) Chicana Writers 3(3-0)
Survey of Chicana writers from the early 1900's to the present. Along with the literature, aspects of history, sociology and politics will be incorporated. (*)

CS 346 (HIST 346) History of Mexico 3(3-0)
This course surveys the major political, economic, social and cultural developments of Mexico from pre-Columbian times to the present. (*)

CS 401 (WS 401) Third World Feminisms 3(3-0)
This course focuses on Third World women's challenging views of global feminism and feminist representations of other women. (*)

CS 420 Voices of Protest 3(3-0)
This course will highlight the contributions of people of color throughout the history of the United States. Prerequisite: junior or senior level standing. (F,S)

CS 485 Capstone 3(3-0)
Students will develop a project in which they will develop and execute a research assignment related to ethnicity, gender, or diversity. Prerequisite: senior level standing; permission of the instructor. (*)

CS 489 (HIST 489) Borderlands 3(3-0)
History of the Mexican cession to the U.S. from its Indian and Hispanic origins to the present. (S,O)

CS 491 Special Topics (1-3 VAR)
Topics in Chicano Studies, identified by student/faculty interest. Prior work in Chicano Studies desirable. (*) Repeatable

CS 495 Independent Study (1-3 VAR)
Special topics dealing with the Chicano and society. Prerequisite: CS 101. (F,S,SS)

CS 498 Internship (1-3 VAR)
For students with advanced standing. Practical experience through internships in government, business, and other community organizations. Prerequisite: CS 101, CS 136, CS 306 and permission from program coordinator. (S)

DIVERSITY STUDIES (DS)

UNDERGRADUATE COURSE

DS 485 Capstone 3(3-0)
Students will develop a project in which they will develop and execute a research assignment related to ethnicity, gender, or diversity. Prerequisite: senior level standing and permission of instructor. (*)

ECONOMICS (ECON)

UNDERGRADUATE COURSES

ECON 201 Principles of Macroeconomics 3(3-0)
Applications oriented approach to understanding the economy including monetary policy, deficits and surpluses, international issues; fundamental differences between liberal and conservative economic policies. (F,S) (Gen Ed: SS, GT-SS1)

ECON 202 Principles of Microeconomics 3(3-0)
Illustrates how firms make price, wage and profit maximizing decisions. Other topics include market performance, market failure, environmental issues and government intervention. (F,S) (Gen Ed: SS, GT-SS1)

ECON 301 Intermediate Macroeconomics 3(3-0)
In-depth study of macroeconomic models including classical, Keynesian, monetarist, new classical and new Keynesian systems. Evaluates applications of monetary and fiscal policies in different models. Prerequisite: ECON 201. (F)

ECON 302 Intermediate Microeconomics 3(3-0)
In-depth study of microeconomic theories of production and consumption. Emphasis on strategic behavior and decision making under uncertain conditions. Prerequisite: ECON 202. (S)

ECON 308 Economics for Managers 3(3-0)
Advanced study of economic concepts for managerial decision-making. Topics covered include demand estimation and elasticity, cost estimation, macroeconomic indicators, and the Federal Reserve system. Prerequisite: ECON 201 and ECON 202. (F,S)

ECON 310 Money and Banking 3(3-0)
Topics include behavior of interest rates, money supply process and theory of central banking, determinants of exchange rates and current issues of international financial system. Prerequisite: ECON 201. (*)

ECON 420 Regional Economic Analysis 3(3-0)
Applies regional economic concepts to real-world projects. Develops skills in accessing a community's trade area, trade relations between communities and sources of local employment growth. Prerequisite: ECON 201. (*)

ECON 475 International Economics 3(3-0)
International trade and finance theory. Topics include trade protectionism, regional alliances, role of international organizations, economic development, exchange rate determination and balance of payments. Prerequisite: ECON 201 and ECON 202. (*)

ECON 490 Special Projects (1-6 VAR) (*) Repeatable (6)

ECON 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable (6)

ECON 495 Independent Study (1-3 VAR)
Prerequisite: senior standing in School of Business and permission of department chair. (*) Repeatable (6)

ECON 498 Internship (1-6 VAR)
Supervised field work in selected business, social, and governmental organizations; supplemented by written reports. Prerequisite: junior or senior standing in School of Business and permission of internship coordinator. (S/U grading) (*) Repeatable (6)

GRADUATE COURSES

ECON 501 Fundamentals of Economics 1.5(1.5-0)
This class prepares students to understand the market economy and forces that affect prices of goods and services, prices of resources and profit maximizing decisions. Prerequisite: admission to MBA. (*)

ECON 505 Principles of Microeconomics 3(3-0)
Applications oriented approach to understanding the economy including monetary policy, deficits and surpluses, international issues; fundamental differences between liberal and conservative economic policies. (*)

ECON 510 Economics for Managers 3(3-0)
Provides the macro- and micro-economic understanding managers will use throughout their careers. Topics include demand estimation, pricing, decisions under uncertainty, domestic monetary policy, international economics. Prerequisite: admission to MBA or permission of MBA Director. (*)

ECON 591 Special Topics 3(3-0)
Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

ECON 595 Independent Study (1-3 VAR)
Individual study of a subject determined by the instructor and student with permission of the director. Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

EDUCATION (ED)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

ED 102 Teaching as a Career 1(1-1)
Orientation to teaching and teacher education. Class sessions and classroom observation required. Not required for teacher certification. (F,S)

ED 202 Foundation of Education 3(3-0)
Historical, philosophical and sociological dimensions of education including legal and financial challenges associated with the institution of education. (F,S,SS)

ED 210 Human Growth and Development for Educators 3(3-0)
Physical, mental, social and emotional growth of the individual; provides teachers with needed perspectives on elementary and secondary school students. (F,S,SS)

ED 280 Educational Media and Technology 3(3-0)
Prepares teachers to use technology for instruction, assessment, management, and research. (F,S,SS)

ED 301 Frameworks of Teaching 4(4-0)
Includes approaches to designing learner-centered classroom communities through applications of standards-based instruction, effective planning and assessment, and classroom management; 30 hours of field experience. Prerequisite: completion of 45 credit hours and 2.6 cumulative GPA. (F,S)

ED 325 Early Field Experience with the Atypical Learner (1-3 VAR)
Development and implementation of principles in teaching atypical learners in a tutorial situation. Prerequisite: admission to Teacher Education Program. (*) Repeatable

ENG 351 Children's Literature 2(2-0)
Classic and contemporary children's literature with emphasis on selection and evaluation. Prerequisite: ENG 102. (*)

ED 380 Integrated Methods in Elementary 3(3-0)
Prepares elementary teachers to integrate the expressive arts and physical education into the elementary curriculum; 30 hours of field experience. Prerequisite: acceptance into the Teacher Education Program. (F,S)

ED 400 Workshop (1-3 VAR)
Designed for special activity-oriented experiences to be conducted in short sessions. Each workshop has a subtitle and no subtitle may be repeated for credit. Prerequisite: acceptance to the Teacher Education Program or permission of instructor. (*) Repeatable

ED 406 Behavioral Support 3(3-0)
Prepares teachers to implement individual, classroom-wide and school-wide behavioral supports and interventions. Field experience required. Prerequisite: admission to Teacher Education. (SS)

ED 407 Levels of Support I 3(3-0)
Prepares teachers to teach students with special needs in inclusive environments, with emphasis on literacy, math, and academic interventions. Requires field experience. Prerequisite: admission to Teacher Education. (SS)

ED 408 Levels of Support II 3(3-0)
Addresses effective instruction for secondary students, including transition planning. Requires field experience. Beginning reading course strongly recommended as a prerequisite: Prerequisite: admission to Teacher Education. (F)

ED 409 Levels of Support III 3(3-0)
Focuses on instructional programs for K-12 students with severe learning and behavioral challenges. Requires field experience. Prerequisite: admission to Teacher Education. (S)

ED 410 Collaboration in Education 3(3-0)
Supports skills at co-teaching, teaming, and collaboration with teachers, families, paraprofessionals, and others to strengthen student achievement. Requires field experience. Prerequisite: admission to Teacher Education. (S)

ED 412 Teaching Diverse Learners 3(3-0)
Focuses on legislation for special education, nature of exceptionalities, and meeting the needs of K-12 students, including second language learners; 30 hours field experiences. Prerequisite: acceptance into the Teacher Education Program. (F,S)

ED 413 Teaching Elementary Social Studies 2(2-0)
Methods of teaching social studies in the elementary school. Prerequisite: acceptance into the Teacher Education Program. (F,S)

ED 414 Teaching Elementary Science and Health 2(1.5-1.5)
Methods of teaching health and science in the elementary school. Part of elementary field experience block. Prerequisite: acceptance into the Teacher Education Program. (F,S)

ED 417 Teaching Mathematics in Elementary School 2(1.5-1.5)
Scope and sequence of elementary school mathematics are examined along with instructional methods that address the developmental differences of children; 30 hours of field experiences. Prerequisite: MATH 361 and acceptance into the Teacher Education Program. (F,S)

ED 421 Classroom Integration of Internet 2(2-0)
Methods to effectively and legally integrate the Internet into the classroom as a communication and instructional tool. Prerequisite: ED 280, admission to Education. (F,S)

ED 423 Teaching and Managing Technology 3(3-0)
Strategies, processes, and procedures for managing technology in K-12, including efficient use of emerging pedagogies. Prerequisite: ED 280, admission to Education. (F,S)

ED 427 Productivity Tools for Classroom 1(1-0)
Applications of Microsoft Office as a productivity tool, including integration of use in classroom. Field experience required. Prerequisite: ED 280, admission to Education. (F,S)

ED 428 Integration of Educational Software 1(1-0)
Familiarity with and criteria for selecting evaluating, and using quality educational software. Field experience required. Prerequisite: ED 280, admission to Education. (F,S)

ED 429 Literacy & Technology 3(3-0)
Methods for using technology to assess and teach literacy. Prerequisite: ED 280, admission to Education. (F,S)

ED 431 Diverse Learners & Technology 3(3-0)
Strategies for using technology to enhance learning for all students, with emphasis on the relationship between technology and equity. Field experience required. Prerequisite: ED 280, admission to Education. (F,S)

ED 432 Hardware & Networking for Educators 3(3-0)
Pedagogical and practical considerations in using networking and hardware in schools. Prerequisite: ED 280. (SS)

ED 433 Instructional Theory & Tech Design 3(3-0)
Instructional system design theories and models and their adaptation to plan and use technology effectively in the classroom. Field experience required. Prerequisite: ED 280, admission to Education. (F,S)

ED 434 Multimedia Design 3(3-0)
Methods and tools for creating multimedia learning objects for K-12 classrooms. Field experience required. Prerequisite: ED 280, admission to Education. (SS)

ED 435 Classroom Management 3(2-3)
Includes general teaching methods and strategies, learning theories applied to teaching discipline, curriculum educational measurement and evaluation, school organization and school law applicable to classroom teachers. Field experience required. Prerequisite: acceptance into the Teacher Education Program. (F,S)

ED 436 Technology & Assessment Tools 3(3-0)
Prepares teachers to use technology in assessment practices in the classroom. Prerequisite: admission to Teacher Education. (SS)

ED 444 Teaching Secondary Science 4(3-2)
Focuses on teaching methods, materials, and assessment strategies necessary to prepare students to teach in secondary standards-based science classrooms; 60 hours of field experience. Prerequisite: acceptance into the Teacher Education Program. (F)

ED 445 Assessment & Data Driven Instruction 3(3-0)
Prepares teachers to select, administer, and interpret formal and informal assessments to improve instruction. Requires field experience. Prerequisite: acceptance into the Teacher Education Program. (F)

ED 446 Teaching K-12 Art 4(3-2)
Focuses on art curriculum, methods, and assessment to prepare art educators to successfully teach in K-12 standards-based art classrooms; 60 hours of field experience. Prerequisite: acceptance into the Teacher Education Program. (F)

ED 447 Teaching English in Secondary Schools 4(3-2)
Familiarizes students with Colorado foreign language standards, standards-based lesson and unit planning, and authentic assessment; 60 hours of field experiences. Prerequisite: acceptance into the Teacher Education Program. (F)

ED 448 Teaching Foreign Language (K-12) 4(3-2)
Familiarizes students with Colorado foreign language standards, standards-based lesson and unit planning, and authentic assessment; 60 hours of field experiences. Prerequisite: acceptance into the Teacher Education Program. (F)

ED 451 Teaching Secondary Social Studies 4(3-2)
Familiarizes students with the Colorado content standards, including standards-based lesson and unit planning strategies and authentic assessment; 60 hours of field experiences. Prerequisite: acceptance into the Teacher Education Program. (F)

ED 452 Teaching Secondary Business 4(3-2)
Prepares teachers to teach all areas of the business curriculum in secondary schools; 60 hours of field experiences. Prerequisite: admission to Teacher Education. (*)

ED 472 Teaching Early Childhood 3(3-0)
Methods for teaching literacy, math, motor and social skills, science, and social studies in early childhood. Prerequisite: admission to Teacher Education or graduate standing and completion of a teaching program. (*)

ED 473 Creative Arts in Early Childhood 3(3-0)
Exploration of principles and methods for teaching music, movement, visual arts and dramatic play in early childhood. Prerequisite: admission to Teacher Education or graduate standing and completion of a teaching program. (*)

ED 481 Practicum & Seminar in Education (3-6 VAR)
Supervised practicum and seminar in second teaching or endorsement area. Prerequisite: admission to Education. (F,S,SS) Repeatable

ED 485 Capstone Seminar in Education 1(1-0)
Explores substantive issues facing teacher, including meeting the needs of at-risk students; creating inclusive, equitable learning communities, and methods of effective inquiry in education. Prerequisite: admission to Teacher Education. Corequisite: ED 487, 488 or 489. (F,S)

ED 487 Student Teaching Elementary (6, 12 VAR)
Elementary level. Application must be submitted on or before date in the *Teacher Education Handbook* prior to the semester in which student teaching will commence. Prerequisite: approved application for student teaching. Corequisite: ED 485. (F,S)

ED 488 Student Teaching Secondary (6, 12 VAR)
Secondary level. Application must be submitted on or before date in the *Teacher Education Handbook* prior to the semester in which student teaching will commence Prerequisite: approved application for student teaching. Corequisite: ED 485. (F,S)

ED 489 Student Teaching K-12 (6, 12 VAR)
K-12 level. Application must be submitted on or before date in the *Teacher Education Handbook* prior to the semester in which student teaching will commence. Prerequisite: approved application for student teaching. Corequisite: ED 485. (F,S)

ED 491 Special Topics (1-3 VAR) (*) Repeatable

ED 494 Field Experience (1,3,5,10 VAR)
Field experience in an educational setting. Not applicable to teacher certification. (S/U grading) (*) Repeatable

ED 495 Independent Study (1-3 VAR) (*) Repeatable

GRADUATE COURSES

ED 500 Workshop (.5, 1, 1.5 , 2, 2.5, 3 VAR)
Activity-oriented experiences for teachers. Each has a subtitle; no subtitle may be repeated for credit. Counts for M.Ed. credit with approval of Program Director. Prerequisite: graduate standing. (S/U grading) (*) Repeatable

**ED 501 Professional Development for Tchers
(.5, 1, 1.5, 2, 2.5, 3 VAR)**
Professional development for teachers. Each has a subtitle; no subtitle may be repeated for credit. Counts for M.Ed. credit with approval of Program Director. Prerequisite: graduate standing. (F,S,SS) Repeatable

ED 502 Teacher as Change Agent 3(3-0)
Introduces strategies for professional growth including interpretation of research and professional collaboration. Prerequisite: admission to M.Ed. Program. (F,S)

ED 503 Teacher as Researcher 3(3-0)
Develops skills at conducting and applying action research strategies to improve teaching and learning. Prerequisite: ED 502. (F,S)

ED 504 Leading Change in America's Schools 3(3-0)
Builds teachers' skills in leading school change. Prerequisite: ED 502. (F,S)

ED 505 Education Across Cultures 2(2-0)
Analysis of multiculturalism and how the educational process can be adapted to children of diverse cultural backgrounds. Prerequisite: graduate standing. (*)

ED 506 Behavioral Support 3(3-0)
Prepares teachers to implement individual, classroom-wide and school-wide behavioral supports and interventions. Field experience required. Prerequisite: admission to Graduate Program, Teacher in Residency Program, or admission to Teacher Education. (SS)

ED 507 Levels of Support I 3(3-0)
Prepares teachers to teach students with special needs in inclusive environments, with emphasis on literacy, math, and academic interventions. Requires field experience. Prerequisite: admission to M.Ed. Program, Teacher in Residency Program, or Teacher Education Program. (SS)

ED 508 Levels of Support II 3(3-0)
Addresses effective instruction for secondary students, including transition planning. Requires field experience. Prerequisite: admission to M.Ed. Program, Teacher in Residency Program, or Teacher Education Program. (F)

ED 509 Levels of Support III 3(3-0)
Focuses on instructional programs for K-12 students with severe learning and behavioral challenges. Requires field experience. Prerequisite: admission to Graduate Program, Teacher in Residency Program, or admission to Teacher Education. (S)

ED 510 Collaboration in Education 3(3-0)
Supports skills at co-teaching, teaming, and collaboration with teachers, families, paraprofessionals, and others to strengthen student achievement. Requires field experience. Prerequisite: admission to Graduate Program, Teacher in Residency Program, or admission to Teacher Education. (S)

ED 512 Teaching Diverse Learners 3(3-0)
Focuses on legislation for special education, nature of exceptionalities, and meeting the needs of K-12 students, including second language learners; 30 hours field experiences. Prerequisite: graduate standing. (F,S)

ED 514 Teaching K-6 Math 2(2-0)
Focuses on teaching methods, materials, and assessment strategies in math in the elementary school; 30 hours of field experiences. Prerequisite: MATH 361 and graduate standing (*)

ED 520 Educational Media and Technology 3(3-0)
Prepares teachers to use technology for instruction, assessment, management, and research. Prerequisite: graduate standing. (F,S,SS)

ED 521 Classroom Integration of Internet 2(2-0)
Methods to effectively and legally integrate the Internet into the classroom as a communication and instructional tool. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor approval, graduate standing. (F,S)

ED 522 Issues in Education 2(2-0)
Contemporary problems in education, their historical development and philosophical implications. Prerequisite: graduate standing. (*) Repeatable

ED 523 Teaching and Managing Technology 3(3-0)
Strategies, processes, and procedures for managing technology in K-12, including efficient use of emerging pedagogies. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor approval, graduate standing. (F,S)

ED 524 Advanced Techniques of Teaching Elementary Social Studies 2(2-0)
Analysis of techniques for conceptual approaches to teaching socialization skills, critical thinking and inquiry skills; and helping children develop healthy attitudes and values. Prerequisite: graduate standing. (*)

ED 525 Advanced Techniques of Teaching Elementary Science and Health 2(2-0)
Emphasis on the newest concepts, techniques and materials for teaching elementary school science and health. Prerequisite: graduate standing. (*)

ED 526 School Health Curriculum 2(2-0)
Training (by grade level) in the use of by "Growing Healthy" - the Primary Grades Health Curriculum Project and the School Health Curriculum Project. This is lateral spread training only, by agreement with the Rocky Mountain Regional Training Center. Prerequisite: graduate standing. (*)

ED 527 Productivity Tools for Classroom 1(1-0)
Applications of Microsoft Office as a productivity tool, including integration of use in classroom. Field experience required. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor approval, graduate standing. (F,S)

ED 528 Integration of Educational Software 1(1-0)
Familiarity with and criteria for selecting evaluating, and using quality educational software. Field experience required. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor approval, graduate standing. (F,S)

ED 529 Literacy & Technology 3(3-0)
Methods for using technology to assess and teach literacy. Field experience required. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor approval, graduate standing. (F,S)

ED 530 Instructional Programming 2(2-0)
Principles of curriculum design, educational goals, instructional objectives, and developing long- middle- and short-range plans. For elementary and secondary teachers. Prerequisite: graduate standing. (*)

ED 531 Diverse Learners & Technology 3(3-0)
Strategies for using technology to enhance learning for all students, with emphasis on the relationship between technology and equity. Field experience required. Prerequisite; ED 280/520, admission to Education, completion of a teaching program, or instructor permission, graduate standing. (F,S)

ED 532 Hardware & Networking for Educators 3(3-0)
Pedagogical and practical considerations in using networking and hardware in schools. Prerequisite: ED 280/520, graduate standing. (SS)

ED 533 Instructional Theory & Tech Design 3(3-0)
Instructional system design theories and models and their adaptation to plan and use technology effectively in the classroom. Field experience required. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor permission, graduate standing. (F,S)

ED 534 Multimedia Design 3(3-0)
Methods and tools for creating multimedia learning objects for K-12 classrooms. Field experience required. Prerequisite: ED 280/520, admission to Education, completion of a teaching program, or instructor approval, graduate standing. (SS)

ED 536 Technology & Assessment Tools 3(3-0)
Prepares teachers to use technology in assessment practices in the classroom. Prerequisite: admission to Graduate Program, Teacher in Residency Program, or admission to Teacher Education. (SS)

ED 542 Contemporary Techniques of Classroom Management 2(2-0)
What research and professional practice say about organizing students, space, information, and resources; motivating, goal setting, communicating, and problem solving with student; and handling disruption and behavior problems. (*)

ED 544 Teaching Secondary Science 3(3-0)
Focuses on teaching methods, materials, and assessment strategies necessary to prepare students to teach in secondary standards-based science classrooms. Prerequisite: graduate standing. (F)

ED 545 Assessment & Data Driven Instruction 3(3-0)
Prepares teachers to select, administer, and interpret formal and informal assessments to improve instruction. Requires field experience. Prerequisite: admission to Graduate Program, Teacher in Residency Program, or admission to Teacher Education. (F)

ED 546 Teaching K-12 Art 3(3-0)
Focuses on Art curriculum, methods, and assessment to prepare art educators to successfully teach in K-12 standards-based art classrooms. Prerequisite: graduate standing. (F)

ED 547 Teaching English in Secondary Schools 3(3-0)
Familiarizes students with Colorado Language Arts Standards, standards-based lesson and unit planning and authentic assessment. Prerequisite: graduate standing. (F)

ED 548 Teaching Foreign Language 3(3-0)
Familiarizes students with Colorado Foreign Language Standards, standards-based lesson and unit planning and authentic assessment. Prerequisite: graduate standing. (F)

ED 550 K-12 Music Methods 3(3-0)
Familiarization with the Colorado Music Content Standards. Standards based lesson and unit planning and strategies for general, instrumental, and vocal music will be emphasized. Prerequisite: graduate standing. (F)

ED 551 Teaching Secondary Social Studies 3(3-0)
Familiarizes students with Colorado Social Studies Content Standards, standards-based lesson and unit planning strategies and authentic assessment. Prerequisite: graduate standing. (F)

ED 552 Teaching Secondary Business 3(3-0)
Prepares teachers to teach all areas of the business curriculum in secondary schools. Prerequisite: admission to Teacher in Residency Program or admission to Teacher Education and graduate standing. (*)

ED 555 Foundations of Learning Disorders 3(3-0)
Exceptionalities: emphasis on high-incidence handicaps. Includes recent legislation and identification, referral, staffing and placement procedures. Major intervention strategies examined. Prerequisite: graduate standing. (*)

ED 560 Professional Development in Curriculum and Instruction 4(4-0)
Stresses skill-building in classroom instruction, including curriculum development and student assessment. Current innovations in public education are also addressed. Prerequisite: graduate standing. (*)

ED 570 The Technology Coordinator 3(3-0)
Examination of the roles of the technology coordinator in a K-12 educational setting. ED 532 is strongly recommended as a prerequisite. Prerequisite: graduate standing, ED 280 or 520. (*)

ED 571 Distance Learning 3(3-0)
Provides information needed to be knowledgeable distance educators and instructional developers for K-12 distance learning. Prerequisite: ED 533. (*)

ED 572 Teaching Early Childhood 3(3-0)
Methods for teaching literacy, math, motor and social skills, science, and social studies in early childhood. Prerequisite: admission to Teacher Education or graduate standing and completion of a teaching program. (*)

ED 573 Creative Arts in Early Childhood 3(3-0)
Exploration of principles and methods for teaching music, movement, visual arts and dramatic play in early childhood. Prerequisite: admission to Teacher Education or graduate standing and completion of a teaching program. (*)

ED 574 Early Childhood Space Exploration 3(3-0)
Designed to provide tools necessary to teach space concepts through inquiry-based learning to young children. Prerequisite: completion of a teaching program. (*)

ED 575 Lunar/Mars Exploration 3(3-0)
Participants will investigate how to establish and maintain humans on our moon or Mars and how to integrate these concepts into the classroom. Prerequisite: completion of a teaching program. (*)

ED 576 Rocketry and Exploration 3(3-0)
Participants will examine the technological advances that are being developed for human exploration of the solar system. Prerequisite: completion of a teaching program. (*)

ED 577 Astronomy for the Classroom 3(3-0)
Participants will investigate topics such as motions of the heavens, astronomical research tools, stars, and constellations, 3D exploration of comets, auroras, and planets. Prerequisite: completion of a teaching program. (*)

ED 578 Long Term Space Travel 3(3-0)
Participants will investigate answers to how humans can expand beyond home to maximize the benefits from space exploration. Prerequisite: completion of a teaching program. (*)

ED 579 Earth Systems Science 3(3-0)
Participants will investigate answers to how humans can expand beyond home to maximize the benefits from space exploration. Prerequisite: completion of a teaching program. (*)

ED 580 Integrated Methods 3(3-0)
Prepares elementary teachers to teach Social Studies, with emphasis on integration of the expressive arts and PE. Prerequisite: graduate standing. (*)

ED 581 Practicum & Seminar in Education (1-6 VAR)
Supervised practicum and seminar in second teaching or endorsement area. Prerequisite: admission to Education, graduate standing. (F,S,SS) Repeatable

ED 591 Special Topics (1-3 VAR)
Prerequisite: graduate standing. (*) Repeatable

ED 592 Research (1-3 VAR)
Prerequisite: graduate standing and permission of graduate adviser. (*) Repeatable

ED 593 Seminar (1-6 VAR)
Prerequisite: graduate standing. (*) Repeatable

ED 594 Field Experience (1-3 VAR)
Field experience in an educational setting. Prerequisite: graduate standing. (F,S,SS) Repeatable

ED 595 Independent Study (1-3 VAR)
Prerequisite: graduate standing and permission of graduate adviser. (*) Repeatable

ED 599 Thesis Research (1-6 VAR) (*) Repeatable

ELECTRICAL ENGINEERING (EE)

UNDERGRADUATE COURSES

EE 100 Electrical Engineering Fundamentals 3(3-0)
Electrical engineering fundamentals and problem solving using design and visualization tools. (F)

EE 102 Digital Circuit Logic 4(3-2)
Boolean algebra, Karnaugh maps, multiplexers, decoders, ROMs, PLAs, flip-flops, counters, sequential networks, state tables. Prerequisite: High school physics. (S)

EE 201 Circuit Theory 3(2-2)
Basic circuit analysis techniques and applications to engineering design problems. Corequisite: MATH 224, PHYS 222. (F)

EE 202 Circuit Theory Applications 4(3-3)
Step and Sinusoidal Response of networks; modeling of active devices. Prerequisite: EE 201. (S)

EE 251 Introduction to Microprocessors 4(3-3)
Microprocessor organization assembly language, I/O techniques, real time interfaces, applications, hardware/software. Prerequisite: EE 102. (S)

ENGINEERING (EN)

UNDERGRADUATE COURSES

EN 101 Introduction to Engineering 2(2-0)
Introduction to engineering curriculum and careers. Problem solving and creativity. Spreadsheets, word processing and other computer skills. (F,S)

EN 103 Problem Solving for Engineers 3(2-2)
Writing computer programs to solve real-world problems in engineering and science. Prerequisite: MATH 121. (F,S)

EN 107 Engineering Graphics 2(1-2)
Introduction to the preparation of engineering drawings using freehand sketching and computer graphics software. (F,S)

EN 109 Introduction to Sustainability 2(2-0)
Interdisciplinary foundation for sustainability including systems theory, humans and the environments, and the social and economic dimensions of sustainability. (F)

EN 211 Engineering Mechanics I 3(3-0)
Introduction to the relationship between forces and moments acting on an object that is in equilibrium (statics). Prerequisite: PHYS 221, EN 103. Pre or corequisite: MATH 207. (F)

EN 212 Engineering Mechanics II 3(3-0)
Introduction to the relationship between forces and moments acting on rigid objects and the motion of objects (dynamics). Prerequisite: EN 211. (S)

EN 215 Introduction to Industrial and Systems Engineering 3(3-0)
Engineering viewpoints of the principles of organization for production and the operations applicable to accomplishing organizational responsibilities. (F)

EN 231 Circuit Analysis I 4(4-0)
Circuit concepts, conventions and network equations. Initial conditions and classical methods of obtaining transient and steady-state solutions. Prerequisite: MATH 224. Pre or corequisite: PHYS 222 and MATH 207. Corequisite: EN 231L. (F)

EN 231L Circuit Analysis I Lab 1(0-2)
Observation and analysis of electrical circuits involving resistance, inductance and capacitance. Corequisite: EN 231. (F)

EN 232 Circuit Analysis II 4(4-0)
Continuation of EN 231 including waveform synthesis, network theorems, Fourier series, pole-zero diagrams and two-port network theory. Introduction to Laplace transforms. Prerequisite: EN 231. (*)

EN 260 Basic Electronics 2(2-0)
Characteristics, operation, and basic circuits of solid-state devices. Operational amplifiers with typical applications are also introduced. Prerequisite: EN 231. (S)

EN 263 Electromechanical Devices 3(3-0)
DC and AC motors and generators, transformers, stepper motors, servomotors and various sensors: theory, device characteristics, applications and controls. Prerequisite: EN 103, EN 231. Pre or corequisite: EN 212, EN 260 (S)

EN 275 Stochastic Systems 4(4-0)
Noncalculus probability modeling and statistical analysis of systems containing elements of uncertainty. Prerequisite: MATH 121. (F)

EN 291 Special Topics (1-5 VAR)
Selected topics in engineering. (*) Repeatable

EN 292 Research (1-6 VAR)
Research closely supervised by a faculty member with regular meetings. (*) Repeatable

EN 295 Independent Study (1-5 VAR)
Intensive study directed by a faculty member. (*) Repeatable

EN 296 Cooperative Education Placement (1-5 VAR)
Work experience under direction of a field supervisor and a faculty member. Prerequisite: freshman or sophomore standing. (F,S) Repeatable

EN 298 Internship (1-6 VAR)
Field work in a company or organization, with written reports. (S/U grading) (*) Repeatable

EN 301 Fluid Mechanics 4(4-0)
Introduction to the relationship between the forces applied to a fluid, the motion of the fluid, and the mechanical properties of the fluid. Prerequisite: EN 212. (*)

EN 321 Thermodynamics 3(3-0)
Introduction to energy equations and flows, entropy, kinetic theory and statistical mechanics, second law of thermodynamics, heat engines and heat transfer. Prerequisite: PHYS 221. (F)

EN 324 Materials Science and Engineering 3(3-0)
Fundamentals of chemical structure and atomic bonding, material properties, deformations under force, stress-strain relationships, selection of materials. Prerequisite: EN 211 and high school chemistry. Corequisite: EN 324L. (S)

EN 324L Materials Science and Engineering Lab 1(0-2)
Measurements of material properties and stress-strain relationships. Prerequisite: EN 211. Corequisite: EN 324. (S)

EN 343 Engineering Economy 3(3-0)
Modeling, analysis and decision making involving time value of money, depreciation, income taxes and replacement analysis. Prerequisite: MATH 121. (F)

EN 351 Heat Transfer 3(3-0)
Steady and unsteady conduction of heat. Convection heat transfer in boundary layer and duct flows. Forced and free convection. Thermal radiation. Prerequisite: EN 321 (*)

EN 360 Control Systems I 2(2-0)
Linear analog control systems theory is introduced. Open and closed-loop systems are examined, and performance characteristics are analyzed. Prerequisite: EN 260, MATH 337. Corequisite: EN 360L. (F)

EN 360L Control Systems I Lab 1(0-2)
Corequisite: EN 360. (F)

EN 361 Digital Electronics 3(3-0)
Introduction to digital technology emphasizing practical microprocessors. Number systems and codes, truth tables, Boolean functions, combinational and sequential logic, registers, counters, memory devices, and microprocessors. Prerequisite: EN 260. Corequisite: EN 361L. (F)

EN 361L Digital Electronics Lab 1(0-2)
Corequisite: EN 361. (F)

EN 362 Introduction to Mechatronics 2(2-0)
Elements of a mechatronics system: signal conditioning, sensors, actuators, microcontrollers, and software. Prerequisite: EN 263. Corequisite: EN 362L. (F)

EN 362L Mechatronics Lab 1(0-2)
Corequisite: EN 362. (F)

EN 363 Virtual Machine Design 2(2-0)
Computer aided design of machines including mechanical components: shaft systems, power transmission, and motion generation. Prerequisite: EN 324, EN 362. Corequisite: EN 363L. (S)

EN 363L Virtual Machine Design Lab 1(0-2)
Corequisite: EN 363. (S)

EN 375 Stochastic Systems Engineering 4(4-0)
Probability modeling and statistical analysis of engineering systems containing elements of uncertainty. Prerequisite: MATH 126. (F)

EN 420 Simulation Experiments 4(3-2)
Design and statistical analysis of experiments using discrete event simulation models. Prerequisite: EN 375. (S)

EN 430 Project Planning and Control 3(3-0)
Engineering project management including project selection, organization, planning, and budgeting. Project evaluation, tracking and control, and scheduling and resource allocation, including PERT and CPM. Prerequisite: EN 375. (F)

EN 435 Microprocessor Control Systems 3(2-2)
Components of a microprocessor control system, digital processing, survey of state-of-the-art micro-processor control systems. Prerequisite: EN 360. (*)

EN 439 Time and Motion Studies 2(1-2)
Principles and techniques of methods analysis and work measurement, human performance in human-machine systems. Pre or corequisite: EN 215, EN 375. (F)

EN 440 Safety Engineering 3(3-0)
Occupational safety and health in different industrial environments. Theories of accident causation, governmental regulation, mechanical, electrical and environmental hazards, protective equipment, hazard analysis, safety programs design and administration, systems safety, etc. Prerequisite: EN 343 and 439. (F)

EN 441 Engineering of Manufacturing Processes 3(3-0)
Materials and processes for manufacturing including machining, casting, and forming processes: design, modeling and control. Prerequisite: EN 212. Corequisite: EN 441L. (S)

EN 441L Engineering & Manufacturing Proc Lab 1(0-2)
Corequisite: EN 441. (S)

EN 442 Manufacturing Processes II 3(3-0)
Materials and processes for manufacturing including sheet metal forming, welding, machining and advanced manufacturing processes. Prerequisite: EN 342. (*)

EN 443 Quality Control and Reliability 3(3-0)
Principles and methods of quality control and improvement. Quality management strategy: design and implementation of quality programs in organizations, problem solving techniques, quality improvement tools, etc. Statistical quality control: control charts, process capability evaluation, acceptance sampling procedures, etc. Prerequisite: EN 275 or EN 375. (S)

EN 460 Control Systems II 2(2-0)
Advanced control systems analysis, including microprocessor-based control systems analysis, A/D and D/A converters, Z transforms, and stepper motors. Prerequisite: EN 360, EN 361. Corequisite: EN 460L. (S)

EN 460L Control Systems II Lab 1(0-2)
Corequisite: EN 460. (S)

EN 462 Industrial Robotics 2(2-0)
Basic robotics principles; robot interfacing; robot controls and programming. Laboratory exercises use various robots to meet specific industrial tasks. Prerequisite: EN 460, EN 473. Corequisite: EN 462L. (S)

EN 462L Industrial Robotics Lab 1(0-2)
Corequisite: EN 462. (S)

EN 471 Operations Research 3(3-0)
Techniques for analysis and solution of problems in industrial and management systems. Linear programming, duality theory, sensitivity analysis, and network analysis techniques. Prerequisite: MATH 207, 224. (F)

EN 473 Computer Integrated Manufacturing 2(2-0)
Engineering design, modeling and applications in production: automation, flowlines, robotics, numerical control, and computer usage in manufacturing. Prerequisite: EN 103, 231, 231L, 441 and MATH 207. Corequisite: EN 473L. (F)

EN 473L Computer Integrated Mfg Lab 1(0-2)
Corequisite: EN 473. (F)

EN 475 Facility Planning and Design 3(3-0)
Application of industrial and systems engineering techniques to problems related to an organization's physical resources. Facilities planning and plant layout, material handling, site selection and facilities location. Prerequisite: EN 439. Pre or corequisite: EN 471. (F)

EN 477 Operations Planning and Control 3(3-0)
Techniques for analysis and management of manufacturing operations and production with emphasis on inventory systems and forecasting. Prerequisite: EN 471. (S)

EN 486 Senior Seminar 2(2-0)
Steps in the engineering design process including creativity, technical analysis, and presentations. Prepare for senior project. Prerequisite: permission of instructor. (S/U grading) (F,S)

EN 487 Engineering Design 3(3-0)
Application of engineering principles to a design project. Prerequisite: EN 486. (S)

EN 488 Industrial Engineering Design 3(3-0)
Application of engineering principles to a design project. Prerequisite: EN 486. (S)

EN 489 Senior Capstone in Sustainability 1(1-0)
Application of knowledge gained in the sustainability minor to a project in sustainability. Prerequisite: EN 109, CHEM 125. (S)

EN 491 Special Topics (1-5 VAR)
Prerequisite: junior standing. (*) Repeatable

EN 492 Research (1-6 VAR)
Faculty directed research project. Prerequisite: junior or senior standing. (*) Repeatable

EN 495 Independent Study (1-5 VAR)
Prerequisite: junior standing. (*) Repeatable

EN 496 Cooperative Education Placement (1-5 VAR)
Work experience under the direction of a field supervisor and a faculty member. Prerequisite: junior or senior standing. (F,S) Repeatable

EN 498 Internship (1-6 VAR)
Field work in a company or organization, with written reports. Prerequisite: junior or senior standing. (S/U grading) (*) Repeatable

GRADUATE COURSES

EN 503 Ergonomics 3(3-0)
Theory and practice of human performance measurement and human factors engineering. Study of human sensory, perceptual mental, psychomotor, and other characteristics applied to the design of human-machine systems for performance effectiveness, productivity and safety. Prerequisite: EN 540 with a grade of C or better. (S)

EN 504 Scheduling and Sequencing 3(3-0)
Theory of deterministic scheduling and sequencing with stochastic extensions. An introduction to the complexity of computations in systems varying from single machine to job shop. Prerequisite: EN 571 with a grade of C or better. (S)

EN 507 Virtual Reality 3(3-0)
Principles, practical aspects, and applications of virtual reality systems and components such as 3D interfaces, displays (3D, visual, haptic, auditory), position tracking, and virtual environments. (F)

EN 511 Structural Engineering 3(3-0)
Design and analysis of wood, steel and concrete structures in railroad application. (F)

EN 513 Artificial Intelligence 3(3-0)
Topics in artificial intelligence including predicate calculus, search strategies, and machine learning with applications. (F)

EN 520 Simulation Experiments 4(3-2)
Design and statistical analysis of experiments using discrete event simulation models. Prerequisite: EN 375. (S)

EN 530 Project Planning and Control 3(3-0)
Engineering project management including project selection, organization, planning, and budgeting. Project evaluation, tracking and control, and scheduling and resource allocation, including PERT and CPM. (F)

EN 531 Railroad Power Systems 3(3-0)
Comprehensive analysis and design of electric power systems for railroads including power supplies, AC/DC and linear motors, third rails, catenaries, and substations/distribution systems. (S)

EN 539 Time and Motion Studies 2(1-2)
Principles and techniques of methods analysis and work measurement, human performance in human-machine systems. Introduction to research in selected topics. Corequisite: EN 375. (F)

EN 540 Safety Engineering 3(3-0)
Occupational safety and health. Theories of accident causation, governmental regulation, protective equipment, hazard analysis, safety programs design and administration. Introduction to research in selected topics. Prerequisite: EN 375. (F)

EN 541 Engineering of Manufacturing Processes 3(3-0)
Materials and processes for manufacturing including machining, casting, and forming processes: design, modeling and control. Introduction to research in selected topics. Prerequisite: permission of instructor. Corequisite: EN 541L. (S)

EN 541L Engineering & Manufacturing Proc Lab 1(0-2)
Corequisite: EN 541. (S)

EN 543 Quality Control and Reliability 3(3-0)
Design and implementation of quality programs, quality improvement tools, control charts, process capability evaluation, acceptance sampling procedures. Introduction to research in selected topics. Prerequisite: EN 275 or EN 375. (S)

EN 544 Advanced Engineering Economics 3(3-0)
Advanced topics in engineering economy featuring income tax consideration, treatment of inflation, risk and uncertainty models, cost-effectiveness concepts, and project comparison methods. Prerequisite: EN 343, or permission of instructor. (S)

EN 551 Fleet Management 3(3-0)
Fleet management business and economics, risk analysis, information systems, vehicle planning and control, productivity, safety, and environmental compliance. Prerequisite: EN 530. Pre or corequisite: EN 577. (A grade of C or better required for prerequisites.) (F)

EN 552 Vehicle Dynamics 3(3-0)
Fundamental dynamic considerations in designing ground vehicles and vehicle control systems. Rail systems as an example of modeling dynamic systems at various levels of abstraction. (F)

EN 556 (MATH 556) Design and Analysis of Experiments 3(3-0)
Foundations of experimental design, outline efficient methods to implement experiments, develop statistical methods to sort signal from noise, and analyze information derived from the experiment. Prerequisite: MATH 256 and 356. (SS)

EN 560 Control Systems II 2(2-0)
Advanced control systems analysis, including microprocessor-based control systems analysis, A/D and D/A convertors, Z transforms, and stepper motors. Introduction to research in selected topics. Prerequisite: EN 360, 361. (S)

EN 560L Control Systems II Lab 1(0-2)
Corequisite: EN 560. (S)

EN 561 Advanced Controls 3(3-0)
State-space based analysis/design of linear control systems are introduced in both continuous- and discrete-time domains. Nonlinear systems and the linearization method are covered. Prerequisite: EN 360. (F)

EN 562 Industrial Robotics 2(2-0)
Basic robotics principles; robot interfacing; robot controls and programming. Laboratory exercises use various robots to meet specific industrial tasks. Introduction to research in selected topics. Prerequisite: permission of instructor. Corequisite: EN 562L. (S)

EN 562L Industrial Robotics Lab 1(0-2)
Corequisite: EN 562. (S)

EN 563 Intelligent Robotics 3(3-0)
Theoretical and practical aspects of advanced robotic topics such as trajectory generation, path planning and control, decision logic, advanced sensors, autonomous mobile robots, and humanoids. Prerequisite: graduate standing. (S)

EN 565 Stochastic Systems Engineering 3(3-0)
Analysis and design of systems containing elements of uncertainty in demand and performance capability. Time varying measures and approximations are emphasized. Additional work required of graduate students. Prerequisite: MATH 256 and 356. (*)

EN 571 Operations Research 3(3-0)
Techniques for analysis and solution of problems in industrial and management systems. Linear programming, duality theory, sensitivity analysis, and network analysis techniques. Prerequisite: MATH 224 and graduate standing. (F)

EN 573 Computer Integrated Manufacturing 2(2-0)
Engineering design, modeling and applications for production automation, flowlines, robotics, numerical control, and computer usage in manufacturing. Introduction to research in selected topics. Prerequisite: EN 541 with a grade of C or better. Corequisite: EN 573L. (F)

EN 573L Computer Integrated Mfg Lab 1(0-2)
Corequisite: EN 573. (F)

EN 575 Facility Planning and Design 3(3-0)
Application of industrial and systems engineering techniques to problems related to an organization's physical resources. Facilities planning, plant layout, material handling, site selection and location. Corequisite: EN 571. (F)

EN 577 Operations Planning and Control 3(3-0)
Techniques for analysis and management of manufacturing operations and production with emphasis on inventory systems and forecasting. Prerequisite: EN 571 with a grade of C or better or permission of instructor. (S)

EN 588 Graduate Projects 3(3-0)
Application of graduate industrial engineering principles to a capstone design project. Prerequisite: EN 520, 571, 575, & 577 with grades of C or better. (*) Repeatable

EN 590 Special Projects (1-3 VAR)
Individual project selected, outlined and pursued by student. May be repeated. Prerequisite: graduate standing and advisor approval. (*) Repeatable

EN 591 Special Topics (1-3 VAR)
Selected topics in industrial and systems engineering. Heuristic design, reliability, industrial ergonomics, multi-criteria decision analysis, analytical facility location and site selection models. Not every topic offered each year. May be repeated. Prerequisite: Permission of instructor. (S) Repeatable

EN 593 Graduate Seminar 2(2-0)
Seminar for students entering the systems engineering program. Philosophical, methodological and ethical issues in systems engineering are discussed. Prerequisite: Permission of instructor. (S/U grading) (F)

EN 595 Independent Study (1-5 VAR)
Prerequisite: graduate standing. (*) Repeatable

EN 598 Internship (1-6 VAR)
Field work in a company or organization, with written reports. (S/U grading) (*) Repeatable

EN 599 Thesis Research (1-9 VAR)
Preparation of thesis to meet degree requirements. Arranged with major adviser. May be repeated. Prerequisite: graduate standing and adviser approval. (S/U grading) (F,S) Repeatable (6)

ENGLISH (ENG)

UNDERGRADUATE COURSES

ENG 099 Foundational Practices in Writing 3(3-0)
Reading and writing assignments introducing argumentation, analysis, and synthesis. Practice in essay writing stressing thesis construction, organization, and development. Does not count toward graduation. (S/U grading) (F,S)

ENG 100 English as a Second Language (3-12 VAR)
Intensive practice in English Language skills with an emphasis on writing for non-native speakers of English. (*) Repeatable (12)

ENG 101 Composition I 3(3-0)
Emphasis on critical thinking, reading, and writing clear and coherent essays that reflect an understanding of the writing process, rhetorical analysis, argumentation, and academic discourse. Prerequisite: English 099, or ACT verbal score of at least 18, or SAT verbal score of at least 440, or an Accuplacer test score of at least 95. (F,S,SS) (Gen Ed: E, GT-CO1)

ENG 102 Composition II 3(3-0)
Sequential course providing continued engagement with critical thinking, reading, argumentation, and using rhetorical techniques in academic writing. Emphasis on research strategies. Prerequisite: ENG 101. (F,S,SS) (Gen Ed: E, GT-CO2)

ENG 106 (ANTHR 106) Language, Thought and Culture 3(3-0)
Cross-cultural introduction to language processes in human society. (*) (Gen Ed: SS) (CC)

ENG 111 Intro to American Academic Discourse 3(3-0)
Practical introduction to American academic discourse and culture for international students, stressing oral and written discussion skills. (*)

ENG 114 Introduction to Creative Writing 3(3-0)
An introduction to poetry, fiction, and creative non-fiction writing, stressing honest and clear writing and heightened critical thinking skills within a workshop setting. (F,S) (Gen Ed: H, GT-AH1) (CC)

ENG 130 Introduction to Literature 3(3-0)
Introduction to the three major literary genres: fiction, poetry, and drama. The main emphasis is on close reading and textual analysis. (*) (Gen Ed: H, GT-AH2)

ENG 161 Careers for English Majors 1(1-0)
Identifies career options and presents employment opportunities for English majors. (*)

ENG 201 Introduction to Literary Study 3(3-0)
Introduction to literary genres, major periods and writers, close reading and textual analysis, modern literary criticism, and research methods. Prerequisite: ENG 102. (*)

ENG 204 (COMR 204) Introduction to Rhetoric 3(3-0)
Provides an introduction to the rhetorical tradition in relationship to the needs of various cultural, technological, and professional contexts. (*)

ENG 210 American Literature I 3(3-0)
Literature and literary history of America to 1865. Prerequisite: ENG 102. (*)

ENG 212 American Literature II 3(3-0)
Literature and literary history of America from 1865 to the present. Prerequisite: ENG 102. (*)

ENG 220 (CS 220) Survey of Chicano Literature 3(3-0)
Survey of outstanding contemporary Chicano works. Literature deals with Chicano themes, including analysis of folklore and myth. (*) (Gen Ed: H, GT-AH2) (CC)

ENG 221 Masterpieces of Literature I 3(3-0)
Significant writings in world literature from the ancients through the Renaissance and their backgrounds. Prerequisite: ENG 102. (*) (Gen Ed: H, GT-AH2)

ENG 222 Masterpieces of Literature II 3(3-0)
Significant writings in world literature from the seventeenth century to the present and their backgrounds. Prerequisite: ENG 102. (*) (Gen Ed: H, GT-AH2)

ENG 231 Literature of England I 3(3-0)
Literature and literary history of England from the Anglo-Saxon Period through the 18th Century. Prerequisite: ENG 102. (*)

ENG 232 Literature of England II 3(3-0)
Literature and literary history of England in the Romantic, Victorian and Modern Periods. Prerequisite: ENG 102. (*)

ENG 240 Survey of Ethnic Literature 3(3-0)
This course provides an introduction to the literature of four major ethnic groups in the U.S.: Native American, African American, Chicano, and Asian American. Prerequisite: ENG 102. (*) (Gen Ed: H, GT-AH2) (CC)

ENG 241 (WS 241) Women in Literature 3(3-0)
Intensive study of literature written by women, in historical, cultural, and critical contexts. Prerequisite: ENG 102. (*)

ENG 251 Traditional Grammar Theory 3(3-0)
Primarily for non-majors who wish to improve their understanding of how language works, for teacher education majors, and for English majors who want additional background for advanced language courses. Prerequisite: ENG 102. (*)

ENG 291 Special Topics (1-3 VAR) (*) Repeatable

ENG 302 Grant Writing 3(3-0)
Examines the strategies involved in professional grant writing. Students will produce and submit grant proposals in response to actual request for proposals. Prerequisite: ENG 101 and ENG 102. (*)

ENG 303   Advanced Composition 3(3-0)
Advanced persuasive writing, including rhetoric and grammar. Prerequisite: ENG 102. (*)

ENG 304 Advanced Rhetorical Study 3(3-0)
Acquaints students with a range of classical and contemporary theories for writing persuasive prose. Research and critical analysis are supplemented by readings of contemporary essays. Prerequisite: ENG 204. (*)

ENG 305 Technical and Scientific Report Writing 3(3-0)
Emphasis on discrete professional formats and styles in writing manuals, proposals, government contracts and reports. For upperclassmen in technical and professional fields. Prerequisite: ENG 102. (*)

ENG 306 Visual Rhetoric 3(3-0)
Rhetorical analysis through visual modes of communication; creation and manipulation of visual messages for a variety of audiences, purposes, situations. Prerequisite: ENG 204. (*)

ENG 307 Poetry 3(3-0)
Poetry as a genre; prosody and techniques of fixed-form and free verse; poetic traditions from ancient to contemporary; poetic theory and criticism. Prerequisite: ENG 201. (*)

ENG 308 Fiction 3(3-0)
Prose fiction as a genre, including the modern short story and representative novels from 1700 to the present. Prerequisite: ENG 201. (*)

ENG 309 Drama 3(3-0)
Drama as a literary genre; representative works from the ancient, medieval, Renaissance, modern, and contemporary traditions; historical, theatrical, and critical contexts. Prerequisite: ENG 201. (*)

ENG 309L Drama on Screen 1(0-1)
Provides students the opportunity to see filmed performances of plays studied in ENG 309, spanning 2,500 years of dramatic history. Corequisite: ENG 309 recommended. (*)

ENG 310 Advanced Literary Forms & Genres 3(3-0)
Analyzes published writers, creative writing, and craft through writing based on the study and theory of a specified genre or form. Prerequisite: ENG 201. (*) Repeatable

ENG 315 Creative Writing: Poetry 3(3-0)
Introduction to writing poetry. A studio workshop for students to grow in their appreciation of poetic processes. Prerequisite: ENG 114. (*)

ENG 316 Creative Writing: Fiction 3(3-0)
Introduction to creating character, situation, and overall structure, emphasis on imaginative and real-life portrayal. Prerequisite: ENG 114. (*)

ENG 317 Creative Nonfiction 3(3-0)
Introduction to writing the reflective essay. Prerequisite: ENG 114. (*)

ENG 318 Creative Writing: Drama 3(3-0)
Introduction to playwriting. Composition of a one-act play and development of creative and critical thinking through the study of major playwrights. Prerequisite: ENG 114. (*)

ENG 319 Professional Editing 3(3-0)
Acquaints students with current practices in editing/publishing. Students will learn to make texts readable and conform to conventions of editing in a variety of disciplines. Prerequisite: ENG 102. (*)

ENG 320 Literature of Enlight/Revolution 3(3-0)
Literature of Enlightenment and Revolution traces through political, philosophical and literary tracts the cultivation of democratic ideals and the emergence of modern democracies. Prerequisite: ENG 201. (*)

ENG 321 American Romanticism 3(3-0)
A study of the major figures in the development of American Romanticism. Prerequisite: ENG 201. (*)

ENG 322 American Literary Realism, 1870-1910 3(3-0)
A study of the development of Realism and Naturalism in American literature during the late 19th century and the early 20th century. Prerequisite: ENG 201. (*)

ENG 323 Modern American Literature 3(3-0)
A study of major writers' themes, and developments in American literature from the 1910s to the 1960s. Prerequisite: ENG 201. (*)

ENG 324 American Cinema/American Culture 3(3-0)
From early twentieth century to date, a survey of profoundly influential, selected American films, their aesthetic, cultural and technological impacts. (*)

ENG 325 Nature Writing in the West 3(3-0)
Studies in writings about the western landscape and environment by American nature writers; intensive practice in nature writing. Prerequisite: ENG 102. (*)

ENG 326 Writing for the WEB 3(3-0)
Writing for the World Wide Web and intranets, including rhetorical approaches, elements of design, and organizing informative sites for education, government, business, and the arts. Prerequisite: ENG 102. (*)

ENG 328 Contemporary American Lit 3(3-0)
Advanced study of a focused topic in contemporary American literature (genre, theme, or set of related texts), in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*)

ENG 331 Development of the Novel 3(3-0)
Emphasis on social problems and European influences, focus on trends coming to full development in the 20th century. Includes recent works. Prerequisite: ENG 201. (*)

ENG 335 (COMR, WS 335) Gender and Communication 3(3-0)
This course examines the ways that gender affects communication behaviors and helps develop an awareness of the processes that affect gender socialization and stereotyping. Prerequisite: ENG 102. (*)

ENG 345 Intercultural Communication 3(3-0)
Creates cultural awareness and critical-thinking through the study of literary, political, and cultural voices within the United States. Provides foundation for multicultural studies across disciplines. Prerequisite: ENG 101, ENG 102. (*)

ENG 352 English Syntax and Usage 3(3-0)
English usage and language systems, emphasis on forms and functions of language analysis. (*)

ENG 353 Language in the USA 3(3-0)
Explores language use in the U.S. and examines current language-related myths and issues in the U.S., including issues related to indigenous languages and immigrant languages. Prerequisite: ENG 102. (*)

ENG 354 Women Writers of Science Fiction 3(3-0)
Classic and contemporary science fiction written by women. (*)

ENG 355 Women Writers of Detective Fiction 3(3-0)
Survey detective fiction by women from Agatha Christie to the present. (*)

ENG 370 Rediscovering the Fairy Tale 3(3-0)
The Fairy Tale: Its history, psychological basis, relationship to mythology, and transformations in poetry, film, music, and visual art. (*)

ENG 371 Medieval English Literature 3(3-0)
Advanced study of a focused topic in medieval literature, (genre, theme, or set of related texts), in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*)

ENG 372 Early Modern English Literature 3(3-0)
Advanced study of a focused topic in early modern English literature, (genre, theme, or set of related texts), in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*)

ENG 373 Restoration & 18th-C. English Lit 3(3-0)
Advanced study of a focused topic in Restoration and 18th-century English literature, (genre, theme, set of related texts), in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*)

ENG 374 Romantic & Victorian English Lit 3(3-0)
Advanced study of a focused topic in Romantic and/or Victorian English literature (genre, theme, or set of related texts), in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*)

ENG 375 Modern & Contemporary English Lit 3(3-0)
Advanced study of a focused topic in modern and/or contemporary English literature (genre, theme, or set of related texts), in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*)

ENG 381 Shakespeare 3(3-0)
Representative works in various genres, with attention to cultural and critical contexts. Prerequisite: ENG 201. (*)

ENG 381L Shakespeare on Screen 1(0-2)
Viewing and study of Shakespeare's plays in video and film versions. (*)

ENG 384 Studies in Major Writers 3(3-0)
Intensive study of a major writer or writers in historical, cultural, and critical contexts. Prerequisite: ENG 201. (*) Repeatable

ENG 385 Literacy Criticism and Theory 3(3-0)
Traditional and contemporary critical theories of literature and their applications. Prerequisite: ENG 201. (*)

ENG 391 Special Topics (1-3 VAR)
Prerequisite: ENG 102 or permission of instructor. (*) Repeatable

ENG 404 Writing in the Professions 3(3-0)
Advances course in writing that emphasizes the analysis and creation of documents used in diverse professional settings. Prerequisite: ENG 102. (*)

ENG 412 Young Adult Literature 3(3-0)
Literature suitable for adolescents, including classical and contemporary authors, and issues in selection and evaluation. Prerequisite: ENG 102. (*)

ENG 414 Advanced Writing Workshop 3(3-0)
Development of students' best writings in workshop format in preparation for graduate school and/or publication. A genre-specific focus is required upon enrollment. Prerequisite: ENG 114 and ENG 315, 316, 317, or 318. (*)

ENG 424 Novels into Film 1740-Present 3(2-2)
Comparative study of great novels, 1740-present, and film versions of those novels. (*)

ENG 440 (MCCNM 440) Magazine Writing 3(3-0)
Instruction and practice in writing nonfiction magazine articles with emphasis on story research and market selection. Prerequisite: ENG 102. (*)

ENG 441 Chaucer and His Age 3(3-0)
Chaucer and his contemporaries in their cultural and historical setting. Prerequisite: ENG 201 or ENG 102 and HIST 102. (*)

ENG 445 Magazine Editing and Production 3(3-0)
Writing, editing, and design for printing and Web publication of a general-circulation regional magazine. Prerequisite: ENG 440 or MCCNM 304 or 311 or 440 or permission of the instructor. (*)

ENG 452 History of the English Language 3(3-0)
English language from Anglo-Saxon period to present; emphasis on history linguistic and structural changes. ENG 352 recommended. Prerequisite: ENG 102. (*)

ENG 461 Careers for English Majors 1(1-0)
Identifies and explores graduate school and employment opportunities. (*)

ENG 491 Special Topics (1-3 VAR) (*) Repeatable

ENG 493 Senior Seminar 3(3-0)
In-depth analysis of specific topics, themes, authors, and works in American, English or world literature. Prerequisite: ENG 385. (*)

ENG 494 Field Experience (1-5 VAR)
A semester-long internship. Student performs professional duties using English-related skills required by the cooperating agencies. (*) Repeatable

ENG 495 Independent Study (1-3 VAR)
Directed, intensive study and guidance in studying major literary figures or movements, arranged with the chair of the department. (*) Repeatable

GRADUATE COURSES

ENG 500 Workshop (1-3 VAR)
Individually subtitled professional development workshops, designed for teachers, focused on writing, reading, and pedagogical development. Prerequisite: graduate standing. (*)

ENG 501 Theories of Writing 3(3-0)
Provides an introduction to and survey of modern writing theory. The course prepares students to apply theoretical principles to the practical concerns of writing pedagogy. Corequisite: ENG 502. (F)

ENG 502 Research Methods 3(3-0)
Introduces students to diverse opportunities for research methodology and academic discourse in English studies. Corequisite: ENG 501. (F)

ENG 503 Literary Theory 3(3-0)
An introduction to contemporary literary and critical theory in English studies. Prerequisite: ENG 501, ENG 502. (S)

ENG 511 Major Authors 3(3-0)
Intensive study of the works of one or two major authors. Prerequisite: ENG 501, ENG 502. (*) Repeatable

ENG 512 Literature Survey 3(3-0)
Synthesis of literary attitudes, modes, genres of an age. Prerequisite: ENG 501, ENG 502. (*) Repeatable

ENG 521 Language, Literacy, & Learning 3(3-0)
Language, Literacy, and Learning begins with exploration of the nature of literacy in U.S. society, drawing upon historical and current studies and theories of literacy. Prerequisite: ENG 501, ENG 502. (*)

ENG 522 Phonology & Morphology for ESL/EFL 3(3-0)
Introduction to English phonology, morphology, and morpho-syntax relevant to ESL/EFL teaching. Prerequisite: ENG 501, ENG 502. (*)

ENG 523 Syntax for TESL/TEFL 3(3-0)
Introduction to English syntactic structures relevant to ESL/EFL teaching. Includes an examination of core English structures from various perspectives. Prerequisite: ENG 501, ENG 502. (*)

ENG 524 Teaching ESL/EFL 3(3-0)
Introduction to the teaching of English to non-native speakers. No specific types of students are emphasized; includes teaching of adults and children in various settings. Prerequisite: ENG 501, ENG 502. (*)

ENG 525 Computers & Composition 3(3-0)
Exploration of the impact of computers and computer networks on writing and the teaching of writing. Prerequisite: ENG 501, ENG 502. (*)

ENG 527 Graduate Writing Workshop 3(3-0)
Group discussion of original student work, emphasizing plot, characterization, style, structure, and theory. Prerequisite: ENG 501, ENG 502. (*) Repeatable

ENG 528 Non-Fiction Workshop 3(3-0)
Development of students' best writings in workshop format in preparation for publication. Prerequisite: ENG 501, ENG 502. (*) Repeatable

ENG 553 Language in the USA 3(3-0)
Explores language use in the U.S. and examines current language-related myths and issues in the U.S., including issues related to indigenous languages and immigrant languages. Prerequisite: ENG 102. (*)

ENG 560 Language Acquisition & Linguistics 3(3-0)
Development of English language from childhood through adulthood, including phonology, grammar, vocabulary, and communicative competence. Acquisition of English as a second language. (S)

ENG 578 Workshop in the Teaching of Writing 3(3-0)
Theories of composition, methods, sources and resources for teachers of writing. Prerequisite: graduate standing. (*)

ENG 591 Special Topics 3(3-0)
Varied topics covering cultural or historical areas, or literacy and discourse theory and practice, or professional pedagogical issues. Prerequisite: ENG 501, ENG 502. (*) Repeatable

ENG 594 Field Experience 3(3-0)
Designed to prepare students for, and support them through their first semester as a teaching assistant at CSU-Pueblo. Prerequisite: ENG 501, ENG 502, and approval of instructor. (*) Repeatable

ENG 595 Independent Study (1-5 VAR)
Students will work with a professor in the department in order to create a rigorous course schedule on a topic of their choosing. Prerequisite: ENG 501, ENG 502, and approval of instructor. (*) Repeatable

ENG 598 Internship (1-5 VAR)
Students who have sought and received an internship in the field of English studies will work with their advisor in order to set expectations. Prerequisite: ENG 501, ENG 502, and approval of instructor. (S/U Grading) (*) Repeatable

ENG 599 Thesis (3-0)
Prerequisite: ENG 501, ENG 502, and approval of instructor. (S/U grading) (*) Repeatable (6)

ENGLISH AS A SECOND LANGUAGE (ESL)

ESL 065 Beginning Reading/Writing 0(10-0)
Learn reading skills/strategies to understand beginning texts. Respond to questions through discussion and writing. Read short outside texts. Write sentences and paragraphs with correct spelling. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 066 Beginning Listening/Speaking 0(10-0)
Develop academic skills in listening and speaking. Engage in speaking using comprehensible pronunciation. Understand simplified spoken English and respond appropriately both orally and in writing. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 075 Intermediate Reading/Writing 0(10-0)
Develop critical thinking skills. Improve reading speed and comprehension. Learn skills necessary for academic writing: development of paragraphs and compositions using description, narrative, and chronology. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 076 Intermediate Listening/Speaking 0(10-0)
Understand spoken English in common settings. Practice speaking appropriately in academic and social situations. Use multimedia to develop communicative competence. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 085 High-Intermediate Reading/Writing 0(10-0)
Read authentic and ESL materials with increasing critical ability and speed. Write more intelligibly and decrease grammatical errors. Understand several types of essay organization. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 086 Hi-Intermediate Listening/Speaking 0(10-0)
Understand spoken English at near normal speed. Improve fluency. Interact more confidently with other students in presentations. Use multimedia to increase communicative competence. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 091 Special Topics 0(3-0)
Selected topics in ESL. (S/U grading) (*) Repeatable

ESL 095 Advanced Reading/Writing 0(10-0)
Read authentic materials with near-native critical ability and speed. Write intelligibly with few grammatical and idiomatic errors. Understand thoroughly essay organization and development. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

ESL 096 Advanced Listening/Speaking 0(10-0)
Understand English at natural speed in social, academic, and professional situations. Speak confidently through interaction with native speakers and presentations. Multimedia experience enhances communicative competence. Prerequisite: acceptance to ELI. (S/U grading) (F,S,SS)

EXERCISE SCIENCE AND HEALTH PROMOTION (EXHP)

UNDERGRADUATE COURSES

EXHP 101 Introduction to EXHPR 2(2-0)
Introduction to fundamentals of exercise science, health promotion and recreation professions. Overview of health promotion, fitness, athletic training, recreation and school-based programs, and career opportunities. (F,S)

EXHP 103L Triathlon 1(0-2)
This course is designed to prepare individuals to successfully complete a sprint distance (500 meter swim, 20K bicycle and 5K run or the equivalent) triathlon. (*)

EXHP 104L Personal Fitness 1(0-2)
Students will learn how to evaluate their personal fitness level and develop a comprehensive exercise program beneficial to their overall health and wellness. (*)

EXHP 105L Snow Sports 1(0-2)
Beginning fundamental snowboarding and skiing. Students choose level 1-3 skiing and/or boarding lesson at Colorado ski resort. Emphasis on safety, equipment, clothing and trip planning. (S)

EXHP 106L Martial Arts and Self-Defense 1(0-2)
Overview of the history, philosophy and techniques of martial arts and self-defense. Includes skill development of physical techniques. (O)

EXHP 108L Yoga 1(0-2)
This course will focus on key concepts in basic yoga resulting in development of valuable life skills related to creating healthy lifestyles. (*)

EXHP 109L Volleyball 1(0-2)
An introduction to the fundamental skills, rules and strategies used in power volleyball. (*)

EXHP 110L Weight Training 1(0-2)
An introduction to basic strength evaluation, fundamental machine and free weight techniques and safety concepts in the weight room. (F,S)

EXHP 111 Commitment to Academic Excellence 1(1-0)
Supports the academic progress of the Student-Athlete toward intellectual development and adjustment to college life academically, athletically and socially. Various resources will be presented. (F,S)

EXHP 118L Jogging 1(0-2)
An introduction to walking/jogging/running techniques, training programs, fitness assessment, appropriate footwear and safety considerations. (*)

EXHP 119L Walking for Fitness 1(0-2)
The introduction and development of skills, safety, understanding of body functions and basic conditioning related to aerobic fitness through walking. (*)

EXHP 120L Aerobics 1(0-2)
Introduction and participation in the techniques used in rhythmic aerobic dance. Students are able to select from a variety of formats including but not limited to floor aerobics, step aerobics and aqua-aerobics. (*)

EXHP 121L Aerobics Instructor Training 1(0-2)
Study in leading a safe and effective aerobic exercise activity including working with diverse groups. Students receive background to sit for a national certification exam. (*)

EXHP 122L Military Physical Training 1(0-2)
Introduction to physical fitness and training. Students participate in practical training and learn the basics of fitness, nutrition and flexibility. (F,S)

EXHP 123L Zumba 1(0-2)
ZUMBA® is a non-competitive fitness dance program which teaches students to perform steps such as the salsa, meringue, cha-cha, samba, tango, reggaeton, and calypso. (F,S)

EXHP 124L Tai Chi 1(0-2)
Complete form of Tai Chi postures based on Yang/Sun Style will be practiced. Mandarin terminology, health philosophy and Taijiquan will be defined and discussed. (*)

EXHP 143L Folk, Square, and Ballroom Dance 1(0-2)
Overview of the music and dance techniques used in Folk, Square and Ballroom dancing. (*)

EXHP 146L Beginning Swimming 1(0-2)
Introduces the knowledge and skill necessary to handle the body with ease in the water and covers basic mechanical, physiological, and psychological concepts. (*)

EXHP 162 Personal Health 3(3-0)
The development of knowledge and the scientific basis for the analysis, evaluation and promotion of personal health and wellness. (F,S,SS) (Gen Ed: ST)

EXHP 162L Personal Health Lab 1(0-2)
Optional experiential lab studies to augment EXHP 162. (F,S,SS) (Gen Ed: ST)

EXHP 174L Tennis 1(0-2)
An introduction to the fundamental skills, rules and strategies used in the game of tennis. (*)

EXHP 175L Racquetball 1(0-2)
An introduction to the fundamental skills, rules and strategies used in the game of racquetball. (*)

EXHP 176L Life Guard Training 2(1-2)
American Red Cross Lifeguard certification course that prepares successful candidates to be certified in Lifeguarding, First Aid, and CPR. A swimming pre-test must be passed the first day of class. (*)

EXHP 187L Intercollegiate Sports I 2(0-4)
Participation in an intercollegiate sports program. Course registration is limited to freshman competing in a varsity sport program offered by CSU-Pueblo. (F,S)

EXHP 201 Drugs and Healthy Lifestyles 3(3-0)
An overview of the impact of drug abuse in today's society along with prevention information and treatment programs available. (F)

EXHP 205L Snow Sports II 1(0-2)
For students with experience in snow sports including skiing and/or snowboarding. Emphasis on safety and techniques of telemark skiing, cross-country skiing, and snowshoeing. Prerequisite: ski/snowboard experience. (S)

EXHP 208L Yoga II 1(0-2)
For students with prior experience in yoga. Emphasis on creating balance in both strength and flexibility through the performance of a variety of postures. Prerequisite: EXHP 108L with a grade of C or better or instructor permission. (F,S)

EXHP 211 Commitment to Service 1(1-0)
Life skills for Sophomore Student-Athletes to enhance their experience by engaging the student in service to his or her campus and surrounding communities. (F,S)

EXHP 222 Behavior Facilitation 3(3-0)
Study the influence of social and behavioral systems on health. Emphasis on the fundamentals of self-directed behavior change, health dysfunctions, and stress management. (F,S)

EXHP 233 History and Principles of Physical Education and Recreation 2(2-0)
Study of the history, philosophy and perspectives of physical education and recreation, and their influence upon contemporary American society. (F)

EXHP 243 Methods of Rhythmic Activities 2(2-0)
Fundamentals of folk, square and social dance; emphasis on the teaching techniques involved in basic dance styles and rhythms. (S)

EXHP 245 Motor Learning and Development 3(3-0)
Applied analysis of motor learning and motor development principles and theories throughout the human life span. (S)

EXHP 246L Methods of Swimming 1(.5-1.5)
Instruction in methods of teaching techniques, stroke analysis, class organization, pool safety, and pool maintenance. Practice teaching assignments with practical and written final exams. (F)

EXHP 276L Water Safety Instructor Certification 2(1-2)
Water safety instruction certification may be earned in this course. Prerequisite: EXHP 176L or instructor permission. (A prerequisite grade of C or better is required) (*)

EXHP 287L Intercollegiate Sports II 2(0-4)
Participation in an intercollegiate sports program. Course registration is limited to sophomore student-athletes competing in a varsity sport program offered at CSU-Pueblo. (F,S)

EXHP 288 Health Promotion Practicum 3(1-4)
Overview of the fundamentals, skills, and professional opportunities in health promotion through the utilization of academic researching, application, theory, and experiential methods. (F)

EXHP 291 Special Topics (1-5 VAR) (F,S) Repeatable

EXHP 301 Dartfish Training 1(1-0)
In-depth instruction on the Dartfish software including developing video books, movement analysis, tagging, the use of hardware, and using Dartfish in coaching. (F,S)

EXHP 310L Adv Methods Strength & Conditioning 1(0-2)
Lecture and training integrating science and application of strength and conditioning methods. Emphasis on learning to perform and teach advanced strength, power, and flexibility techniques. Prerequisite: EXHP 110L with grade of C or better or instructor permission. (S)

EXHP 320 NSCA Test Preparation 2(2-0)
This course is designed to prepare students to take the National Strength and conditioning Association Certified Personal Trainer or Strength and Conditioning Specialist certification exams. Prerequisite: EXHP 344/344L and BIOL 223/223L. (S)

EXHP 336 Community Health 3(2-2)
Introduction to aspects of community and public health, functions of health services at all levels, and exploration of current health problems. (F)

EXHP 343 Research and Statistics 3(3-0)
Introduction to the use of measurement and research. Emphasis on reviewing and interpreting professional literature, interpreting basic statistics and understanding the concepts underlying successful evaluation. Prerequisite: MATH 121 with grade of C or better or permission of instructor. (F,S,SS)

EXHP 344 Exercise Physiology 3(3-0)
Physiologic control of the human body during acute exercise, and adaptations to regular exercise stress. Emphasis on relationships among health, fitness, and exercise. Prerequisite: MATH 121 (with grade of C or better), BIOL 223, 223L, and EXHP 343. (F,S)

EXHP 344L Exercise Physiology Lab 1(0-2)
Extension of course lecture which provides practical experience in laboratory experiments which address exercise and exercise theory. Corequisite: EXHP 344. Prerequisite: MATH 121 (with grade of C or better), BIOL 223, 223L, and EXHP 343. (F,S)

EXHP 345 Methods of Physical Activities & Games I 2(2-0)
Teaching procedures, skills and techniques of physical activities and games (e.g. adventure education, soccer, basketball, team handball and lacrosse). (F)

EXHP 346 Methods Physical Activities & Games II 2(2-0)
Teaching procedures, skills and techniques of physical activities (e.g. volleyball, football, hockey, track/field and softball). (S)

EXHP 347 Methods of Fitness Instruction 1(1-0)
Emphasis on teaching procedures for lifetime fitness activity (e.g. weight training, aerobics, plyometrics, exercise balls, jump rope, HR monitors, cardio kickboxing, and pedometers). Prerequisite: EXHPR PE K-12 emphasis or instructor permission. (F,S)

EXHP 348 Methods of Individual and Dual Sports 3(3-0)
Basic skills and techniques of tennis, racquetball, badminton and golf; emphasis on teaching procedures in these activities. (F)

EXHP 351 Methods of Teaching Elem Physical ED 3(3-0)
Study of effective teaching for elementary children including; maximizing student learning, student and self-assessment, utilization of resources, planning, implementation and revision. 30 hours field experience. Prerequisite: acceptance into Teacher Education Program. Pre or corequisite: EXHP 478. (F)

EXHP 362 Evaluation of Current Health Issues 2(2-0)
Evaluation of current health topics such as human sexuality, violence, environmental and psychoneuroimmunology and their impact on the health of the individual and community. (S)

EXHP 364 Kinesiology 3(3-0)
Integration of fundamentals of anatomical and structural components of human movement with the study of fundamental body movements and the primary muscles involved in those movements. Prerequisite: BIOL 223, 223L. (F,S)

EXHP 382 Lifestyle Disease Risk Reduction 3(3-0)
Overview of principles of epidemiology and lifestyle-disease pathophysiology; examination of use of epidemiologic research to identify risk factors for disease. (S)

EXHP 400 Workshop (1-5 VAR)
Learning experience in physical education offered in large blocks of time not corresponding to the weekly meeting times of the regular course offerings. Prerequisite: approval of program chair. (*) Repeatable

EXHP 432 Applied Sport & Exercise Psychology 3(3-0)
The course is designed to acquaint the student with the direct application of psychological theories and techniques for the enhancement of both sport and exercise. Prerequisite: EXHP 343. PSYCH 205 is strongly recommended. (S)

EXHP 436 Exercise Assessment 3(3-0)
Methods used to assess exercise clients and prescribe effective exercise programs in order to achieve optimal health. Referral for at risk clients will be discussed. Prerequisite: EXHP 344, 344L. (F,S)

EXHP 440 Biomechanics 3(3-0)
Course reviews application of basic physics and anatomy for analysis of complex human movement focusing on improving movement efficiency and reducing the potential for injury. Prerequisite: MATH 121, EXHP 364 (both with grades of C or better), and BIOL 223/223L. (*)

EXHP 461 Managing Programs in EXHPR 3(3-0)
Organizational and administrative functions used in a modern management approach to programs in Physical Education, Health Promotion, Athletics, Fitness, and Recreation. Corequisite: Senior standing. (S)

EXHP 464 Adapted Physical Education 3(3-0)
Programs for diverse populations in physical education; emphasis on environments, diseases and injuries which cause individuals to require special attention. Prerequisite: non teacher education minors only, BIOL 223, 223L. (S,O)

EXHP 465 Adapted Physical Education 3(3-0)
Programs for diverse populations in physical education; emphasis on environments, diseases and injuries which cause individuals to require special attention. Prerequisite: admission to Teacher Education Program, BIOL 223, 223L. (S,O)

EXHP 469 Coaching/Officiating Track & Field 2(2-0)
Techniques and strategies of coaching and officiating track and field (*)

EXHP 470 Methods of Coaching 3(3-0)
Study of the science and art of coaching. Understanding of the physical, mental, and emotional demands of coaching. Required course for coaching certification in Colorado. (F)

EXHP 471 Coaching and Officiating Football 2(2-0)
Techniques and strategy of coaching and officiating football. (*)

EXHP 472 Coaching and Officiating Basketball 2(2-0)
Techniques and strategy of coaching and officiating basketball. (*)

EXHP 475 Coaching and Officiating Volleyball 2(2-0)
Techniques and strategy of coaching and officiating volleyball. (*)

EXHP 478 Methods of Teaching Secondary Physical Education 3(2-2)
Study of effective teaching with emphasis on teaching methods, student learning time, classroom management and program planning. 30 hours field experience. Prerequisite: admission to Teacher Education Program. Pre or corequisite: EXHP 351. (F)

EXHP 482 Coaching and Officiating Wrestling 2(2-0)
Techniques and strategy of coaching and officiating wrestling. (*)

EXHP 483 Coaching and Officiating Baseball 2(2-0)
Techniques and strategy of coaching and officiating baseball. (*)

EXHP 484 Coaching and Officiating Soccer 2(2-0)
Techniques and strategies of coaching and officiating soccer. (*)

EXHP 485 Methods in Health Promotion 3(2-2)
Planning, implementation, and evaluation of educational strategies and components of health promotion. Focus on educational methodology and student learning. (F)

EXHP 487 Health Promotion Program Planning/Evaluation 4(3-2)
Focus on planning, implementing, and evaluating work site health promotion programs. Prerequisite: EXHP 485 with a grade of C or better. (S)

EXHP 491 Special Topics (1-5 VAR)
Permission of instructor. (*) Repeatable

EXHP 492 Research (1-6 VAR)
Research project conducted in collaboration with a faculty member. Prerequisite: approval of a faculty member. (F,S,SS) Repeatable (6)

EXHP 494 Field Experience (1-6 VAR)
Learning experience to be conducted in the professional work environment and supervised by faculty. (S/U grading) Prerequisite: approval of the field experience coordinator. (*) Repeatable (9)

EXHP 495 Independent Study (1-5 VAR)
Prerequisite: approval of the department chair. (*) Repeatable

EXHP 498 Internship 12(0-36)
450 hours of supervised experience with approved professionals in select health promotion settings including the completion of a major application project and other various assignments. Prerequisite: senior standing, completion of all other degree requirements, 2.50 GPA in the major and internship coordinator approval. (*)

GRADUATE COURSES

EXHP 500 Workshop (1-5 VAR)
Graduate learning experience in physical education offered in large blocks of time not corresponding to the weekly meeting times of the regular course offerings. Prerequisite: approval of program chair. (*)

EXHP 501 Advanced Dartfish Training 1(1-0)
Advanced instruction on the Dartfish software including developing video books, movement analysis, tagging, the use of hardware, and using Dartfish in coaching. (F,S)

EXHP 522 Methods of Elementary Physical Education 3(3-0)
Advanced study of effective teaching for elementary children including; maximizing student learning, student and self-assessment, utilization of resources, planning, implementation and revision. Prerequisite: graduate standing or permission from instructor. (*)

EXHP 529 Curriculum in Physical Education 2(2-0)
The advanced study of physical education curriculum models, planning, and evaluation. Prerequisite: graduate standing or permission from instructor. (SS)

EXHP 532 Applied Sport & Exercise Psychology 3(3-0)
The course will explore advanced application of psychological theories and techniques for the enhancement of both sport and exercise. (*)

EXHP 536 Community Health 3(2-2)
Advanced study of the aspects of community and public health, functions of health services, and application of community health theory. Prerequisite: graduate status. (F)

EXHP 549 Facilitation of Adventure Education 3(3-0)
Planning and implementing adventure activities that provide challenge, choice, and opportunities for personal and group growth. Emphasis on program development, facilitation techniques. Prerequisite: graduate status or permission from instructor. (SS*)

EXHP 562 Contemporary Issues in HPE 3(3-0)
Advanced study of current health topics affecting schools including human sexuality, violence, modification of disease risks, and drug use/abuse. Emphasis on teaching decision making. Prerequisite: graduate standing or permission from instructor. (*)

EXHP 565 Adapted Physical Education 3(3-0)
Advanced study of programs for diverse populations in physical education; emphasis on environments, diseases and injuries which cause individuals to require special attention. Prerequisite: graduate standing or permission of instructor. (S,O)

EXHP 570 Methods of Coaching 3(3-0)
Advanced study of the science of coaching. Understanding of the physical, mental, and emotional demands of coaching. Required course for coaching certification in Colorado. Prerequisite: Graduate status. (F)

EXHP 578 Methods of Secondary School PE 3(3-0)
Advanced study of effective teaching in secondary schools with emphasis on teaching methods, student learning, classroom management and program planning. Prerequisite: graduate standing or permission of instructor. (F)

EXHP 585 Methods in Health Promotion 3(2-2)
Advanced planning and implementation skills for a variety of educational methods, strategies and components of health promotion. Focus on educational methods and student learning. Prerequisite: graduate standing or permission of instructor. (F)

EXHP 591 Special Topics (1-5 VAR)
Graduate level study or activity designed to increase understanding in areas not covered by regular offerings of the department. Prerequisite: approval of program chair. (*)

EXHP 592 Research (1-6 VAR)
Graduate level research project conducted in collaboration with a faculty member. Prerequisite: approval of a faculty member. (F,S,SS) Repeatable (6)

EXHP 594 Field Experience (1-6 VAR)
Graduate level field experience project completed in coordination with a faculty member. Prerequisite: faculty permission. (F,S,SS) Repeatable (6)

EXHP 595 Independent Study (1-6 VAR)
Graduate level independent study completed in coordination with a faculty member. Prerequisite: faculty permission. (F,S,SS) Repeatable

FINANCE (FIN)

UNDERGRADUATE COURSES

FIN 330 Principles of Finance 3(3-0)
Principles of finance involved in problems confronting business organizations. Prerequisite: ACCTG 201, ECON 201, ECON 202, BUSAD 265 or MATH 156. (F,S)

FIN 331 Managerial Finance: Policy, Planning and Control 3(3-0)
Financial management, planning, policy formulation and financial decision making. Prerequisite: FIN 330. (*)

FIN 333 Investment Analysis 3(3-0)
Analysis and forecasting of security markets, industry and company studies, portfolio selection and management. Prerequisite FIN 330. (*)

FIN 335 Real Estate Finance 3(3-0)
Principles of real estate financing with emphasis on residential markets, economics, governmental and location factors, financing, and real estate transactions. Prerequisite: FIN 330. (*)

FIN 430 Financial Institutions and Markets 3(3-0)
The role of financial institutions, instruments and markets; structure of interest rates; the Federal Reserve and monetary policy; and the structure, regulation, portfolio and risk management of financial institutions. Prerequisite: FIN 330. (*)

FIN 431 Financial Policy Analysis 3(3-0)
Analysis of financial policies in various organizations. Emphasis on managerial problems in long-range planning, decision making under uncertainty, risk measurement and applications of capital markets. Prerequisite: FIN 330. (*)

FIN 475 International Finance 3(3-0)
Illustrate theories and the current issues of international finance. Topics include the determination of exchange rates, intervention and international monetary systems. Prerequisite: FIN 330. (*)

FIN 490 Special Projects (1-6 VAR) (*) Repeatable (6)

FIN 491 Special Topics (1-3 VAR)
Prerequisite: FIN 330. (*) Repeatable

FIN 495 Independent Study (1-3 VAR)
Prerequisite: FIN 330 and permission of the department chair. (*) Repeatable (6)

FIN 498 Internship (1-6 VAR)
Supervised field work in selected business, social and governmental organizations; supplemented by written reports. Prerequisite: junior or senior standing in School of Business and permission of internship coordinator. (S/U grading) (*) Repeatable (6)

GRADUATE COURSES

FIN 501 Fundamentals of Finance 1.5(1.5-0)
This class prepares students in basic concepts of managerial finance, including goals, financial analysis, cash flows, time value, risk/return, stocks/bonds, and investment decisions. Prerequisite: admission to MBA. (*)

FIN 505 Principles of Finance 3(3-0)
Principles of finance involved in problems confronting business organizations. Prerequisite: ACCTG 505 or equivalent, ECON 505 or equivalent. (*)

FIN 530 Financial Management 3(3-0)
Theory and application of investment, financing and dividend decisions to maximize stockholder wealth. Use of analytical cases to solve financial problems facing business firms. Prerequisite: admission to MBA or permission of MBA Director. (*)

FIN 575 International Financial Management 3(3-0)
Financial theory and practice as applied to the financial management of multinational corporations. Prerequisite: FIN 530 and admission to MBA or permission of MBA Director. (*)

FIN 591 Special Topics 3(3-0)
Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

FIN 595 Independent Study (1-3 VAR)
Individual study of a subject determined by the instructor and student with permission of the director. Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

FOREIGN LANGUAGE (FL)

UNDERGRADUATE COURSES

FL 100 Introduction to Comparative Linguistics 3(3-0)
Basic concepts in linguistics; comparison of languages. (*) (Gen Ed: H) (CC)

FL 101 Introduction to a Critical Foreign Language I 3(3-0)
Study of a foreign language not offered regularly. Different languages are offered when enrollment permits. (*) Repeatable

FL 102 Introduction to a Critical Foreign Language II 3(3-0)
Prerequisite: FL 101, or permission of instructor. (*) Repeatable

FL 110 Foreign Language for Travel 1(1-0)
Fundamental vocabulary for basic tourist communication. (*)

FL 291 Special Topics (1-3 VAR) (F,S) Repeatable

FL 294 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: permission of instructor. (*) Repeatable

FL 394 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: permission of instructor. (*) Repeatable

FL 494 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: permission of instructor. (*) Repeatable

FL 495 Independent Study (1-3 VAR)
Specific themes which address particular problems of literature or civilization. May be repeated for credit with approval of major adviser. Prerequisite: two years of college study of the language used for project. (*) Repeatable

GRADUATE COURSES

FL 591 Special Topics (1-3 VAR)
Prerequisite: graduate standing and permission of instructor. (*) Repeatable

FL 594 Field Experience (1-9 VAR)
Service learning, internships, communication, lectures by writers, artists, political leaders and specialists. Visits to museums, attendance at movies, theaters and excursions. Prerequisite: graduate standing and permission of instructor. (*) Repeatable (9)

FL 595 Independent Study (1-3 VAR)
Prerequisite: graduate standing and permission of instructor. (*) Repeatable (9)

FRENCH (FRN)

UNDERGRADUATE COURSES

FRN 101 Beginning French I 3(3-0)
Development of skills in speaking, listening, reading, writing, and cultural understanding. (F,S) (Gen Ed: H) (CC)

FRN 102 Beginning French II 3(3-0)
Continuation of the development of skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: FRN 101 or equivalent. (F,S) (Gen Ed: H) (CC)

FRN 201 Intermediate French I 3(3-0)
Development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: FRN 102 or equivalent. (F) (Gen Ed: H, GT-AH4) (CC)

FRN 202 Intermediate French II 3(3-0)
Continued development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: FRN 201 or equivalent. (S) (Gen Ed: H, GT-AH4) (CC)

FRN 287 Intensive French Study Abroad (1-9 VAR)
Study of French in an immersion setting abroad, preparing the student for fluency through the study of grammar, civilization and culture, at an approved institution. Prerequisite: FRN 102 and permission of instructor. (*) Repeatable (9)

FRN 294 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: FRN 201 and permission of instructor. (*) Repeatable (7)

FRN 301 Advanced French Grammar 3(3-0)
A concentrated study of French grammar in addition to practice in writing, reading, speaking, and listening. Prerequisite: FRN 202 or equivalent. (*)

FRN 303 French Phonetics and Diction 3(2-2)
French pronunciation: theory, correction and practice of diction and intonation. Phonetic transcription and practical exercises. Prerequisite: FRN 202, or permission of instructor. (*)

FRN 312 Conv & Comp: Europe 3(3-0)
Focus on improving linguistic proficiency within the context of French-speaking countries and regions in Europe. (Culture, History, Literature, Art, Gastronomy, Current Events, etc.). Prerequisite: FRN 202. (*)

FRN 313 Conv & Comp: Africa & Caribbean 3(3-0)
Focus on improving linguistic proficiency within the context of Francophone cultures in Africa and the Caribbean. (Culture, History, Literature, Art, Gastronomy, Current Events, etc.). Prerequisite: FRN 202. (*)

FRN 314 Conv & Comp: North America 3(3-0)
Focus on improving linguistic proficiency within the context of Francophone cultures in the U.S. and Canada. (Culture, History, Literature, Art, Gastronomy, Current Events, etc.). Prerequisite: FRN 202. (*)

FRN 341 French through Literature 3(3-0)
Focus on improving linguistic proficiency (reading, writing, listening and speaking) through the study of literary works from France and the Francophone World. Prerequisite: FRN 202, or permission of instructor. (*)

FRN 351 French through Film 3(3-0)
Focus on improving linguistic proficiency (reading, writing, listening and speaking) through the study of cinema of the French and Francophone World. Prerequisite: FRN 202. (*)

FRN 381 French Civ: France 3(3-0)
Focus on improving linguistic proficiency through the study of French history. Students will engage with literary, historic and filmic texts. Prerequisite: FRN 202 or permission of instructor. (*)

FRN 382 French Civ: Francophone World 3(3-0)
Focus on improving linguistic proficiency through study of history and contemporary events affecting the francophone world. Students will engage with literary, historic and filmic texts. Prerequisite: FRN 202 or permission of instructor. (*)

FRN 387 Intensive French Study Abroad (1-12 VAR)
Study of French in an immersion setting abroad preparing the student to become fluent in the language through the study of grammar, civilization and culture. Prerequisite: permission of instruction; FRN 201. (*) Repeatable

FRN 391 Special Topics 3(3-0)
Prerequisite: FRN 202. (*) Repeatable (9)

FRN 394 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: FRN 202 and permission of instructor. (*) Repeatable (7)

FRN 494 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: two years college French. (*) Repeatable

FRN 495 Independent Study (1-3 VAR)
Specific themes which address particular problems of literature or civilization. May be repeated for credit with approval of major adviser. (*) Repeatable

GEOGRAPHY (GEOG)

UNDERGRADUATE COURSES

GEOG 101 Physical Geography 3(3-0)
Three Earth spheres: the hydrosphere (oceanography, hydrologic cycle); the atmosphere (meteorology and climatology) and the lithosphere (geology, internal/external processes) are emphasized and examined. (F,S,SS)

GEOG 102 Cultural Geography 3(3-0)
Emphasis on cultural regions, cultural diffusion, and cultural landscape. Major themes are culture, population, agriculture, language and religion, ethnicity, urbanization, industry, and political geography. (F/S/SS)

GEOG 103 World Regional Geography 3(3-0)
The interconnectivity and interrelationship of the world regions by stressing physical, economic development, agricultural, cultural and population characteristics. Strengthening of one's mental world map. (F,S) (Gen Ed: SS, GT-SS2) (CC)

GEOG 491 Special Topics 3(3-0)
Devoted to special topics in Geography (human, physical, and regional). Prerequisite: Jr. or Sr. standing with adequate preparation and permission of instructor. (F,S,SS) Repeatable

GEOLOGY (GEOL)

UNDERGRADUATE COURSES

GEOL 101 Earth Science 3(3-0)
Four earth spheres: the hydrosphere (oceanography, hydrologic cycle); the atmosphere (meteorology and climatology); the lithosphere (geology; internal and external processes); and space are emphasized. Co-requisite: GEOL 101L. (F,S) (Gen Ed: ST, GT-SC1)

GEOL 101L Earth Science Lab 1(0-2)
Lab to accompany GEOL 101 lecture. Corequisite: GEOL 101. (F,S) (Gen Ed: ST, GT-SC1)

GEOL 114 Oceanography 3(3-0)
Study of world oceans and their role in the Earth system, including chemical, physical, geological, meteorological and biological aspects of the sea. Corequisite: GEOL 114L. (S) (Gen Ed: ST, GT-SC1)

GEOL 114L Oceanography Lab 1(0-2)
Lab to accompany GEOL 114 lecture. Corequisite: GEOL 114. (S) (Gen Ed: ST, GT-SC1)

GERMAN (GER)

UNDERGRADUATE COURSES

GER 101 Beginning German I 3(3-0)
Development of skills in speaking, listening, reading, writing, and cultural understanding. (F,S) (Gen Ed: H) (CC)

GER 102 Beginning German II 3(3-0)
Continuation of the development of skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: GER 101 or equivalent. (F,S) (Gen Ed: H) (CC)

GER 201 Intermediate German I 3(3-0)
Development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: GER 102 or equivalent. (F) (Gen Ed: H, GT-AH4) (CC)

GER 202 Intermediate German II 3(3-0)
Continued development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: GER 201 or equivalent. (S) (Gen Ed: H, GT-AH4) (CC)

GER 301 Advanced German Grammar 3(3-0)
A concentrated study of German grammar in addition to practice in writing, reading, speaking, and listening. Prerequisite: GER 202 or equivalent. (*)

GER 303 Conv and Comp: German 3(3-0)
Focus on improving linguistic proficiency within the context of German culture. Prerequisite: GER 202 or equivalent. (*)

GER 381 German Civilization I 3(3-0)
German geography, culture and history from the beginning to the present. Prerequisite: GER 202 or permission of instructor. (*)

GER 382 German Civilization II 3(3-0)
Prerequisite: GER 202 or permission of instructor. (*)

HISTORY (HIST)

UNDERGRADUATE COURSES

HIST 101 World Civilization to 1100 3(3-0)
Cultural and political growth of civilizations from prehistoric times to 1100; emphasis on the unique contributions of independent cultures to world history. (F,S) (Gen Ed: HS, GT-HI1) (CC)

HIST 102 World Civilization From 1100 to 1800 3(3-0)
Cultural and political interaction of civilizations from 1100 to 1800; emphasis on common problems and goals of mankind. (F,S) (Gen Ed: HS, GT-HI1) (CC)

HIST 103 World Civilization Since 1800 3(3-0)
Cultural and political interaction of civilization since 1800; emphasis on conflict and resolution. (F,S) (Gen Ed: HS, GT-HI1) (CC)

HIST 136 (CS 136) The Southwest United States 3(3-0)
This course traces the culture and historical development of the southwestern United States, including cultural contributions of the American Indian and Hispanic peoples. (F,S) (Gen Ed: HS, GT-HI1) (CC)

HIST 201 U.S. History I 3(3-0)
United States history from founding of North American colonies to 1877 Reconstruction era. (F,S) (Gen Ed: HS, GT-HI1)

HIST 202 U.S. History II 3(3-0)
United States from 1877 Reconstruction era to contemporary era. (F,S) (Gen Ed: HS, GT-HI1)

HIST 291 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*)

HIST 295 Independent Study (1-3 VAR)
An individualized program of study designed by ranked, full-time History professor for a promising student. Prerequisite: Permission of Instructor. (*)

HIST 300 Historiography 3(3-0)
Enhances student knowledge of historical profession through developing historical research skills. (F,S)

HIST 301 America to 1787 3(3-0)
History of America during the colonial and Revolutionary eras. (*)

HIST 302 America, 1787-1877 3(3-0)
History of the United States during the early national and Civil War eras. (*)

HIST 303 America, 1877-1945 3(3-0)
History of United States from the Gilded Age to 1945. (*)

HIST 304 America, 1945-Present 3(3-0)
History of the United States from 1945 to the present. (*)

HIST 311 History of United States Foreign Policy 3(3-0)
United States foreign policy from the founding of the republic to the present. (*)

HIST 312 Colorado History 3(3-0)
History, government and economic factors important to the settlement and development of Colorado. (S)

HIST 330 Ancient Greece 3(3-0)
History of Greece from the Bronze Age to the Fourth Century B.C.E., emphasizing political, social, intellectual and cultural developments. (*)

HIST 333 Roman Republic 3(3-0)
History of the Roman Republic emphasizing the origin and expansion of Rome and its effect on political, social, intellectual and cultural developments. (*)

HIST 334 Roman Empire 3(3-0)
History of the Roman Empire emphasizing political, social, economic and cultural developments. (*)

HIST 346 (CS 346) History of Mexico 3(3-0)
This course surveys the major political, economic, social and cultural developments of Mexico from pre-Columbian times to the present. (*)

HIST 362 History of Russia 3(3-0)
Cultural and political development of Russian and Soviet history from 800 to the present; emphasis on impact of the Bolshevik Revolution on history. (*)

HIST 372 History of Modern China 3(3-0)
Cultural and political developments in modern China; emphasis on the interplay between Chinese tradition and western challenges. (*)

HIST 395 Independent Study (1-3 VAR)
An individualized program of study designed by a ranked full-time Historian for a promising student who has demonstrated ability in a regular History class. Prerequisite: Previous work in History and permission of Instructor. (*)

HIST 411 American Labor History 3(3-0)
History of Labor in the United States. Examines history of American workers, the unions they organized and considers the changing nature of work. (*)

HIST 413 American West 3(3-0)
Role of the individual and the group in the development of the frontier into the 20th century. (*)

HIST 414 The American Civil War 3(3-0)
Social, cultural, and political developments that caused the sectional crisis, secession, and war. War coverage includes military strategy, politics, diplomacy, and emancipation. (*)

HIST 428 (SOC, WS 428) Women & Work 3(3-0)
Examines historical and contemporary issues for women of various economic, social, and ethnic groups, especially in the US; examines gender ideologies about paid, unpaid work. Prerequisite: junior or senior standing or permission of instructor. (*)

HIST 445 Topics in the History of Empires 3(3-0)
Comparative study of empires with in-depth analysis of specific topics and themes. Variable content. (*) Repeatable (9)

HIST 456 Medieval Europe 3(3-0)
Changes and continuities, important events, movements, and social and cultural changes of the medieval period of European history. (S,O)

HIST 457 Early Modern Europe 3(3-0)
Important events, movements, and social changes of the early modern period of European history, including the Renaissance, Reformation, Absolutism, the Scientific Revolution, and the Enlightenment. (F,O)

HIST 458 Modern Europe 3(3-0)
Important changes and continuities in recent European history, including the effects of the Industrial Revolution, Victorian culture and society, science and technology, rivalries, and fascism. (S,E)

HIST 468 Military History 3(3-0)
Introduction to military history from 1700 to the present. Covers changes in policy, structural organization, planning, strategies, technology, and social impact. (*)

HIST 489 (CS 489) Borderlands 3(3-0)
History of the Mexican cession to the United States from its Indian and Hispanic origins to the present. (S,O)

HIST 491 Special Topics (1-3 VAR)   (*) Repeatable

HIST 493 Seminar 3(3-0)
Seminar devoted to special topics and issues in history; emphasis on research paper. Prerequisite: HIST 300. (S)

HIST 495 Independent Study (1-3 VAR)
An individualized program of study designed by a ranked full-time Historian for a History major or minor. Prerequisite: History major or minor and permission of instructor. (*)

HIST 498 Internship (3-6 VAR)
For advanced students. Practical experience through internship with museums, libraries with historical collections, and other community organizations. Recommended: history major or minor with junior or senior standing. Prerequisite: departmental permission. (*) Repeatable (6)

GRADUATE COURSES

HIST 501 Early America to 1763 3(3-0)
An examination of native peoples, Africans, and Europeans in the new world, C. 1499-1763. (*)

HIST 502 New American Nation, 1763-1830 3(3-0)
An examination of the American Revolution, writing of the Constitution, and political and economic development of the new republic. (*)

HIST 503 Civil War America, 1830-1877 3(3-0)
Examines sectionalism, slavery, Mexican American War, Civil War, and Reconstruction. (*)

HIST 504 U.S. History, 1877-1945 3(3-0)
Examines populism, labor strife, progressivism, race relations, Red Scare, WWI, Depression & WWII. (*)

HIST 505 U.S. History, 1945-Present 3(3-0)
Examines the social, political and economic trends in American history since the end of WWII. (*)

HIST 511 Colorado History 3(3-0)
Examines the political, social, and economic factors important to the settlement and development of Colorado. (*)

HIST 513 American West 3(3-0)
Explores the settlement of the West, environmental history of the West, and development of the frontier in the 20th century. (*)

HIST 514 U.S. Southwest, Pre-1848 3(3-0)
Examines the cultural and historical development of the southwestern United States, focusing on the contributions of American Indian and Hispanic peoples in the colonial era. (*)

HIST 515 U.S. Southwest, Post-1848 3(3-0)
Examines the historical development of the southwestern United States, focusing on the contributions of American Indian and Hispanic peoples from 1848 to the present. (*)

HIST 520 Slavery and Abolitionism 3(3-0)
Examines the Atlantic Slave trade, plantation culture, and antislavery efforts in American history. (*)

HIST 521 U.S. History through Literature 3(3-0)
Examines classic texts in American history from a wide variety of periods (*)

HIST 588 Historiography and Theory 3(3-0)
This course enhances students understanding of history by examining the strengths and limitations of historical argumentation. Prerequisite: graduate standing or instructor's permission. (*)

HIST 589 Directed Study for Prelim Exams 3(3-0)
Directed study course with student's Masters advisor in anticipation of taking MA exam that semester. Prerequisite: graduate standing and instructor's permission. (IP or S/U grading) (*) Repeatable

HIST 591 Special Topics (1-3 VAR) (*)

HIST 593 Seminar 3(3-0)
Directed independent study of a historical topic resulting in a significant research paper. Prerequisite: HIST 501 and instructor's permission. (*) Repeatable

HIST 595 Independent Study (1-3 VAR)
An individualized program of study designed by a ranked Historian and approved by the Graduate Director. Prerequisite: permission of Graduate Director. (*) Repeatable (6)

HIST 598 Internship (3-6 VAR)
Practical experience through internship with museums, archives or related organizations. Prerequisite: HIST 502, 503, or 504 and permission of Graduate Director. (*) Repeatable

HIST 599 Thesis Research 3(3-0)
Directed study course with student's Masters advisor in anticipation of completing a Master's Thesis that semester. Prerequisite: graduate standing and instructor's permission. (IP or S/U grading) (*) Repeatable

HONORS (HONOR)

A grade of B or better is required for prerequisite courses.

UNDERGRADUATE COURSES

HONOR 101 Foundations of Knowledge 1(1-0)
"The Role of the University and the History of Ideas." Students learn how diverse disciplines approach problems of data collection and epistemology. Prerequisite: director's permission. Corequisite: HONOR 101L. (F)

HONOR 101L Foundations of Knowledge Lab 1(0-1)
Lab sections capped at 25 students are small group recitations of the lecture material from 101 each week. Corequisite: HONOR 101. (F)

HONOR 201 Art and Science of Human Experience 2(2-0)
Students are challenged to examine academic and professional approaches to evaluating human experience from the perspectives of art, humanities, social, behavioral, natural and applied sciences. Prerequisite: HONOR 101. (F,S)

HONOR 210 Honors Life Science and Technology 3(3-0)
A thematic, interdisciplinary, small-group seminar dealing with the aesthetic, cultural, historical, sociological and scientific aspects of life science and technology. (*)

HONOR 220 Honors Health Issues 3(3-0)
A thematic, interdisciplinary small-group seminar dealing with the aesthetic, cultural, historical, sociological, scientific and technological aspects of health issues. (*)

HONOR 230 Honors International & Economic Issues 3(3-0)
A thematic, interdisciplinary, small-group seminar dealing with aesthetic, cultural, historical, sociological, scientific and technological aspects of international and economic issues. Prerequisite: three hours previous honors work. (*)

HONOR 240 Honors Physical Science 3(3-0)
A thematic, interdisciplinary, small-group seminar dealing with the aesthetic, cultural, historical, sociological, scientific and technological aspects of physical science. (*)

HONOR 250 Honors Literary Themes 3(3-0)
A thematic, interdisciplinary, small-group seminar dealing with the aesthetic, cultural, historical, sociological and scientific aspects of literary themes. (*)

HONOR 291 Special Topics (1-3 VAR)
(*) Repeatable (12)

HONOR 310 Honors Group Project (1-3 VAR)
A cooperative learning experience project culminating in a presentation or similar product. Prerequisite: three hours of previous honors work. (*) Repeatable

HONOR 380 Honors Service-Learning (1-2 VAR)
Students will work with a community-based organization to "learn by doing" in an area relevant to their major to enhance learning and build civic responsibility. Prerequisite: HONOR 201. (*) Repeatable (2)

HONOR 481 Senior Honors Thesis (1-3 VAR)
University Honors Program students enroll in this course to receive capstone credit. Senior seminar classes, capstone projects or other appropriate work is arranged by departments. Prerequisite: HONOR 310 and 380. (*) Repeatable (3)

HONOR 491 Special Topics (1-3 VAR)
(*) Repeatable (12)

ITALIAN (ITL)

UNDERGRADUATE COURSES

ITL 101 Beginning Italian I 3(3-0)
Development of skills in speaking, listening, reading, writing, and cultural understanding. (F,S) (Gen Ed: H) (CC)

ITL 102 Beginning Italian II 3(3-0)
Continuation of the development of skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: ITL 101 or equivalent. (F,S) (Gen Ed: H) (CC)

ITL 201 Intermediate Italian I 3(3-0)
Development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: ITL 102 or equivalent. (F) (Gen Ed: H, GT-AH4) (CC)

ITL 202 Intermediate Italian II 3(3-0)
Continued development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: ITL 201 or equivalent. (S) (Gen Ed: H, GT-AH4) (CC)

ITL 287 Intensive Italian Study Abroad (1-9 VAR)
Study of Italian in an immersion setting abroad, preparing the student for fluency through the study of grammar, civilization and culture, at an approved institution. Prerequisite: ITL 102 and permission of instructor. (*) Repeatable (9)

ITL 294 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: ITL 201 and permission of instructor. (*) Repeatable (7)

ITL 301 Advanced Italian Grammar 3(3-0)
A concentrated study of Italian grammar in addition to practice in writing, reading, speaking, and listening. Prerequisite: ITL 202 or equivalent. (*)

ITL 312 Conv and Comp: Italian 3(3-0)
Focus on improving linguistic proficiency within the context of Italian culture. (Culture, History, Literature, Art, Gastronomy, Current Events, etc.). Prerequisite: ITL 202 or equivalent. (*)

ITL 341 Italian through Literature 3(3-0)
Focus on improving linguistic proficiency (reading, writing, listening and speaking) through the study of Italy's rich literary legacy. Prerequisite: ITL 202. (*)

ITL 351 Italian through Film 3(3-0)
Focus on improving linguistic proficiency (reading, writing, listening and speaking) through the study of Italian cinema. Prerequisite: ITL 202. (*)

ITL 381 Italian Civilization 3(3-0)
Focus on improving linguistic proficiency through the study of Italian geography, culture and history from the Roman Empire to the present. Prerequisite: ITL 202 or permission of instructor. (*)

ITL 387 Intensive Italian Study Abroad (1-12 VAR)
Study of Italian in an immersion setting abroad preparing the student to become fluent in the language through the study of grammar, civilization and culture. Prerequisite: permission of instructor; ITL 201. (*) Repeatable

ITL 391 Special Topics 3(3-0)
Prerequisite: ITL 202. (*) Repeatable (9)

ITL 394 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: ITL 202 and permission of instructor. (*) Repeatable (7)

ITL 494 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: 2 years of college Italian. (*) Repeatable

ITL 495 Independent Study (1-3 VAR)
May be repeated for credit with approval of major adviser. (*) Repeatable

MATHEMATICS (MATH)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

MATH 091 Special Topics (1-4 VAR)
Special topics are offered to students in areas where regular course offerings are not available. Prerequisite: satisfactory placement exam score. This course does not count toward graduation. (S/U grading) (*) Repeatable

MATH 098 Introductory Algebra 4(4-0)
Review of elementary algebraic operations including factoring and operations with fractions. Introduction to graphing, including graphs of lines. Solutions to linear and quadratic equations. This course does not count toward graduation. Prerequisite: satisfactory placement exam score. (S/U grading). (F,S,*)

MATH 099 Intermediate Algebra 4(4-0)
A course designed to broaden and deepen algebraic problem-solving skills. Topics include systems of equations, exponents, radicals, complex numbers, quadratic equations, factoring polynomials, function notation and graphs (S/U grading). This course does not count toward graduation. Prerequisite: satisfactory placement exam score or MATH 098 or equivalent. (F,S,*)

MATH 109 Mathematical Explorations 3(3-0)
Emphasis on quantitative reasoning and problem solving. Topics chosen from logic, sets, algebra, linear programming, probability, statistics, number theory, geometry, voting theory, and graph theory. Prerequisite: satisfactory placement exam score or MATH 099 or equivalent. (F,S,*) (Gen Ed: M, GT-MA1)

MATH 118 SAI for College Algebra 2(2-0)
Student-centered instruction to review basic academic skills for students to be successful in MATH 119 College Algebra. Prerequisite: satisfactory placement score (ACT 19-21) and first-time, fulltime student status. Corequisite: concurrent enrollment in MATH 119. (F)

MATH 119 College Algebra with SAI 4(4-0)
Applications of algebraic techniques to study polynomial, rational, exponential and logarithmic functions; functions concepts are emphasized and exploited to analyze and solve applied problems. Prerequisite: satisfactory placement score (ACT 19-21) and first-time, fulltime student status. Corequisite: concurrent enrollment in MATH 118. (F)

MATH 121 College Algebra 4(4-0)
Solutions of algebraic equations, graphs of rational functions, exponential and logarithmic functions, and systems of equations. Prerequisite: satisfactory placement exam score or MATH 099 or equivalent. (F,S,SS) (Gen Ed: M, GT-MA1)

MATH 122 College Trigonometry 3(3-0)
Trigonometric and circular functions, identities, inverse functions, vectors, complex numbers. Prerequisite: MATH 121 or equivalent. (*)

MATH 124 Pre-calculus Math 5(5-0)
Polynomial, rational, exponential and logarithmic functions; solution of systems of equations; trigonometric, circular and certain special functions. Prerequisite: satisfactory placement exam score or MATH 121 or equivalent. (F,S,*) (Gen Ed: M, GT-MA1)

MATH 126 Calculus and Analytic Geometry I 5(5-0)
Introduction to limits, continuity, differentiation and integration with selected applications. Prerequisite: satisfactory placement exam score or MATH 124 or equivalent. (F,S,*) (Gen Ed: M, GT-MA1)

MATH 156 Introduction to Statistics 3(3-0)
Introduction to data analysis. Binomial and normal models. Sample statistics, confidence intervals, hypothesis tests, linear regression and correlation, and chisquare tests. Prerequisite: satisfactory placement exam score or MATH 099 or equivalent. (F,S,*) (Gen Ed: M, GT-MA1)

MATH 207 Matrix and Vector Algebra with Applications 2(2-0)
Systems of equations, matrices, inverses, determinants, eigenvalues and eigenvectors, scalar and cross-products, applications to geometry. (Math majors/minors should take this course concurrently with MATH 224.) Prerequisite: MATH 124. (F,S,*)

MATH 220 Quantitative Analysis for Business 4(4-0)
An introduction to quantitative methods required for business studies, includes linear programming, probability and statistics. Prerequisite: satisfactory placement exam score or MATH 121 or equivalent. (F,S,*)

MATH 221 Applied Calculus: An Intuitive Approach 4(4-0)
Non-rigorous introduction to calculus with emphasis on applications and modeling in the life sciences, social and behavioral sciences and business. Prerequisite: satisfactory placement exam score or MATH 121 or equivalent. (F,S,*) (Gen Ed: M, GT-MA1)

MATH 224 Calculus and Analytic Geometry II 5(5-0)
Differentiation and integration of transcendental functions, infinite sequences and series, parametric curves, and applications. (Math majors/minors should take this course concurrently with MATH 207.) Prerequisite: MATH 126. (F,S,*)

MATH 242 Introduction to Computation 4(3-2)
Computer programming and computation with applications. Loops, conditionals, data types and structures, I/O, functions, debugging, testing, and documentation. Numerical, graphical, symbolic computation issues and projects. Prerequisite: MATH 126 and MATH 207 or equivalent. (S)

MATH 291 Special Topics (1-5 VAR)
Prerequisite: permission of instructor and approval of the department chair. (*) Repeatable

MATH 295 Independent Study (1-5 VAR)
Prerequisite: permission of instructor. (*) Repeatable

MATH 307 Introduction to Linear Algebra 4(4-0)
A rigorous development of vector spaces and linear transformations. Prerequisite: MATH 207 and MATH 224. (F,*)

MATH 319 Number Theory 3(3-0)
Divisibility, prime numbers, linear congruences, multiplicative functions, cryptology, primitive roots, and quadratic residues. Prerequisite: MATH 307 or MATH 320. (S,*)

MATH 320 Introductory Discrete Mathematics 3(3-0)
Introduction to discrete structures with emphasis on logic and proof. Topics selected from graph theory, boolean algebra, combinatorics, binary relations, set theory, functions and sequences. Prerequisite: MATH 224 and MATH 207. (*)

MATH 325 Intermediate Calculus 3(3-0)
Continuation of MATH 224. Vector valued functions and multivariable calculus. Prerequisite: MATH 224. Pre or corequisite: MATH 207. (F,*)

MATH 330 Introduction to Higher Geometry 3(3-0)
Euclidean, hyperbolic, finite, and transformation geometries, models, and constructions. Prerequisite: MATH 224 or permission of instructor. (S,*)

MATH 337 Differential Equations I 3(3-0)
First order differential equations, homogeneous and non-homogenous linear differential equations, introduction to the Laplace transform, applications. Prerequisite: MATH 224 or equivalent. (F,S,*)

MATH 338 Differential Equations II 3(3-0)
Linear systems, existence and uniqueness of solutions, non-linear equations, series solutions, orthogonal sets of functions. Fourier series, boundary value problems, partial differential equations and applications. Prerequisite: MATH 337. MATH 325 is recommended. (F,O,*)

MATH 342 Introduction to Numerical Analysis 3(3-0)
Numerical solutions of polynomial, differential, integral, and other equations using the computer. Prerequisite: MATH 207, MATH 224 and a programming language, or permission of instructor. (*)

MATH 345 Algorithms and Data Structures 4(3-2)
An introduction to data structures, sorting, searching, recurrence relations and performance measures. Algorithms will be studied analytically and through computer implementation. Prerequisite: MATH 207, MATH 224, and MATH 242. (*)

MATH 350 Probability 3(3-0)
Introduction to probability theory and stochastic processes. Probability spaces, random variables and their distributions, exponential and Poisson processes, limit theorems and applications. Prerequisite: MATH 325. (F)

MATH 356 Statistics for Engineers and Scientists 3(3-0)
Calculus-based introduction to statistical methods. Sampling distributions, hypothesis testing, linear regression, design of experiments using ANOVA. Data analysis with Minitab. Prerequisite: MATH 350. (S)

MATH 360 Elementary Concepts of Mathematics I 3(3-0)
Development of the real number system and related concepts, including sets, numeration systems, whole numbers, integers, number theory and algorithms. Recommend MATH 109. Prerequisite: satisfactory placement score. (F,S,*)

MATH 361 Elementary Concepts of Mathematics II 3(3-0)
Conceptual development of fractions, rational numbers, geometry, measurement, probability and statistics. Prerequisite: MATH 360 and satisfactory placement score. (F,S,*)

MATH 362 Problem Solving for K-6 Teachers 3(3-0)
This course focuses on the process of mathematical problem solving. Students will develop and implement useful heuristics, and reflect on problem solving strategies. Prerequisite: MATH 361 and satisfactory placement score. (F,S,*)

MATH 411 Introduction to Topology 3(3-0)
An introduction to topological spaces, homeomorphisms, topological properties, and separation axioms. Prerequisite: MATH 307 or MATH 320. (*)

MATH 421 Introduction to Analysis 4(4-0)
An introductory course in real analysis providing a rigorous development of the concepts of elementary calculus. Prerequisite: MATH 307 and three approved upper division MATH courses. (F)

MATH 425 Complex Variables 3(3-0)
An introduction to complex function theory. Complex numbers, sequences and series, the calculus of complex functions, analytic functions, and conformal mappings. Prerequisite: MATH 325. (*)

MATH 427 Abstract Algebra 4(4-0)
Introduction to groups, rings, and fields and their elementary properties. Prerequisite: MATH 307 and three approved upper division MATH courses. (S)

MATH 445 Discrete Mathematics 3(3-0)
Topics selected from mathematical reasoning, combinatorial techniques, set theory, binary relations, functions and sequences, algorithm analysis, and discrete analysis. Prerequisite: MATH 224, 307 and knowledge of a programming language. (*)

MATH 463 History of Mathematics 3(3-0)
Survey of the origins of important mathematical concepts and of the mathematicians responsible for these discoveries. Prerequisite: MATH 307 or MATH 320. (F,O)

MATH 477 Materials and Techniques of Teaching Secondary School Mathematics 4(4-0)
Topics and current issues in secondary mathematics education, including materials development, learning theories, instructional and assessment strategies, curriculum, planning and standards. Sixty hours field experience required. Prerequisite: acceptance into Teacher Education Program and MATH 307 or MATH 320. (F,E)

MATH 480 Tutoring Practicum (1-2 VAR)
Participation in tutoring mathematics in the MLC under the guidance of the MLC Director. May be repeated for a maximum of two credits. Prerequisite: C or better in MATH 224 and permission of MLC Director. (S/U grading) (F,S,SS) Repeatable (2)

MATH 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

MATH 492 Research (1-3 VAR)
Research project selected by student and supervised by a regular mathematics faculty member. Prerequisite: department approval. (*) Repeatable

MATH 493 Seminar (1-3 VAR)
Prerequisite: senior standing and permission of instructor. (*) Repeatable

MATH 495 Independent Study (1-3 VAR)
Prerequisite: senior standing and permission of instructor. (*) Repeatable

MATH 498 Internship (1-6 VAR)
Work experience using the discipline of mathematics under the direction of the selected organization and a faculty member. Prerequisite: junior or senior standing and permission of the department chair. (S/U grading) (*) Repeatable

GRADUATE COURSES

MATH 501 Foundations of Mathematics 3(3-0)
Sets, logic, axiomatics, mappings and the various sub-systems of the reals for beginning graduate students. Prerequisite: permission of instructor. (*)

MATH 507 Linear Algebra 3(3-0)
Vector spaces, linear transformations, matrix representation, canonical form. Prerequisite: permission of instructor. (*)

MATH 521 Intermediate Analysis 3(3-0)
Point set theory, including the Bolzano-Weierstrass and the Heine-Borel theorems, theory of differentiation and Riemann integration, and sequences and series of functions. Prerequisite: permission of instructor. (*)

MATH 527 Abstract Algebra 3(3-0)
Groups, rings, integral domains, quotient rings, ideals, fields, homomorphisms and related topics. Prerequisite: permission of instructor. (*)

MATH 530 Advanced Geometry 3(3-0)
Foundations of geometry, geometric transformations, and applications. Prerequisite: permission of instructor. (*)

MATH 550 Statistical Methods 3(3-0)
Statistical modeling as a framework for the analysis of experimental data. Emphasis on use of statistical software. Regression, ANOVA, variance components, and chisquare tests. Prerequisite: MATH 156 or equivalent within the last five years. (*)

MATH 556 (EN 556) Design and Analysis of Experiments 3(3-0)
Foundations of experimental design, outline efficient methods to implement experiments, develop statistical methods to sort signal from noise, analysis of variance and response surface models. Prerequisite: permission of instructor. (*)

MATH 577 Concepts in Secondary School Mathematics (1-4 VAR)
Problems of teaching secondary school mathematics; the slow learner, methods, gifted students, evaluation. Prerequisite: permission of instructor. (*)

MATH 591 Special Topics (1-3 VAR) (*) Repeatable

MATH 595 Independent Study (1-2 VAR)
(*) Repeatable

MATH 598 Graduate Internship (1-4 VAR)
Volunteer or paid work experience under the combined supervision of the selected organization and a faculty member. Prerequisite: graduate standing. (S/U grading) (*) Repeatable

MATH 599 Thesis Research (1-6 VAR)
Prerequisite: graduate student status. (IP and SU grading) (*) Repeatable

MASS COMMUNICATIONS AND CENTER FOR NEW MEDIA (MCCNM)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

MCCNM 101 Media and Society 3(3-0)
Survey course that examines the historical, sociological, economic, technological, and ethical foundations of mediated communication from a social scientific perspective. (F,S,SS) (Gen Ed: SS, GT-SS3)

MCCNM 140 Radio Station Operation 1(1-0)
An introduction to radio station operation. Students gain practical experience operating KTSC 89.5, Colorado State University-Pueblo's 10,000 watt radio station. Prerequisite: MCCNM 101. (F,S)

MCCNM 201 Introduction to Journalism 3(3-0)
Instruction in basic journalism concepts including news writing style, news values, the public's right to know, objectivity, fairness and accuracy. Required for majors and minors. Prerequisite: ENG 101 and 102. (F,S)

MCCNM 210 Intro to Integrated Communication 3(3-0)
Fundamental principles of Integrated Marketing Communication, including advertising, public relations, sales promotion, and direct response, as applied to non-profit, government, and for profit organizations. Prerequisite: MCCNM 101. (F,S,SS)

MCCNM 211 Digital Publishing 3(1-4)
Introduction to publishing and design principles on a desktop computing environment, preparing students for publication design and editing careers. (F,S,SS)

MCCNM 220 Introduction to Electronic Media 3(3-0)
The course focuses upon the history, background, and technologies of the electronic media. Prerequisite: MCCNM 101. (F,S)

MCCNM 222 Broadcast News Writing 3(3-0)
Preparation of copy for radio/television news reports, interviews and commentary. (*)

MCCNM 232 Website Design 3(2-2)
Introduction to the creation and design of WWW pages, software applications, protocols and standards for implementing and managing WWW sites. (F,S,SS)

MCCNM 233 Script Writing 3(2-2)
Techniques, styles, formats, treatments, outlines, and scenarios for script forms used in the electronic media are covered with emphasis upon preparing scripts for production. (S)

MCCNM 235 (WS 235) Women and Media 3(3-0)
The historical and cultural implications of the mass media's portrayal of women and the extent of their media participation from colonial to contemporary times. (F)

MCCNM 245 Digital Media Production 3(3-0)
Concepts, skills and technology needed for recording and production of digital audio and video communication. Prerequisite: MCCNM 101. (F,S)

MCCNM 246 Advanced Digital Media Production 3(2-2)
The theory and practice of location digital video production using the single-camera approach to news and other non-fiction formats. Prerequisite: MCCNM 245. (*)

MCCNM 251 Sports Writing and Statistics 3(2-3)
Study and practical application of sports writing and statistics; emphasis on press box experience at intercollegiate athletic events. Prerequisite: MCCNM 201. (*)

MCCNM 260 Digital Imaging 4(2-4)
A course in applied digital imaging for mass communications print and web publications. Emphasis is on digital image acquisition, enhancement and creative application using computer software. (SS)

MCCNM 282 Digital Media Post Production 3(2-2)
The theory and practice of digital post production using nonlinear editing. Students will use their production skills in a variety of community based projects. Prerequisite: MCCNM 245. (*)

MCCNM 301 Editorial Writing 3(3-0)
Study of editorial page management and policy, with emphasis on preparation of editorials, columns and critical reviews. Prerequisite: MCCNM 201. (*)

MCCNM 302 Advertising Copywriting 3(3-0)
Copy writing essentials and formats for print, broadcast and direct mail advertising. Emphasis on developing writing techniques for practical application in both retail and product advertising. Prerequisite: MCCNM 210 or permission of instructor. (F)

MCCNM 305 News and Feature Writing 3(3-0)
Course covers the principles and practices, skills and ethics of professional general assignment news reporting and feature writing, including in-depth interviewing. Prerequisite: MCCNM 201. (S)

MCCNM 312 Publication Editing and Design 3(3-0)
News and features evaluation, copy editing, headline writing, basic page and overall publication design principles, photo and illustration editing, and use of desktop publishing software. Prerequisite: MCCNM 211 and 305. (S)

MCCNM 317 Advertising Strategy 3(3-0)
Seminar emphasizing tactics and strategies of advertising planning, utilizing media techniques, marketing posture and creative media buying. Prerequisite: MCCNM 210. (*)

MCCNM 318 Regulation of Electronic Media 3(3-0)
The historical and legal structures of radio, television, cable, and new technologies of mass communications are explored with emphasis upon inventors, innovation, and social development. Prerequisite: MCCNM 101 and 220. (F,S)

MCCNM 320 Media Programming 3(3-0)
Program types used on broadcast stations; analysis of network structure and local station programs; ethical requirements in programming. Prerequisite: MCCNM 101 and 220. (F)

MCCNM 321 Public Relations Case Problems 3(3-0)
Emphasis on analyzing public relations scenarios involving non-profit, private sector and government organizations and their impact on such publics as employees, consumers, voters, and volunteers. Prerequisite: MCCNM 210. (F)

MCCNM 330 (WS 330) Gender and Film 3(3-0)
A discussion course which examines gender roles in theatrical and documentary film while considering the perspective of producers, actors and spectators and salient film theories. Prerequisite: upper division standing in MCCNM or Women's Studies. (S)

MCCNM 332 Advanced Web Design and Development 3(2-2)
Study and implementation of advanced concepts in web design focused on a client-based curriculum that includes graphic design, usability and accessibility, design and architecture. Prerequisite: MCCNM 232 or permission of instructor. (*)

MCCNM 336 Interactive Media 3(3-0)
An overview of interactive media systems and the computer applications used to create interactive media content. Prerequisite: MCCNM 101. (F)

MCCNM 338 Global Communications 3(3-0)
A discussion of the cross border flow of information and cultural products, emphasis placed on major movements, investors, and global activities involved in international communication. Prerequisite: MCCNM 220. (F)

MCCNM 350 Advanced Media Lab (2-3 VAR)
Advanced laboratory courses for media that include the TODAY online and print news operation, advertising, KTSC-FM radio, and KTSC-RMPBS television production. Prerequisite: MCCNM major or minor, junior or senior standing, or permission of instructor. (F,S,SS) Repeatable (9)

MCCNM 370 Non-Profit Organizations and Communication 3(3-0)
A seminar course using cooperative teaching that integrates theory and practice to examine the basic elements of nonprofit organizations from economic, political, and social perspectives. Prerequisite: sophomore standing. (S)

MCCNM 402 Photojournalism 4(3-2)
Practical course in pictorial reporting; emphasis on spot news feature, picture stories and photographic essays. Prerequisite: MCCNM 260 or permission of instructor. (*)

MCCNM 411 Media Law and Ethics 3(3-0)
Ethical and legal factors of mass communications related to the structure and substance of laws at federal, state and local levels, including freedoms, restraints and contemporary issues. Prerequisite: junior or senior standing. (F,S)

MCCNM 415 Theories of Mass Communications 3(3-0)
Application of information theories to mass communication problems. Nature of the communication process in groups and between mass media and audiences. Contribution of theoretical concepts to solving specific problems. Prerequisite: senior standing or permission of instructor. (*)

MCCNM 422 Writing for Public Relations 3(3-0)
A specialized course in persuasive writing techniques in different formats. Emphasis is on print and electronic news releases, public service announcements, brochures, newsletters, speeches, and proclamations. Prerequisite: MCCNM 201 and 210. (S)

MCCNM 425 Audience Research Methodology 3(3-0)
Research methods to define and describe various publics contained within the mass audience. Emphasis on sampling, survey methods, data collection and analysis. (F,S)

MCCNM 430 Integrated Communications Campaigns 3(3-0)
The course examines the organization, structure, components and preparation of an integrated communication campaign focusing on advertising, public relations, sales promotion and direct response. Prerequisite: MCCNM 302. (F)

MCCNM 432 Video Documentary 3(2-2)
Advanced production course about non-fiction formats. The course combines theory, history, and production aesthetics specific to television documentary with opportunity to produce a TV documentary. Prerequisite: MCCNM 245. (*)

MCCNM 440 (ENG 440) Magazine Writing 3(3-0)
Instruction and practice in writing nonfiction magazine articles, with emphasis on story research and market selection. Prerequisite: MCCNM 305. (*)

MCCNM 445 Reporting Public Affairs 3(3-0)
Instruction and practice in reporting important issues in areas such as crime, courts, local and state government. Prerequisite: MCCNM 305. (S)

MCCNM 470 Healthcare Communications 3(3-0)
A specialized integrated communication course to develop deeper understanding of the healthcare industry and how integrated communications helps healthcare organizations achieve their objectives. Prerequisite: MCCNM 210. (S)

MCCNM 490 Special Projects (VAR 1-3)
Individualized instruction within a special interest area, under supervision of a member of the department. Repeatable once. Prerequisite: junior or senior standing, or permission of instructor. (F,S,SS) Repeatable (6)

MCCNM 491 Special Topics (1-3 VAR)
Prerequisite: junior or senior standing, or permission of instructor. (F,S,SS) Repeatable

MCCNM 493 Seminar 3(3-0)
Seminar devoted to special problems in mass media; emphasis on interrelationships of media, understanding media, and the role of criticism. Prerequisite: senior standing. (F,S)

MCCNM 494 Field Experience (3-9 VAR)
A semester-long internship. Student performs the professional duties required by the cooperating commercial mass medium, business or public service agency. May be taken for a maximum of 9 credits. Prerequisite: junior or senior standing, minimum of 30 hours in major, or permission of program chair, 3.0 major GPA. (F,S,SS) Repeatable (9)

MCCNM 495 Independent Study (1-3 VAR)
Prerequisite: junior or senior standing, or permission of instructor. (F,S,SS) Repeatable (6)

GRADUATE COURSE

MCCNM 591 Special Topics (1-3 VAR)
Prerequisite: graduate standing. (*)

MECHANICAL ENGINEERING (ME)

UNDERGRADUATE COURSE

ME 250 Computer Applications in Engineering 2(2-0)
Use of digital computers in instrumentation, control, and analysis. Prerequisite: EN 105 and MATH 126. (S)

MANAGEMENT (MGMT)

UNDERGRADUATE COURSES

MGMT 201 Principles of Management 3(3-0)
Managerial process of planning, organizing, leading, decision-making, and controlling. Modern management techniques will be emphasized. (F,S,SS)

MGMT 301 Organizational Behavior 3(3-0)
Team-work, individual and group behavior, motivation, work design, communication, decision-making, leadership, and organizational culture. Prerequisite: MGMT 201. (F,S,SS)

MGMT 311 Operations and Quality Management 3(3-0)
Managerial perspective of the operations and quality functions, use of analytical tools to solve operations and quality problems. Prerequisite: BUSAD 265 or MATH. 156. (F,S)

MGMT 318 Human Resource Management 3(3-0)
An examination of the human resource functions of planning, selection and recruitment, compensation, training and development, employee and labor relations, and safety and health. Prerequisite: MGMT 201. (*)

MGMT 362 Purchasing and Materials Management 3(3-0)
Strategies and tactical methods, opportunities and problems associated with the flow of materials in an organization will be covered. Prerequisite: MGMT 311 (*)

MGMT 365 Management Information Systems 3(3-0)
Introduction to application and management of IT in functional business areas (marketing, finance, accounting, etc.). Includes IT strategy, business intelligence, e-commerce, and enterprise information systems. Prerequisite: CIS 103, CIS 104, and MGMT 201. (*)

MGMT 368 Project Management 3(3-0)
Project planning, control, management and evaluation. Use of project planning software. Prerequisite: MGMT 201 and junior standing. (F,S)

MGMT 410 Labor Management Relations 3(3-0)
Federal and state legislation and executive orders governing the employer-employee relationship; legal rights of organizations and collective bargaining. Prerequisite: MGMT 318 (*)

MGMT 414 Entrepreneurship 3(3-0)
In-depth analysis of the various environment, management, accounting, finance, and legal considerations required for business plan development by an entrepreneur or small business owner. Prerequisite: MKTG 340. (*)

MGMT 460 Operations Strategy 3(3-0)
Examination of recent developments in the strategy of operations in the manufacturing and service sectors involving technological policy, new process development, and new product introduction. Prerequisite: MGMT 311. (*)

MGMT 468 Quality Management 3(3-0)
Concepts and techniques of quality improvement processes. Defining quality in customer satisfaction terms and improving quality of products and service through modern techniques. Prerequisite: MGMT 311. (*)

MGMT 471 Organization Theory and Design 3(3-0)
Evaluation of organizational design structures, measurement of system performance, and problems in design of adaptive systems. Prerequisite: senior standing in HSB and permission of advisor. (*)

MGMT 475 International Management 3(3-0)
An analysis of management opportunities and challenges in the global environment and the evaluation and formulation of strategies of firms operating and expanding internationally. Prerequisite: FIN 330, MGMT 301 and MKTG 340. (F,S,SS)

MGMT 485 Strategic Management 3(3-0)
Integration of the business core disciplines to explore ways that strategy is formed in contemporary business organizations. Case method used extensively. Prerequisite: BUSAD 360, FIN 330, MGMT 301, MGMT 311, and MKTG 340. (F,S,SS)

MGMT 488 Sports Industry Management 3(3-0)
Development of the sports industry; present state, and future trends in the field through the lenses of recreation, amateur and professional sport. Prerequisite: MKTG 340. (S)

MGMT 490 Special Projects (1-6 VAR)
(*) Repeatable (6)

MGMT 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable (6)

MGMT 495 Independent Study (1-3 VAR)
Prerequisite: senior standing in School of Business and permission of department chair. (*) Repeatable (6)

MGMT 498 Internship (1-6 VAR)
Supervised field work in selected business, social and governmental organizations; supplemented by written reports. (S/U grading) Prerequisite: junior or senior standing in School of Business and permission of internship coordinator. (*) Repeatable (6)

GRADUATE COURSES

MGMT 501 Fundamentals of Management 3(3-0)
This class familiarizes students with the managerial process and multiple specific topics related to the managerial function. Prerequisite: admission to MBA. (*)

MGMT 505 Principles of Management 3(3-0)
Managerial process of planning, organizing, leading, decision-making, and controlling. Modern management techniques will be emphasized. (*)

MGMT 511 Production/Operations Management 3(3-0)
Managerial perspective of operations functions, under-standing of analytical tools to solve operations problems, applied operations issues, and develop decision-making skills. Prerequisite: admission to MBA or permission of MBA Director. (*)

MGMT 520 Management of Organizational Behavior 3(3-0)
Ideas and concepts for increasing effectiveness in organizations. Major topics include personality, motivation, leadership, communication, group dynamics, change and conflict, and contingencies of work unit design. Prerequisite: admission to MBA or permission of MBA Director. (*)

MGMT 521 Theories of Organizational Design 3(3-0)
Identification of external environments faced by organizations and theories of organizational design that enable organizations to operate more effectively within their respective environments. Prerequisite: admission to MBA or permission of MBA Director. (*)

MGMT 540 Managing Human Resources 3(3-0)
A survey course covering the major areas of the management of human behavior in work organizations. Consideration given to aspects of strategic human resource management. (F)

MGMT 555 Wealth Building Enterprises 3(3-0)
Review of relevant contemporary literature, personal success definition, lifetime objectives and strategies to achieve those objectives. Seminar style. Emphasis on entrepreneurship. Prerequisite: acceptance into MBA program or permission of instructor. (SS,*)

MGMT 565 Management Information Systems 3(3-0)
Principles, methodologies, practices and management of information systems in business organizations, topics include: IT strategy, IT project management, e-commerce, and enterprise information systems. Prerequisite: admission to MBA or permission of MBA Director. (*)

MGMT 575 International Management 3(3-0)
An advanced analysis of management opportunities and challenges in the global environment and the evaluation and formulation of strategies of firms operating and expanding internationally. Prerequisite: MGMT 520 and BUSAD 502. (F,S,SS)

MGMT 585 Management Policy and Strategy 3(3-0)
Critical analysis of the policy/strategy field. This course integrates the business core disciplines to explore ways that strategy is formed in contemporary business organizations. Case Method used extensively. Prerequisite: admission to MBA or permission of MBA Director and completion of core courses. (*)

MGMT 591 Special Topics 3(3-0) (*) Repeatable (6)

MGMT 595 Independent Study (1-3 VAR)
Individual study of a subject determined by the instructor and student with permission of the director. Prerequisite: admission to MBA or permission of MBA Director. (*) Repeatable (6)

MARKETING (MKTG)

UNDERGRADUATE COURSES

MKTG 340 Principles of Marketing 3(3-0)
Analytical survey of problems encountered in distributing goods and services from a marketing-management approach with emphasis on the role of the consumer and the social responsibility of the marketer. (F,S)

MKTG 341 Sales Force Management 3(3-0)
Managing a sales force including recruiting, selection, training, compensation, supervision, stimulation and sales planning. Computer simulation used to do forecasting, budgeting, territory allocation, sales analysis and control. Prerequisite: MKTG 340. (*)

MKTG 342 Promotional Strategy 3(3-0)
Principles, concepts and problems involved in development and management of advertising, personal selling, public relations and sales promotion programs, activities in the global economy. Prerequisite: MKTG 340. (*)

MKTG 345 Retail Management 3(3-0)
Issues in buying, maintaining inventory, displaying, designing store layouts, promoting, providing services and general merchandising of products for improving retail profitability. Prerequisite: MKTG 340. (*)

MKTG 348 Consumer Behavior 3(3-0)
Survey of contributions of behavioral sciences to understanding and prediction of consumer behavior in the decision-making process. Prerequisite: MKTG 340. (*)

MKTG 388 Sports Industry Marketing 3(3-0)
Introduce the various aspects of sports marketing, concentrating on the basic principles of sales, sponsorship, fan development, promotion, advertising and merchandising. Prerequisite: MKTG 340. (F)

MKTG 440 Marketing Research 3(3-0)
Fundamental techniques. Practical experience in research methodology: planning an investigation, questionnaires, sampling, interpretation of results, report preparation. Prerequisite: MKTG 340 and BUSAD 265. (*)

MKTG 441 Marketing Strategies 3(3-0)
Detailed consideration of process of formulating and implementing strategies in marketing. Major emphasis on markets, channels of distribution, and product analysis. Prerequisite: MKTG 340 and BUSAD 360. (*)

MKTG 475 International Marketing 3(3-0)
Effects of culture, political and legal structures on marketing. Planning for international products, services, promotion, pricing, distribution and impact of trade groups. Prerequisite: MKTG 340. (*)

MKTG 490 Special Projects (1-6 VAR)
Prerequisite: MKTG 340 and permission of instructor. (*) Repeatable (6)

MKTG 491 Special Topics (1-3 VAR)
Prerequisite: MKTG 340 and permission of instructor. (*) Repeatable (6)

MKTG 495 Independent Study (1-3 VAR)
Prerequisite: MKTG 340 and permission of instructor. (*) Repeatable (6)

MKTG 498 Internship (1-6 VAR)
Supervised field work in selected business, social and governmental organizations; supplemented by written reports. (S/U grading) Prerequisite: MKTG 340, junior or senior standing in School of Business, and permission of internship coordinator. (*) Repeatable (6)

GRADUATE COURSES

MKTG 501 Fundamentals of Marketing 1.5(1.5-0)
This class prepares students in the conception, promotion, pricing and distribution of ideas, goods, and services from a marketing perspective. Prerequisite: admission to MBA. (*)

MKTG 505 Principles of Marketing 3(3-0)
Analytical survey of problems encountered in distributing goods and services from a marketing-management approach with emphasis on the role of the consumer and the social responsibility of the marketer. (*)

MKTG 540 Marketing Management 3(3-0)
Emphasizes an understanding of market behavior, coordination and implementation of the marketing mix with other managerial decisions, and the integration of theory through use of cases. Prerequisite: admission to MBA or permission of MBA Director. (*)

MKTG 561 Advertising and Promotion Research 3(3-0)
Advertising and Promotion research examines the effectiveness of alternative creative and channel strategies. Corequisite: MKTG 540. (S)

MKTG 575 International Marketing 3(3-0)
An advanced analysis of marketing opportunities and challenges in the global environment and the evaluation and formulation of strategies of firms operating and expanding internationally. Prerequisite: MKTG 540. (F,S,SS)

MKTG 591 Special Topics 3(3-0) (*) Repeatable (6)

MKTG 595 Independent Study (1-3 VAR)
Individual study of a subject determined by the instructor and student with permission of the director. Prerequisite: admission to MBA or permission of MBA Director. (F,S,SS) Repeatable (6)

MILITARY SCIENCE AND LEADERSHIP (MSL)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

MSL 101 Leadership and Personal Development 1(1-0)
Introduces students to the personal challenges and competencies that are critical for effective leadership. Students learn skills that relate to leadership, officership and the Army. Field work required once a week. (F)

MSL 102 Introduction to Tactical Leadership 1(1-0)
Provides an overview of leadership fundamentals such as problem solving, listening skills and writing. Students explore dimensions of leadership in the context of classroom instruction and practical exercises. Field work required once a week. (S)

MSL 201 Innovative Team Leadership 2(2-0)
Explores the dimensions of creative tactical leadership strategies and styles by examining team dynamics and leadership theories. Students practice team building exercises during leadership labs. Field work required once a week. (F)

MSL 202 Foundations of Tactical Leadership 2(2-0)
Examines the challenges of leading tactical teams in the contemporary operating environment (COE). Highlights terrain analysis, operation orders and adaptive leadership. Field work required once a week. (S)

MSL 301 Adaptive Tactical Leadership 3(3-0)
Challenges students to study, practice and evaluate adaptive leadership skills in scenarios related to squad tactical operations. Students receive specific feedback on their leadership skills. Field work required once a week and physical training required three times per week. Prerequisite: ROTC Basic Course Credit. (F)

MSL 302 Leadership in Changing Environments 3(3-0)
Employs increasing leadership challenges to build skills in leading tactical operations at the platoon level. Students learn basics of stability operations and conduct military briefings. Field work required once a week. Physical training required three times/week. Prerequisite: ROTC Basic Course Credit. (S)

MSL 303 Advanced Camp 6(0-12)
Students are assigned to a unit, placed in leadership positions, and evaluated on how they work in that unit. Mandatory for Advanced Course ROTC students. Prerequisite: MSL 301 and MSL 302. (SS)

MSL 401 Developing Adaptive Leaders 3(2-2)
Develops proficiency in planning, executing and assessing complex operations by functioning as a staff; includes basics of risk management, ethical decision-making and military justice. Field work required once a week. Physical training required three times per week. Prerequisite: ROTC Basic Course Credit. (F)

MSL 402 Leadership in a Complex World 3(2-2)
Explores the dynamics of leading in complex situations of the current operating environment (COE). Includes advanced instruction in law of war and interaction with non-governmental organizations (NGOs). Field work once weekly. Physical training required three times per week. Prerequisite: ROTC Basis Course Credit. (S)

MSL 485 Special Studies in Leadership 1(1-0)
Course for students participating in the Army ROTC Advanced Course that want to pursue further studies in military leadership and group dynamics. May be repeated for credit. Prerequisite: by arrangement with the professor of Military Science only. (F,S) Repeatable

MUSIC (MUS)

UNDERGRADUATE COURSES

MUS 100 Music Fundamentals I: Notation 2(2-0)
An overview of the basic elements and principles of music notation and their application to performance. (*)

MUS 101 Music Performance Symposium I (0, 1 VAR)
Level one course in observation and critique of music performances, includes lectures, clinics, demonstrations, and performance preparation. Weekly critiques required for credit. (F,S) Repeatable (2)

MUS 102 Concert Choir I (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the choral ensemble. Additional rehearsals and performances are required. (Level I). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 103 Music and Computer Technology I 1(1-0)
Introduction to the use of computer technology in music, including digital audio, MIDI, composing, sequencing, performing, and printing, utilizing various software applications. Prerequisite: permission of instructor. (F,S)

MUS 104 Collaborative Music Ensemble I (.5-1 VAR) (0-2)
Ensemble specializing in small chamber works for piano, winds, strings, in various combinations. Prerequisite: permission of instructor (*) Repeatable (2)

MUS 105 Music Fundamentals II: Foundations 2(2-0)
A study of the basic principles of music theory relating to musical composition. Prepares students for success in the Music Theory sequence. (*)

MUS 107 University Band I (.5-1 VAR) (0-2)
Provides a Concert Band performing opportunity for students from all disciplines across campus. Prerequisite: director approval. (S)

MUS 108 Vocal Jazz Ensemble I (.5-1 VAR) (0-2)
Level one secondary music ensemble specializing in the rehearsal, study, and public performance of appropriate vocal jazz ensemble literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 109 Chamber Choir I (.5-1 VAR) (0-2)
Level one primary ensemble for vocal majors specializing in the rehearsal, study, and public performance of advanced choral literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 110 Music and Audio Production I 1(1-0)
Introduces principals of music and audio recording, editing, mixing and mastering using computer-based Digital Audio Workstation software. Prerequisite: permission of instructor. (F,S)

MUS 112 Wind Ensemble I (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the wind band. Additional rehearsals and performances are required. (Level I). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 113 Vocal Techniques and Diction 1(0-2)
Instruction in the fundamentals of singing from a pedagogical approach. Additional basic instruction in foreign language pronunciation. Primarily intended for students in Music Education. (F,S)

MUS 114 Brass Ensemble I (.5-1 VAR) (0-2)
Level one music ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of brass instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 115 Mariachi Ensemble I (.5-1 VAR) (0-1)
Level one music ensemble specializing in the rehearsal, study and performance of appropriate literature in the Mariachi style. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 116 ThunderWolves Drumline I (.5-1 VAR) (0-2)
Provides an indoor drumline ensemble option for students from across campus who desire to expand their performance knowledge of percussion and other appropriate instruments. Prerequisite: director approval. (S)

MUS 118 Music Appreciation 3(3-0)
Significant musical compositions, composers and historical eras; analysis and description of music forms and terms; includes women composers and multi-cultural issues. (F,S) (Gen Ed: H, GT-AH1) (CC)

MUS 120 History of Jazz 2(2-0)
Study of historical trends and developments in jazz, including significant performers, styles, composers, and compositions. (*)

MUS 121 Chamber Ensemble I (.5-1 VAR) (0-2)
Level one secondary ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of string instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 124 Percussion Ensemble I (.5-1 VAR) (0-2)
Level one ensemble specializing in rehearsal, study, and performance of appropriate literature for combinations of percussion instruments. Additional rehearsals and performance activities are required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 125 Piano Class for Non-Majors 1(0-2)
An elective course for the piano beginner or intermediate player who wishes to increase personal skill at the keyboard. (F,S) Repeatable (2)

MUS 127 Functional Piano I: Beginning 1(0-2)
For students with no piano experience. Introduces fundamentals, with emphasis on providing skills necessary for successful completion of the Proficiency Exam. May be repeated. (F,S) Repeatable (2)

MUS 130 Guitar Class 1(0-2)
Basic instruction in guitar technique in a group setting. Application of both melodic and chordal (rhythmic) media. Primarily for the non-music major/minor. (*) Repeatable

MUS 131 Pep Band I (.5-1 VAR) (0-2)
Provides functional music at various home athletic events and select special occasions while serving as a laboratory of learning for future music educators. (*) Repeatable (2)

MUS 132 Guitar Ensemble, Classical I (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate classical guitar literature. Additional rehearsals and performance activities are required. (Level I). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 134 Woodwind Ensemble I (.5-1 VAR) (0-2)
Level one ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of woodwind instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 135 Marching Band I (.5-1 VAR) (0-6)
Provides functional music at home football games and select special occasions while serving as a laboratory of learning for future music educators. Prerequisite: instructor permission (F)

MUS 136 Guitar Ensemble, Jazz I (.5-1 VAR) (0-2)
Level one rehearsal, study and public performance of selected appropriate non-classical guitar literature. Additional rehearsals and performance activities are required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 142 Piano Ensemble I (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate piano ensemble literature. Additional rehearsals and performance activities are required.   (Level I). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 144 Orchestra I (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the full orchestra. Additional rehearsals and activities are required. (Level I). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 150 Music Theory I 3(3-0)
A comprehensive review of all music theory fundamentals leading to diatonic harmony and four-part writing based on 18th century "common practice". Prerequisite: successful completion of MUS 100 and 105 recommended (or satisfactory completion of theory placement examination). Corequisite: MUS 151. (F)

MUS 151 Aural Skills 2(1-2)
Development of basic aural skills, including diatonic harmony, interval recognition, singing at sight, error detection, and rhythmic, melodic, and harmonic discriminatory listening. Corequisite: MUS 150. (F,S)

MUS 152 Jazz Improvisation I 2(2-0)
Introduction to theory and techniques of improvisation in various styles of jazz. Includes developing familiarity with various representative jazz artists. May be repeated for credit. Prerequisite: permission of instructor. (F) Repeatable (6)

MUS 154 Jazz Ensemble I (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the jazz ensemble. Additional rehearsals and performances are required. (Level I). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 160-179 Applied, non major (1-2 VAR) (0-.5-1)
Applied music study in various performance areas for the non-music major. Weekly lesson arranged with the instructor. Prerequisite: permission of instructor. (F,S)—(160-Violin) (161-Viola) (162-Cello) (163-Bass) (164-Flute) (165-Oboe) (166-Bassoon) (167-Clarinet) (168-Saxophone) (169-Voice) (170-Trumpet) (171-French Horn) (172-Trombone) (173-Euphonium) (174-Tuba) (175-Percussion) (176-Piano) (177-Organ) (178-Classical Guitar) (179-non-Classical Guitar). Repeatable

MUS 180 Applied Music Composition 1(0-.5)
Applied music study in composition. One half-hour lesson per week; time to be arranged with the instructor. Prerequisite: permission of instructor. (F,S) Repeatable

MUS 201 Music Performance Symposium II (0, 1, VAR)
Level two course in observation and critique of music performances; includes lectures, clinics, demonstrations, and performance preparation. Weekly critiques required for credit. Prerequisite: MUS 101. (F,S) Repeatable (2)

MUS 202 Concert Choir II (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the choral ensemble. Additional rehearsals and performances are required. (Level II). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 203 Electronic Music 2(1-2)
In-depth study of and experiences with a variety of electronic music hardware and software. Includes sound recording and engineering practices. (*) Repeatable

MUS 204 Collaborative Music Ensemble II (.5-1 VAR) (0-2)
Ensemble specializing in small chamber works for piano, winds, strings, in various combinations. Prerequisite: permission of instructor. (*) Repeatable (2)

MUS 207 University Band II (.5-1 VAR) (0-2)
Provides a Concert Band performing opportunity for students from all disciplines across campus. Prerequisite: director approval. (S)

MUS 208 Vocal Jazz Ensemble II (.5-1 VAR) (0-2)
Level two secondary music ensemble specializing in the rehearsal, study, and public performance of appropriate vocal jazz ensemble literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 209 Chamber Choir II (.5-1 VAR) (0-2)
Level two primary ensemble for vocal majors specializing in the rehearsal, study, and public performance of advanced choral literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 210 Music Theory II 3(3-0)
Continuation of MUS 150 with further development of diatonic harmony, four-part writing skills, diatonic modulation, and analysis of appropriate, representative literature. Prerequisite: successful completion of MUS 150. Corequisite: MUS 211. (S)

MUS 211 Aural Skills II 2(1-2)
Continuation of MUS 151. Continued development of aural skills, including diatonic harmony, interval recognition, singing at sight, error detection, and rhythmic, melodic, and harmonic discriminatory listening. Prerequisite: successful completion of MUS 151. Corequisite: MUS 210. (S)

MUS 212 Wind Ensemble II (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the wind band. Additional rehearsals and performances are required. (Level II). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 214 Brass Ensemble II (.5-1 VAR) (0-2)
Level two music ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of brass instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 215 Mariachi Ensemble II (.5-1 VAR) (0-1)
Level two music ensemble specializing in the rehearsal, study and performance of appropriate literature in the Mariachi style. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 216 ThunderWolves Drumline II (.5-1 VAR) (0-2)
Provides an indoor drumline ensemble option for students from across campus who desire to expand their performance knowledge of percussion and other appropriate instruments. Prerequisite: director approval. (S)

MUS 221 Chamber Ensemble II (.5-1 VAR) (0-2)
Level two secondary ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of string instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 223 Percussion Techniques 1(0-2)
Instruction in the fundamentals of percussion instruments from a pedagogical approach, enabling students to effectively teach beginners. Primarily intended for students in Music Education. (F,S)

MUS 224 Percussion Ensemble II   (.5-1 VAR) (0-2)
Level two ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of percussion instruments. Additional rehearsals and performance activities are required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 227 Func. Piano II: Int/Proficiency 1(0-2)
Continuation of MUS 127. Emphasis on providing further skills necessary for successful completion of the Proficiency Exam. May be repeated. Prerequisite: successful completion of MUS 127. (F,S) Repeatable

MUS 229 Piano Proficiency Completion 1(0-1)
One-half hour private lesson per week in which to complete the preparation for and take the Piano Proficiency Exam. Prerequisite: successful completion of MUS 127 and 227, or permission of the instructor. (S/U grading) (F,S)

MUS 230 Marching Band II (.5-1 VAR) (0-6)
Provides functional music at home football games and select special occasions while serving as a laboratory of learning for future music educators. Prerequisite: instructor permission. (F)

MUS 231 Pep Band II   (.5-1 VAR) (0-2)
Provides functional music at various home athletic events and select special occasions while serving as a laboratory of learning for future music educators. (*) Repeatable (2)

MUS 232 Guitar Ensemble, Classical II   (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate classical guitar literature. Additional rehearsals and performance activities are required. (Level II). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 233 Woodwind Techniques 1(0-2)
Instruction in the fundamentals of woodwind instruments from a pedagogical approach, enabling students to effectively teach beginners. Primarily intended for students in Music Education. (F,S)

MUS 234 Woodwind Ensemble II   (.5-1 VAR) (0-2)
Level two ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of woodwind instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 236 Guitar Ensemble, Jazz II (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate non-classical guitar literature. Additional rehearsals and performance activities are required. (Level II). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 240 Staging for Singers 1(0-1)
An elective course providing instruction in blocking and acting for singers in scenes from musical theater or opera. Prerequisite: permission of instructor. (F,S) Repeatable

MUS 242 Piano Ensemble II (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate piano ensemble literature. Additional rehearsals and performance activities are required.   (Level II). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 243 String Techniques 1(0-2)
Instruction in the fundamentals of stringed instruments from a pedagogical approach, enabling students to effectively teach beginners. Primarily intended for students in Music Education. (F,S)

MUS 244 Orchestra II (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the full orchestra. Additional rehearsals and activities are required. (Level II). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 250 Music Theory III 3(3-0)
A continuation of MUS 210. Applications of chromatic and altered harmonies of the Romantic, post-Romantic and pre-modern compositions within functional harmonic idioms. Prerequisite: successful completion of MUS 150 and 210. Corequisite: MUS 251. (F)

MUS 251 Aural Skills III 2(1-2)
Continuation of MUS 211. Continued development of aural skills, including non-diatonic harmony, interval recognition, singing at sight, error detection, and rhythmic, melodic, and harmonic discriminatory listening. Prerequisite: successful completion of MUS 211. Corequisite: MUS 250. (F)

MUS 252 Jazz Improvisation II 2(2-0)
Continuation of instruction in theory and techniques of improvisation in various styles of jazz. Includes developing familiarity with various representative jazz artists. May be repeated for credit. Prerequisite: successful completion of MUS 152 or permission of instructor. (S) Repeatable (6)

MUS 253 Brass Techniques 1(0-2)
Instruction in the fundamentals of brass instruments from a pedagogical approach, enabling students to effectively teach beginners. Primarily intended for students in Music Education. (F,S)

MUS 254 Jazz Ensemble II (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the jazz ensemble. Additional rehearsals and performances are required. (Level II) (F,S) Repeatable (2)

MUS 260-279 Applied Music, Major 2(0-1)
In-depth applied study in various performance areas for the Freshman and Sophomore music major (may be repeated at Sophomore level). Prerequisite: declared music major, permission of instructor. (F,S)—(260-Violin) (261-Viola) (262-Cello) (263-Bass) (264-Flute) (265-Oboe) (266-Bassoon) (267-Clarinet) (268-Saxophone) (269-Voice) (270-Trumpet) (271-French Horn) (272-Trombone) (273-Euphonium) (274-Tuba) (275-Percussion) (276-Piano) (277-Organ) (278-Classical Guitar) (279-non-Classical Guitar). Repeatable (8)

MUS 280 Music Theory IV 3(3-0)
A continuation of MUS 250. A harmonic study of the emergence of 20th century compositional techniques from chromatic functional harmonic schemes. Prerequisite: successful completion of MUS 250. Corequisite: MUS 281. (S)

MUS 281 Aural Skills IV 2(1-2)
Continuation of MUS 251. Continued development of aural skills, including chromatic harmony, interval recognition, singing at sight, error detection, and rhythmic, melodic, and harmonic discriminatory listening. Prerequisite: successful completion of MUS 251. Corequisite: MUS 280. (S)

MUS 285 Cultural History of Popular Music 2(2-0)
A survey of the various styles of American popular music from approximately 1900 to the present including folk music, ragtime, blues, jazz, and rock. (F,S)

MUS 291 Special Topics (1-3 VAR) (*) Repeatable

MUS 301 Music Performance Symposium III (0, 1 VAR)
Level three course in observation and critique of music performances; includes lectures, clinics, demonstrations, and performance preparation. Weekly critiques required for credit. Prerequisite: MUS 201. (F,S) Repeatable (2)

MUS 302 Concert Choir III (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the choral ensemble. Additional rehearsals and performances are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 303 Music and Computer Technology II 1(0-2)
Continued study in the use of computer technology in music, including digital audio, MIDI, composing, sequencing, performing, and printing, utilizing various software applications. Prerequisite: MUS 103. (F,S)

MUS 304 Collaborative Music Ensemble III (.5-1 VAR) (0-2)
Ensemble specializing in small chamber works for piano, winds, strings, in various combinations. Prerequisite: permission of instructor. (*) Repeatable (2)

MUS 305 Music History I 3(3-0)
An in-depth study of music history and representative literature from Antiquity to the Classical period. Prerequisite: successful completion of MUS 118, 150, 210. (F)

MUS 306 Technology for Music Educators 2(2-1)
Applies educational technology to the classroom and performance activities of music teachers, including instruction, communication, sound recording and editing. Prerequisite: MUS 103. (F,S)

MUS 307 University Band III (.5-1 VAR) (0-2)
Provides a Concert Band performing opportunity for students from all disciplines across campus. Prerequisite: director approval. (S)

MUS 308 Vocal Jazz Ensemble III (.5-1 VAR) (0-2)
Level three secondary music ensemble specializing in the rehearsal, study, and public performance of appropriate vocal jazz ensemble literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 309 Chamber Choir III (.5-1 VAR) (0-2)
Level three primary ensemble for vocal majors specializing in the rehearsal, study, and public performance of advanced choral literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 310 Audio Production II: Pro Tools 1(1-0)
Advanced instruction in the use of Pro Tools for music mixing and mastering. Prerequisite: MUS 110 and MUS 303. (F,S)

MUS 312 Wind Ensemble III (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the wind band. Additional rehearsals and performances are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 314 Brass Ensemble III (.5-1 VAR) (0-2)
Level three music ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of brass instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 315 Mariachi Ensemble III (.5-1 VAR) (0-1)
Level three music ensemble specializing in the rehearsal, study and performance of appropriate literature in the Mariachi style. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 316 ThunderWolves Drumline III (.5-1 VAR) (0-2)
Provides an indoor drumline ensemble option for students from across campus who desire to expand their performance knowledge of percussion and other appropriate instruments. Prerequisite: director approval. (S)

MUS 321 Chamber Ensemble III (.5-1 VAR) (0-2)
Level three secondary ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of string instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 323 Diction for Singers 2(2-0)
A course in reading pronunciation of Italian, French, German, Latin, and Spanish for singers. Utilizes the International Phonetic Alphabet. Primarily for vocal music students. (*)

MUS 324 Percussion Ensemble III (.5-1 VAR) (0-2)
Level three ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of percussion instruments. Additional rehearsals and performance activities are required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 326 Guitar Pedagogy I: Adv Sightreading 2(0-2)
Focus on advanced knowledge of the fretboard, harmony, sightreading, and arranging for guitar. Prerequisite: successful completion of junior qualifying exam, or consent of the instructor. (*)

MUS 327 Guitar Pedagogy II: History & Lit 2(0-2)
Focus on evolution of guitar notation and representative repertoire of each historical period. Prerequisite: successful completion of junior qualifying exam, or consent of the instructor. (*)

MUS 330 Marching Band III (.5-1 VAR) (0-6)
Provides functional music at home football games and select special occasions while serving as a laboratory of learning for future music educators. Prerequisite: instructor permission. (F)

MUS 331 Pep Band III (.5-1 VAR) (0-2)
Provides functional music at various home athletic events and select special occasions while serving as a laboratory of learning for future music educators. (*) Repeatable (2)

MUS 332 Guitar Ensemble, Classical III (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate classical guitar literature. Additional rehearsals and performance activities are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 334 Woodwind Ensemble III (.5-1 VAR) (0-2)
Level three ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of woodwind instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 336 Guitar Ensemble, Jazz III (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate non-classical guitar literature. Additional rehearsals and performance activities are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 339 Applied Music Composition 1(0-.5)
Applied music study in composition. One half-hour lesson per week; time to be arranged with the instructor. Permission of instructor required. Prerequisite: MUS 280. (F,S) Repeatable

MUS 340 General Music Methods 2(2-1)
Comprehensive study in materials, techniques, methods, and problem-solving techniques for the teacher of general music in the public schools. Prerequisite: admission to Teacher Education Program. (F,O)

MUS 342 Piano Ensemble III (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate piano ensemble literature. Additional rehearsals and performance activities are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 344 Orchestra III (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the full orchestra. Additional rehearsals and activities are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 345 Junior Lecture Recital 1(1-0)
Weekly one-hour meeting with instructor to complete lecture component of the Junior Lecture Recital. Prerequisite: 8 hours of Applied Music earned. Corequisite: concurrent enrollment MUS 360-371 required. (F,S)

MUS 346 Piano Literature 2(2-0)
Survey of piano literature from the 18th-century to the present. (*)

MUS 347 Piano Pedagogy 2(2-0)
Introduction to the practices in teaching private and class piano. (*)

MUS 349 Junior Recital 2(0-1)
Weekly 1 hour lesson with instructor in preparation and completion of the Junior Recital. Requires 6 hours Applied Music earned. (F,S,SS)

MUS 350 Theory V-Composition and Analysis 2(2-0)
Analysis and application of compositional techniques in music from all style periods, including form, harmony, and style. Prerequisite: successful completion of MUS 280. (*)

MUS 351 Counterpoint 2(2-0)
Intensive overview of the contrapuntal composition styles of the 16th and 18th centuries. Prerequisite: MUS 280. (S)

MUS 352 19th Century Styles 2(2-0)
Intensive overview of compositional approaches in 19th century music with emphasis on advances in harmony. Prerequisite: MUS 280. (S)

MUS 353 20th Century Styles 2(2-0)
Intensive overview of compositional approaches in 20th century music with emphasis on analytical systems for atonal music. Prerequisite: MUS 280. (S)

MUS 354 Jazz Ensemble III   (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the jazz ensemble. Additional rehearsals and performances are required. (Level III). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 355 Music History II 3(3-0)
An in-depth study of music history and representative literature from the Classical period to the present. Prerequisite: successful completion of MUS 305. (S)

MUS 357 Orchestration and Arranging 2(2-0)
Instruction and application in techniques of scoring music for various combinations of musical mediums. Includes scoring for strings, woodwinds, brasses, percussion, and voices. Prerequisite: successful completion of MUS 150, 151, 210, 211, 250, 251, 280, 281. (F)

MUS 358 Basic Conducting 2(2-0)
Instruction in the conducting of music, with an emphasis on building basic skills and techniques. Prerequisite: successful completion of MUS 150, 151, 210, 211, 250, 251, 280, 281, 357. (S)

MUS 359 Advanced Conducting 2(0-1)
Continuing instruction in the conducting of music in the student's choice of emphasis areas. Individualized instruction in the form of one private lesson per week. Prerequisite: successful completion of MUS 358. (F)

MUS 360-379 Applied Music, Major 2(0-1)
In-depth applied study in various performance areas for the Junior music major. Prerequisite: admission to upper-class status; declared music major, permission of instructor. (F,S)—(360-Violin) (361-Viola) (362-Cello) (363-Bass) (364-Flute) (365-Oboe) (366-Bassoon) (367-Clarinet) (368-Saxophone) (369-Voice) (370-Trumpet) (371-French Horn) (372-Trombone) (373-Euphonium) (374-Tuba) (375-Percussion) (376-Piano) (377-Organ) (378-Classical Guitar) (379-non-Classical Guitar). Repeatable (4)

MUS 380-399 Applied Music, non-major (1-2 VAR) (0-.5-1)
In-depth applied study in various performance areas for the upper division non-major. Permission of instructor and upper division standing required. (F,S,SS)—(380-Violin) (381-Viola) (382-Cello) (383-Bass) (384-Flute) (385-Oboe) (386-Bassoon) (387-Clarinet) (388-Saxophone) (389-Voice) (390-Trumpet) (391-French Horn) (392-Trombone) (393 Euphonium) (394-Tuba) (395-Percussion) (396-Piano) (397-Organ) (398-Classical Guitar) (399-non-Classical Guitar). Repeatable

MUS 401 Music Performance Symposium IV (0, 1 VAR)
Level four course in observation and critique of music performances; includes lectures, clinics, demonstrations, and performance preparation. Weekly critiques required for credit. Prerequisite: MUS 301. (F,S) Repeatable (2)

MUS 402 Concert Choir IV   (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the choral ensemble. Additional rehearsals and performances are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 404 Collaborative Music Ensemble IV   (.5-1 VAR) (0-2)
Ensemble specializing in small chamber works for piano, winds, strings, in various combinations. Prerequisite: permission of instructor. (*) Repeatable (2)

MUS 407 University Band IV   (.5-1 VAR) (0-2)
Provides a Concert Band performing opportunity for students from all disciplines across campus. Prerequisite: director approval. (S)

MUS 408 Vocal Jazz Ensemble IV   (.5-1 VAR) (0-2)
Level four secondary music ensemble specializing in the rehearsal, study, and public performance of appropriate vocal jazz ensemble literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 409 Chamber Choir IV   (.5-1 VAR) (0-2)
Level four primary ensemble for vocal majors specializing in the rehearsal, study, and public performance of advanced choral literature. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 410 Audio Production Lab 1(0-1)
Offers advanced students the opportunity to participate in and direct live performance recording of CSU-Pueblo ensembles. Prerequisite: MUS 110, 303. Pre or corequisite: MUS 310. (F,S)

MUS 412 Wind Ensemble IV   (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the wind band. Additional rehearsals and performances are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 414 Brass Ensemble IV   (.5-1 VAR) (0-2)
Level four music ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of brass instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 415 Mariachi Ensemble IV (.5-1 VAR) (0-1)
Level four music ensemble specializing in the rehearsal, study and performance of appropriate literature in the Mariachi style. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 416 ThunderWolves Drumline IV (.5-1 VAR) (0-2)
Provides an indoor drumline ensemble option for students from across campus who desire to expand their performance knowledge of percussion and other appropriate instruments. Prerequisite: director approval. (S)

MUS 420 Film Scoring 2(2-0)
The principles and history of film music, writing music for film and other music media integrating Sibelius and Pro Tools software. Prerequisite: MUS 180 or permission of instructor. (F,S)

MUS 421 Chamber Ensemble IV (.5-1 VAR) (0-2)
Level four secondary ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of string instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 424 Percussion Ensemble IV (.5-1 VAR) (0-2)
Level four ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of percussion instruments. Additional rehearsals and performance activities are required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 430 Marching Band IV (.5-1 VAR) (0-6)
Provides functional music at home football games and select special occasions while serving as a laboratory of learning for future music educators. Prerequisite: instructor permission. (F)

MUS 431 Pep Band IV (.5-1 VAR) (0-2)
Provides functional music at various home athletic events and select special occasions while serving as a laboratory of learning for future music educators. (*) Repeatable (2)

MUS 432 Guitar Ensemble, Classical IV (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate classical guitar literature. Additional rehearsals and performance activities are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 434 Woodwind Ensemble IV (.5-1 VAR) (0-2)
Level four ensemble specializing in the rehearsal, study, and performance of appropriate literature for combinations of woodwind instruments. Additional rehearsals and performance activities required. Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 436 Guitar Ensemble, Jazz IV (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate non-classical guitar literature. Additional rehearsals and performance activities are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 438 Composition Recital 2(0-1)
In-depth applied study in composition leading to the performance of original works. Prerequisite: permission of instructor. (F,S,SS)

MUS 439 Recital: Jazz Studies 2(0-1)
In-depth applied study in jazz studies leading to the performance of a solo or joint recital. Prerequisite: permission of instructor. (F,S)

MUS 440 Choral Music Methods 2(2-1)
Comprehensive study in materials, techniques, methods, and problem-solving techniques for the teacher of choral music in the public schools. Prerequisite: successful completion of MUS 113, 223, 233, 243, 253, admission to Teacher Education Program. (S,O)

MUS 441 Instrumental Music Methods 2(2-1)
Comprehensive study in materials, techniques, methods, and problem-solving techniques for the teacher of instrumental music in the public schools. Prerequisite: successful completion of MUS 113, 223, 233, 243, 253, admission to Teacher Education Program. Corequisite: MUS 440. (S)

MUS 442 Piano Ensemble IV (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate piano ensemble literature. Additional rehearsals and performance activities are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 444 Orchestra IV (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the full orchestra. Additional rehearsals and activities are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 445-449 Applied Music, Major 2(0-1)
In-depth applied study in various performance areas for the Senior music major. Prerequisite: admission to upper-class status; declared music major, permission of instructor. (F,S)—(445-Violin) (446-Viola) (447-Cello) (448-Bass) (449-Flute). Repeatable (4)

MUS 454 Jazz Ensemble IV (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the jazz ensemble. Additional rehearsals and performances are required. (Level IV). Prerequisite: permission of instructor. (F,S) Repeatable (2)

MUS 455-459 Applied Music, Major 2(0-1)
In-depth applied study in various performance areas for the Senior music major. Prerequisite: admission to upper-class status; declared music major, permission of instructor. (F,S)—(455-Oboe) (456-Bassoon) (457-Clarinet) (458-Saxophone) (459-Voice). Repeatable (4)

MUS 460-469 Applied Music, Major 2(0-1)
In-depth applied study in various performance areas for the Senior music major. Prerequisite: admission to upper-class status; declared music major, permission of instructor. (F,S)—(460-Trumpet) (461-French Horn) (462-Trombone) (463-Euphonium) (464-Tuba) (465-Percussion) (466-Piano) (467-Organ) (468-Classical Guitar) (469-non-Classical Guitar). Repeatable (4)

MUS 470-489 Senior Recital 2(0-1)
In-depth applied study in various performance areas for the Senior music major, leading to the performance of a solo or joint recital (see Music Student Handbook). Prerequisite: admission to upper-class status; faculty approval; permission of instructor. (F,S)—(470-Violin) (471-Viola) (472-Cello) (473-Bass) (474-Flute) (475-Oboe) (476-Bassoon) (477-Clarinet) (478-Saxophone) (479-Voice) (480-Trumpet) (481-French Horn) (482-Trombone) (483-Euphonium) (484-Tuba) (485-Percussions) (486-Piano) (487-Organ) (488-Classical Guitar) (489-non-Classical Guitar).

MUS 491 Special Topics (1-4 VAR)
Prerequisite: permission of instructor. (F,S,SS) Repeatable

MUS 495 Independent Study (1-4 VAR) (*)

MUS 498 Internship 1(0-1)
Provides an infield, firsthand experience in traditional church music programs. Prerequisite: permission of instructor. (F,S) Repeatable (3)

GRADUATE COURSES

MUS 501 Special Methods in Music Ed 3(3-0)
In-depth study of techniques and materials for teaching music in the elementary and middle school. Involvement in research and practical application of approved methods. Prerequisite: graduate standing. (*) Repeatable

MUS 502 Concert Choir V (.5-1 VAR) (0-2)
Primary ensemble for vocal majors, specializing in the rehearsal, study, and public performance of advanced choral literature. Additional rehearsals and performance activities required. (Graduate level) Prerequisite: instructor permission. (F,S) Repeatable (4)

MUS 504 Collaborative Music Ensemble V (.5-1 VAR) (0-2)
Ensemble specializing in small chamber works for piano, winds, strings, in various combinations. Prerequisite: permission of instructor. (*) Repeatable (2)

MUS 509 Chamber Choir V (.5-1 VAR) (0-2)
Primary ensemble for vocal majors, specializing in the rehearsal, study, and public performance of advanced choral literature. Additional rehearsals and performance activities required. (Graduate level) Prerequisite: permission of instructor. (F,S) Repeatable (4)

MUS 512 Wind Ensemble V (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of appropriate literature for the wind band. Additional rehearsals and performances are required. (Graduate level) Prerequisite: instructor permission. (F,S) Repeatable (4)

MUS 513 Advanced Vocal Pedagogy 1(0-1)
Designed for the experienced vocal music teacher who seeks graduate-level pedagogical techniques to better guide and develop the adolescent voice. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 520 Graduate Music Ensemble (.5-1 VAR) (0-2)
Secondary ensembles specializing in the rehearsal, study, and public performance of specific genres, i.e., jazz, chamber music. (Graduate level) Prerequisite: permission of instructor. (*) Repeatable (4)

MUS 523 Advanced Percussion Pedagogy 1(0-1)
Designed for the experienced instrumental music teacher who seeks graduate-level pedagogical techniques to improve students' achievement in playing instruments of the percussion family. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 529 Piano Proficiency Completion 1(0-.5)
One-half hour private lesson per week to prepare for an complete the departmental Piano Proficiency Exam. Permission of instructor required. (S/U grading) (F,S)

MUS 530 Marching Band V (.5-1 VAR) (0-6)
Provides functional music at home football games and select special occasions while serving as a laboratory of learning for future music educators. Prerequisite: instructor permission. (F) Repeatable (2)

MUS 531 Pep Band V (.5-1 VAR) (0-2)
Provides functional music at various home athletic events and select special occasions while serving as a laboratory of learning for future music educators. (*) Repeatable (2)

MUS 533 Advanced String Pedagogy 1(0-1)
This course expands upon the basics of string pedagogy and literature. Includes discussion of problems and possible solutions in student playing techniques. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (*)

MUS 540 Kodály Method for Elementary Music 3(3-0)
Graduate study in teaching music to young children. Students will create teaching aids and increase their own solfege proficiency. Primarily for teachers of general music. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 543 Advanced Woodwind Pedagogy 1(0-1)
Designed for the experienced instrumental music teacher who seeks advanced techniques in the teaching and playing of woodwind instruments. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 544 Orchestra V (.5-1 VAR) (0-2)
Rehearsal, study, and public performance of selected appropriate literature for the full orchestra. Additional rehearsals and activities are required. (Level V) Prerequisite: instructor permission. (F,S) Repeatable (4)

MUS 545 Current Issues in Music Education 3(3-0)
History and philosophy of music education in public schools, with readings, discussions, and practical applications of content standards in instruction and assessment. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 550 Instrumental Conducting 2(2-0)
Graduate level instruction in instrumental conducting in a pedagogical setting with emphasis on selection of appropriate literature as well as technique. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 553 Advanced Brass Pedagogy 1(0-1)
Designed for the experienced instrumental music teacher who seeks graduate-level pedagogical techniques to improve students' achievement in playing instruments of the brass family. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 559 Advanced Music Analysis 3(3-0)
Analytical study of selected varied compositions, primarily from the perspective of a school ensemble conductor. Includes instructional strategies and criteria for selecting appropriate quality literature. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS)

MUS 560 Choral Conducting 2(2-0)
Graduate level instruction in choral conducting in a pedagogical setting with emphasis on selection of appropriate literature as well as technique. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (SS*)

MUS 565 Methods of Research in Music ED 3(3-0)
This course provides a broad foundation in research design and methodologies for graduate students in music education. Quantitative and qualitative analytical procedures are introduced. Prerequisite: bachelor's degree and teaching certificate, or approval of the Music Department Chair. (*)

MUS 570 Advanced Applied Music, Strings 2(0-1)
In-depth applied study in guitar or orchestral string performance areas for the highly advanced student. Prerequisite: permission of instructor. (*) Repeatable (4)

MUS 571 Advanced Applied Music, Woodwinds 2(0-1)
In-depth applied study in woodwind performance areas for the highly advanced student. Prerequisite: permission of instructor. (*) Repeatable (4)

MUS 572 Advanced Applied Music, Percussion 2(0-1)
In-depth applied study in percussion performance for the highly advanced student. Prerequisite: permission of instructor. (*) Repeatable (4)

MUS 573 Advanced Applied Music, Brass 2(0-1)
In-depth applied study in brass performance areas for the highly advanced student. Prerequisite: permission of instructor. (*) Repeatable (4)

MUS 574 Advanced Applied Music, Voice 2(0-1)
In-depth applied study in vocal performance for the highly advanced student. Prerequisite: permission of instructor. (*) Repeatable (4)

MUS 579 Graduate Recital 2(0-1)
In-depth advanced applied study leading to the performance of a solo or joint recital. Prerequisite: permission of instructor. (F,S)

MUS 580 Advanced General Music Methods 2(2-1)
Advanced, comprehensive study in materials, techniques, methods, and problem-solving techniques for the teacher of general music in the public schools. Prerequisite: admission to Teacher Education Program. (F)

MUS 581 Advanced Choral Methods 2(2-1)
Advanced, comprehensive study in materials, techniques, methods, and problem-solving techniques for the teacher of choral music in the public schools. Prerequisite: Admission to Teacher Education Program. (S)

MUS 582 Advanced Instrumental Methods 2(2-1)
Advanced, comprehensive study in materials, techniques, methods, and problem-solving techniques for the teacher of choral music in the public schools. Prerequisite: admission to Teacher Education Program (S)

MUS 591 Special Topics (1-3 VAR)
Prerequisite: graduate standing. (*) Repeatable

MUS 593 Seminar (1-3 VAR)
Practical application of current music techniques to secondary teaching. Prerequisite: graduate standing. (*) Repeatable

MUS 594 Field Experience 6(0-6)
Field experience in an educational setting. Prerequisite: permission of instructor. (F,S,SS)

MUS 595 Independent Study (1-4 VAR)
Prerequisite: permission of instructor. (F,S,SS) Repeatable

NURSING (NSG)

UNDERGRADUATE COURSES

NSG 207 Nursing Pathophysiology 3(3-0)
Introduces basic disease processes of individual body systems. Incorporates nursing assessment/diagnosis with associated intersystem diseases utilizing evidence-based practice and patient-centered, safe care. Prerequisite: BIOL 223/L, BIOL 224/L with grades of C or better. (F,S)

NSG 230 (WS 230) Women, Health and Society 3(3-0)
Introduction to women's health issues and a basic understanding of how women's health has been influenced historically, culturally and by socio-economic factors. (F,S)

NSG 231 Concepts for Professional Nursing 2(2-0)
Introduces nursing history, theory, and key concepts related to healthcare and professional integrity and leadership. (S,SS)

NSG 232 Fundamentals of Nursing Care 3(3-0)
Utilizes the nursing process to provide safe, patient-centered care. Emphasizes teamwork, collaboration, evidence-based practice, and quality improvement. (S,SS)

NSG 232L Fundamentals of Nursing Care Lab 4(0-8)
Application of NSG 232. Assists students to develop fundamental competencies to provide safe, evidenced-based patient-centered care. (S/U grading) (S,SS)

NSG 291 Special Topics (1-4 VAR)
Topics and/or nursing skills for enrichment of required nursing courses, and which serve the interest of student, will be considered. (*) Repeatable

NSG 295 Independent Study (1-6 VAR) (*) Repeatable

NSG 302 Health Promotion and Assessment 2(2-0)
Utilizes evidence-based practice to assess, analyze and promote health in diverse populations across the lifespan. (S,SS)

NSG 302L Health Promotion and Assessment Lab 1(0-2)
Fosters evidence-based practice and clinical judgment to develop comprehensive assessment skills across the lifespan. (S/U grading) (S,SS)

NSG 305 Ethical Issues in Health Care 3(3-0)
Introduces evidence-based theories which influence ethical issues in health care. (*)

NSG 307 Health and Disease Systems 3(3-0)
Integrates basic disease processes with nursing assessment/diagnosis utilizing evidence-based practice and patient-centered, safe care. Prerequisite: BIOL 223/223L, BIOL 224/224L with grades of C or better; and NSG 232/232L with grades of B or better. (F,S)

NSG 308 Pharmacology in Nursing Practice 3(3-0)
Applies pharmacokinetics, pharmacodynamics, and pharmacotherapeutics to patient-centered care. Focuses on safety, legal implications and evidence-based practice. (F,SS)

NSG 309 Professional Nursing Practice 4(4-0)
Introduces registered nurses to mission and philosophy of the nursing program, professional practice and personal growth. Utilizes concepts of evidence-based, patient-centered care. (F)

NSG 311 Concepts for Professional Nursing 4(4-0)
Synthesizes concepts and patterns of knowledge for professional role transition of registered nurses in an evolving healthcare delivery system. Focuses on evidenced-based best practices. (S)

NSG 312 Caring for Childbearing Family 3(3-0)
Introduces safe, patient-centered care of the neonate and procreative family during the peri-natal period. Includes health promotion, high risk management, safety and human sexuality. (F,S)

NSG 312L Caring for Childbearing Family Lab 3(0-6)
Application of NSG 312. Provides evidence-based, patient-centered care to the neonate and family throughout the peri-natal period. (S/U grading) (F,S)

NSG 322 Caring for Adults I 4(4-0)
Integrates assessment, pharmacology and pathophysiologic concepts utilizing evidence-based practice to provide safe, patient-centered care to adults with acute and chronic health concerns. (F,S)

NSG 322L Caring for Adults I Lab 4(0-8)
Application of NSG 322. Provides evidence-based, patient-centered care to adults and families based upon best practices. (S/U grading) (F,S)

NSG 331 Healthy Aging 2(2-0)
Utilizes evidence-based practice theories to promote healthy aging and patient-centered care of older adults. (S,SS)

NSG 332 Caring for Children/Families 3(3-0)
Introduces patient-centered care of children, adolescents and their families. Emphasizes evidence-based practice related to health promotion, safety and disease management. (F,S)

NSG 332L Caring for Children/Families Lab 3(0-6)
Application of NSG 332. Provides evidence-based, patient-centered care of children, adolescents, and families. (S/U grading) (F,S)

NSG 351 Evidence Based Nursing Practice 3(3-0)
Critically analyzes and applies nursing research to practice. Uses evidence-based practice to promote continuous quality improvement and patient-centered care. Prerequisite: MATH 156 with grade of C or better. (S)

NSG 371 Healthcare Informatics 2(2-0)
Introduces theory, infrastructure and ethical application of health informatics for the delivery of safe, effective, efficient, and quality patient-centered care. (S)

NSG 372 Clinical Practicum I 3(0-9)
Provides an opportunity for a concentrated clinical practicum with instructor approval. Prerequisite: NSG 308, NSG 312, NSG 322, NSG 331, NSG 332, NSG 351, NSG 371, NSG 382.(A grade of B or better is required for prerequisite courses.) (S/U grading) (SS/*) Repeatable (6)

NSG 382 Dynamics of Behavioral Health 3(3-0)
Introduces evidence-based concepts focusing on mental health promotion and disease specific patient-centered care. (F,S)

NSG 382L Dynamics of Behavioral Health Lab 3(0-6)
Application of NSG 382. Provides evidence-based, patient-centered care in behavioral health settings. (S/U grading) (F,S)

NSG 391 Special Topics (1-5 VAR)
Prerequisite: permission of instructor. (*) Repeatable

NSG 408 Synthesis of Pharmacologic Concepts 2(2-0)
Synthesizes pharmacological concepts and prototype agents with focus on the physiological action, effect and utilization of selected drug groups in evidence-based practice. Pre or corequisite: NSG 420. .(A grade of B or better is required for prerequisite courses.) (S)

NSG 420 Caring for Adults II 4(4-0)
Integrates assessment, pharmacology and pathophysiology concepts using evidence-based practice to provide patient-centered care to adults with complex health concerns. (F,S)

NSG 420L Caring for Adults II Lab 4(0-8)
Application of NSG 420. Provides patient centered care to adults and families utilizing evidence-based practice. Emphasizes teamwork and collaboration for multiple patients. (S/U grading) (F,S)

NSG 431 Gerontological Nursing 3(3-0)
Synthesize evidence-based practice theories and integrates concepts of healthy aging to promote patient-centered care of older adults by allied health professionals. (*)

NSG 442 Global Public Health 3(3-0)
Synthesizes theory, research, epidemiological and public health principles into planning interventions to meet the multi-dimensional health needs of a diverse, global society. (F,SS)

NSG 442L Global Public Health Lab 3(0-6)
Application of NSG 442. Provides population-focused care in community health settings. (S/U grading) (F,SS)

NSG 451 Nursing Leadership and Issues 3(3-0)
Analyzes management and leadership theories. Explores issues related to quality improvement, evidence-based practice, professional integrity/leadership and teamwork/collaboration. (S,SS)

NSG 452 Comprehensive Nursing Practice 4(4-0)
Prepares for transition into professional nursing practice. Integrates patient-centered care concepts for a variety of health needs across the lifespan. (S,SS)

NSG 452L Comprehensive Nursing Practice Lab 5(0-10)
Application of NSG 452. Manages multiple, complex patients in a variety of health care settings utilizing evidence-based practice. Emphasizes integrity, leadership, team work and collaboration. (S/U grading) (S,SS)

NSG 472 Clinical Practicum II 3(0-9)
Provides an opportunity for a concentrated clinical specialty practicum with instructor approval. Prerequisite: NSG 372. (S/U grading) (S) Repeatable (6)

NSG 491 Special Topics (1-6 VAR) (*) Repeatable

NSG 492 Research 2(2-0)
Faculty-directed research project for undergraduate student. Prerequisite: NSG 351 with a grade of B or better. (*)

NSG 495 Independent Study (1-6 VAR) (*) Repeatable

GRADUATE COURSES

NSG 504 NSG Writing & Presentation Skills 1(1-0)
This course prepares students to organize research and ideas, polish grammar and writing style, and present research in paper and conference format. (F)

NSG 506 Roles, Ethics & Issues 3(2.5-2)
Explores advanced nursing practice roles and competencies emphasizing clinical quality, safety and ethical issues. Clinical hours required. (F)

NSG 508 Advanced Practice Theory 3(3-0)
Examines the theoretical basis of nursing which guides evidence-based advanced nursing practice, research, education, and administration. (F)

NSG 550 Health Policy & Finance 3(3-0)
Analyze and utilize the historical, political, economic, and financial concepts in the development of one's practice and the advanced practice role. (SS)

NSG 551 Health Promotion 2(2-0)
Analyzes concepts of health promotion related to delivery of evidence-based patient-centered care in advanced nursing practice. (F)

NSG 552 Advanced Pathophysiology 3(3-0)
Examines alterations in human physiologic function in diverse populations across the lifespan using evidence-based practice principles. (S)

NSG 561 Advanced Pharmacology 3(3-0)
Applies pharmacological concepts in the management of patients across the lifespan within the scope of evidence-based advanced nursing practice. (SS)

NSG 562 Advanced Assessment 2(2-0)
Enhances assessment skills across the lifespan within the scope of evidence-based advanced nursing practice. Corequisite: NSG 562L. (S)

NSG 562L Advanced Assessment Lab 1(0-2)
Demonstrates assessment skills across the lifespan within the scope of evidence-based advanced nursing practice. Corequisite: NSG 562. (S/U Grading) (S)

NSG 570 Advanced Evidence Based Practice 3(3-0)
Utilizes analytical methods and disciplined inquiry to expand knowledge for implementation of a safe and quality evidence-based advanced nursing practice. (S)

NSG 571 Healthcare Informatics 2(2-0)
Analyzes theory, infrastructure and ethical application of health informatics for the delivery of quality advanced nursing practice. (S)

NSG 575 Curriculum Development 2(2-0)
Focuses on theories and processes of nursing curriculum development from an evidence-based practice foundation. (F)

NSG 576 Instructional Strategies 3(3-0)
Explores evidence-based practice learning theories and instructional strategies for teaching nursing in a variety of settings. (F)

NSG 577 Assessment & Evaluation 2(2-0)
Focuses on understanding and applying formal and informal assessment and evaluation strategies in order to implement data-driven instruction. (F)

NSG 583 Nurse Educator Seminar 3(3-0)
Synthesizes nurse educator theory and competencies into evidence-based teaching practices. Corequisite: NSG 583L. (S)

NSG 583L Nurse Educator Practicum 6(0-18)
Applies nurse educator theory and competencies in a variety of educational settings. Corequisite: NSG 583. (S/U grading) (S)

NSG 587 Synthesis Experience 9(3-24)
Synthesizes theory into practice based on specialty competencies and advanced practice clinical requirements. This course may need to be repeated based on specialization. (F,S,SS)

NSG 590 Special Projects (1-3 VAR)
Individual project selected, outlined and pursued by student. Prerequisite: graduate standing and advisor approval. (S/U grading) (*) Repeatable

NSG 591 Special Topics (1-6 VAR) (*) Repeatable (6)

NSG 593 Thesis Seminar 3(3-0)
Creates an advanced nursing practice research proposal as the first step in thesis development. (S/U grading) (S)

NSG 595 Independent Study (1-6 VAR) (*) Repeatable

NSG 599 Thesis Research (1-6 VAR)
Preparation of thesis to meet degree requirements. Must be enrolled each semester in at least one credit hour if thesis is still in process. (S/U grading). Prerequisite: NSG 593 and approval by thesis advisor. (*) Repeatable

NSG 610 Diagnostic Reasoning 2(2-0)
Focuses on diagnostic reasoning and problem solving for the advanced practice nurse. (SS)

NSG 612L Acute Care Skills Lab 2(0-4)
Applies advanced practice nursing skills for the FNP & ACNP. (S/U grading) (F)

NSG 620 Acute Care Adult/Gerontology I 2(2-0)
Examines the advanced practice nurse's role in patient-centered care of adult and geriatric populations with chronic health needs. Corequisite: NSG 620L. (F)

NSG 620L Acute Care Adult/Gero Practicum I 4(0-12)
Explores the advanced practice nurse's role in patient-centered care of adult and geriatric populations. Corequisite: NSG 620. (S/U grading) (F)

NSG 621 Acute Care Adult/Gerontology II 4(4-0)
Examines the advanced practice nurse's role in patient-centered care of adult and geriatric population with acute health needs. Corequisite: NSG 621L. (S)

NSG 621L Acute Care Adult/Gero Practicum II 4(0-12)
Applies the advanced practice nurse's role in patient-centered care of adult and geriatric populations. Corequisite: NSG 621. (S/U grading) (S)

NSG 622 Acute Care Adult/Gerontology III 4(4-0)
Examines the advanced practice nurse's role in patient-centered care of adult and geriatric populations with emergent health needs. Corequisite: NSG 622L. (SS)

NSG 622L Acute Care Adult/Gero Practicum III 4(0-12)
Synthesizes the advanced practice nurse's role in patient-centered care of adult and geriatric populations. Corequisite: NSG 622. (S/U grading) (SS)

NSG 631 Family I 2(2-0)
Introduces primary care management for the family across the lifespan. Corequisite: NSG 638L. (F)

NSG 632 Family II 2(2-0)
Explores primary care management for families across the lifespan with acute health needs. Corequisite: NSG 638L. (S)

NSG 633 Family III 2(2-0)
Explores primary care management for families across the lifespan with chronic health needs. Corequisite: NSG 638L. (SS)

NSG 638L Family Practicum (1-11 VAR)
Engages students in primary care management for the family across the lifespan. Corequisite: NSG 631 or 632 or 634 or completion of all 3. (S/U grading) (F,S,SS)

NSG 676 Theoretical Mental Health Models 2(2-0)
Explores theories and conceptual models which frame psychiatric-mental health interventions. (F)

NSG 677 Psychopharmacology 2(2-0)
Applies psychopharmacological concepts in the management of psychiatric-mental health patients across the lifespan. (F)

NSG 678 Psychiatric Assessment & Evaluation 2(2-0)
Analyzes techniques of assessment and evaluation utilizing standard diagnostic criteria. (SS)

NSG 679 Psychiatric Differential Diagnosis 2(2-0)
Focuses on diagnostic reasoning and problem solving for the psychiatric-mental health advanced practice nurse. (SS)

NSG 681 Psych Mental Health I 2(2-0)
Applies theory and evidenced-based practice to the care of the psychiatric-mental health patient across the lifespan. (F)

NSG 681L PMH Practicum I 4(0-12)
Explores the advanced practice nurse's role in patient-centered care of psychiatric-mental health patients across the lifespan. Corequisite: NSG 681. (S/U grading) (F)

NSG 682 Psych Mental Health II 4(4-0)
Analyzes the health care management of the psychiatric-mental health patient across the lifespan utilizing evidence-based guidelines. (S)

NSG 682L PMH Practicum II 4(0-12)
Applies the advanced practice nurse's role to patient-centered care of psychiatric-mental health patients across the lifespan. Corequisite: NSG 682. (S/U grading) (S)

NSG 683 Psych Mental Health III 4(4-0)
Analyzes complex health care management of the psychiatric-mental health patient across the lifespan utilizing evidence-based guidelines. (S)

NSG 683L PMH Practicum III 4(0-12)
Synthesizes the advanced practice nurse's role while providing patient-centered care of psychiatric-mental health patients across the lifespan. Corequisite: NSG 683. (S/U grading) (S)

PHILOSOPHY (PHIL)

UNDERGRADUATE COURSES

PHIL 102 Philosophical Literature 3(3-0)
Philosophical literature that focuses on such questions as what is the nature of reality, how do we know what we know, and for what kind of life should we strive. (F,S) (Gen Ed: H, GT-AH3)

PHIL 120 Islam and Non-Western Religions 3(3-0)
A study of major world religions including Buddhism, Confucianism, Hinduism, Islam, Jainism, Sikhism, Shinto, Taoism, Zoroastrianism. (*) (Gen Ed: H, GT-AH3) (CC)

PHIL 201 Classics in Ethics 3(3-0)
The logic of objective norms and standards of "good" vs. "bad," "right" vs. "wrong," from major philosophers and classics of literature. Application to contemporary issues. (F,S) (Gen Ed: H, GT-AH3)

PHIL 204 Critical Reasoning 3(3-0)
Survey of the general principles of correct reasoning with emphasis on the role of language in the reasoning process. Major concern with induction and fallacy detection. (F,S) (Gen Ed: H, GT-AH3)

PHIL 205 Deductive Logic 3(3-0)
Study of the principles and methods used to distinguish valid from invalid patterns of deductive reasoning. Especially useful for students in computer- or mathematics related fields.(*) (Gen Ed: H, GT-AH3)

PHIL 280 The Ancients: Person, Polis, Cosmos 3(3-0)
Exploration of the ancient origins of Western philosophy with an emphasis on the Presocratics, the Sophists, Socrates, Plato and Aristotle. (*)

PHIL 291 Special Topics (1-3 VAR)
Students who have an area of special interest are encouraged to contact the department. Special topics and authors of philosophical interest. May be repeated for 12 credits maximum.(*) Repeatable (12)

PHIL 295 Independent Study (1-3 VAR)
Specialized study of select persons, ideas, schools, historical trends or problems in philosophy. May be repeated up to 9 credits. Prerequisite: permission of instructor. (*) Repeatable (9)

PHIL 380 The Moderns: Science, Self, State 3(3-0)
Exploration of intellectual revolutions in 16th – early 19th century Europe as represented in thinkers such as Hobbes, Descartes, Locke, Hume, Rousseau, and Kant. (*)

PHIL 491 Special Topics (1-3 VAR)
Special topics and authors of philosophical interest. May be repeated for 12 credits maximum. More advanced than PHIL 291. Students who have an area of special interest are encouraged to contact the department. (*) Repeatable (12)

PHIL 480 Continental Thought 3(3-0)
European thought of the 19th and 20th centuries including existentialism, critical theory, and postmodernism; discussion of thinkers such as Nietzsche, Heidegger, Sartre, Adorno, and Foucault. (*)

PHIL 485 American Pragmatism and its Legacy 3(3-0)
An examination of pragmatism from its roots in transcendentalism and evolutionary thought to its zenith in Peirce, James, and Dewey, and its contemporary legacy. (*)

PHIL 495 Independent Study (1-3 VAR)
Specialized study of select persons, ideas, schools, historical trends or problems in philosophy. May be repeated up to 9 credits. Prerequisite: permission of instructor. (*) Repeatable (9)

PHYSICS/PHYSICAL SCIENCE (PHYS)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

PHYS 110 Astronomy 3(3-0)
Solar system, including motions of the planets, eclipses, and satellite exploration; classification and evolution of stars; clusters, nebulae, galaxies and the expanding universe. Pre or corequisite: satisfactory placement score or MATH 098. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 110L Astronomy Lab 1(0-2)
Laboratory course to accompany PHYS 110. Pre or corequisite: PHYS 110. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 140 Light, Energy, and the Atom 3(3-0)
A non-mathematical approach to light, energy sources, conservation, atoms, nuclei and nuclear radiation. Emphasis on phenomena encountered in everyday life or that affect public policy. Pre or corequisite: satisfactory placement score or MATH 098. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 140L Light, Energy and the Atom Lab 1(0-2)
Optional laboratory to accompany PHYS 140. Experiments in light, solar energy, atomic and nuclear physics with emphasis on qualitative understanding of observations. Pre or corequisite: PHYS 140. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 145 A survey of Global Energy Resources 3(3-0)
Explore the ways we use energy, from whence it comes and the science behind devices that produce it and transform it to its various forms. Prerequisite: MATH 099 or satisfactory placement exam score. (*) (Gen Ed: ST)

PHYS 145L A Survey of Energy Resources Lab 1(0-2)
The lab will reinforce and extend student understanding of energy concepts. Prerequisite: MATH 099 or satisfactory placement exam score. Corequisite: PHYS 145. (*) (Gen Ed: ST)

PHYS 150 (CHEM 150) Elementary Concepts in Physics and Chemistry 4(3-2)
Hands-on standards-based approach to understanding basic concepts of physics and chemistry. Integrated lecture, lab and discussion periods. Recommended: enrollment in the Teacher Education Program. (F,S,SS)

PHYS 201 Principles of Physics I 3(3-0)
Motion, forces, conservation of energy and momentum, wave motion, sound and heat. For engineering technology, life sciences, and other interested students. Prerequisite: satisfactory math placement score or MATH 121. Pre or corequisite: PHYS 201L. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 201L Principles of Physics I Lab 1(0-2)
Pre or corequisite: PHYS 201. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 202 Principles of Physics II 3(3-0)
Electrostatics, electromagnetism, light, atomic and nuclear physics. Prerequisite: PHYS 201. Pre or corequisite: PHYS 202L. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 202L Principles of Physics II Lab 1(0-2)
Pre or corequisite: PHYS 202. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 221 General Physics I 4(4-0)
Newtonian mechanics, including linear and rotational dynamics, momentum, energy, gravitation, fluid mechanics, wave motion and thermodynamics. Uses the calculus and vector notation. For majors in physics, mathematics, geoscience, engineering and chemistry. Prerequisite: MATH 126. Pre or corequisite: PHYS 221L. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 221L General Physics I Lab 1(0-2)
Pre or corequisite: PHYS 221. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 222 General Physics II 4(4-0)
Electrostatics, electromagnetism, elementary circuits, electrical oscillations, geometrical optics and the wave aspects of light. Prerequisite: PHYS 221. Corequisite: PHYS 221 and 222L. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 222L General Physics II Lab 1(0-2)
Corequisite: PHYS 222. (F,S,*) (Gen Ed: ST, GT-SC1)

PHYS 291 Special Topics (1-4 VAR) (*) Repeatable

PHYS 293 Seminar 1(1-0)
The student attends at least 11 Physics Seminar presentations or other approved presentations and then presents a public seminar presentation on some approved physics-related topic. (*) Repeatable

PHYS 301 Theoretical Mechanics 4(4-0)
Statics and dynamics of particles and rigid bodies. Conservation principles, minimum principles, accelerated coordinate systems, Lagrangian and Hamiltonian methods, vector and matrix methods. Prerequisite: PHYS 221, MATH 325 and MATH 337. (F,E)

PHYS 321 Thermodynamics 3(3-0)
Introduction to thermodynamic laws and principles, entropy, kinetic theory and statistical mechanics. Prerequisite: PHYS 221. (F,E)

PHYS 322 Advanced Laboratory- Heat 1(0-2)
Experiments in heat of combustion, heat transfer, thermal electromotive force, viscosity, and specific heat measurements. Prerequisite or corequisite: PHYS 321. (F,E)

PHYS 323 General Physics III 4(4-0)
Introduction to special relativity, kinetic theory, quantization, wave mechanics, atomic structure, nuclear physics and spectroscopy. Prerequisite: PHYS 222/222L and MATH 224. Pre or corequisite: PHYS 323L. (S)

PHYS 323L General Physics III Lab 1(0-2)
Pre or corequisite: PHYS 323. (S)

PHYS 341 Optics 3(3-0)
Geometrical optics, interference, diffraction, polarization of light, optical properties of materials, optical sources including lasers, and holography. Prerequisite: PHYS 222/222L and MATH 325. (F,O)

PHYS 342 Advanced Laboratory-Optics 1(0-2)
Experiments in interference, diffraction, absorption, spectral characteristics and polarization of light. Prerequisite or corequisite: PHYS 341. (F,O)

PHYS 431 Electricity and Magnetism 4(4-0)
Mathematical treatment of electrostatics, currents, magnetism, electromagnetic induction, Maxwell's equations and electrodynamics. Prerequisite: PHYS 222/222L, MATH 325 and 337. (S,E)

PHYS 432 Advanced Laboratory-Electricity and Magnetism 1(0-2)
Experiments in electrostatic constants, magnetic effects, capacitance, thermoelectric effects, magnetic properties, inductance, mutual inductance, and production, propagation and diffraction of microwaves. Prerequisite or Corequisite: PHYS 431. (S,E)

PHYS 441 Quantum Mechanics 4(4-0)
Wave packets, operators, the Schroedinger equation, eigenstates, angular momentum, spin, magnetic moments, Heisenberg formulation. Prerequisite: PHYS 323/323L, MATH 325 and 337. (S,O)

PHYS 480 Practicum in Laboratory Instruction 1(0-2)
Participation in laboratory instruction under the guidance of a staff member. Includes instruction on laboratory safety. May be repeated for a maximum of two credits. (F,S) Repeatable (2)

PHYS 491 Special Topics (1-4 VAR) (*) Repeatable

PHYS 492 Research 1(0-2)
Prerequisite: eight credits in upper-division physics courses. (F,S) Repeatable

PHYS 493 Seminar 1(1-0)
Class members report on recently published work or on their own research in physics or applied physics. May be repeated for a maximum of two credits. Prerequisite: advanced standing with a major or minor in physics. (S,O) Repeatable (2)

PHYS 495 Independent Study (1-2 VAR)
Prerequisite: junior or senior standing; permission of department chair. (*) Repeatable

PHYS 498 Internship (1-6 VAR)
Work experience using the discipline of physics under the direction of the selected organization and a faculty member. Prerequisite: junior or senior standing and permission of the department chair.(S/U grading) (*) Repeatable

PHYS 499 Thesis Research 1(1-0)
Students write a research paper describing their own research. Prerequisite: senior standing in the department. (F,S) Repeatable

PRESIDENT'S LEADERSHIP PROGRAM (PLP)

UNDERGRADUATE COURSES

PLP 160 Principles of Leadership 3(3-0)
Study of leadership theories and principles. The course emphasizes components of leadership, gender, ethnic diversity in leadership styles, organizational forms, and personal capacity for leadership. Prerequisite: acceptance into President's Leadership Program. (F)

PLP 260 Leadership in Service Organizations 3(2-2)
Lecture/experiential course outlining leadership practices through service learning in community settings. Open to PLP students only. Prerequisite: PLP 160 with a grade of C or better, enrollment in PLP. (F)

PLP 360 Applied Leadership 3(3-0)
Leadership in action course applying needs assessments, analysis, strategy development, implementation and evaluation to a team project in private, public or nonprofit sector. PLP required. Prerequisite: PLP 260 with a grade of C or better, enrollment in PLP. (F)

PLP 460 Working with Experienced Leaders 3(1-4)
Lecture/practicum course assigning students to leader mentorship in public, private, or government sector. Leadership issues and challenges in a structured, but applied setting. Prerequisite: PLP 360 with a grade of C or better, enrollment in PLP. (F,S,SS)

PLP 489 Field Placement in Leadership 3(0-3)
A semester-long internship where students take on a supervised leadership role within an organization. Prerequisite: PLP 160, PLP 260, and PLP 360 with grades of C or better. Corequisite: student must be enrolled in President's Leadership Program. (F,S,SS)

PLP 491 Special Topics (1-3 VAR)
Special topics are offered to students in areas where regular course offerings are not available. Prerequisite: junior or senior standing and permission of instructor. (*)

POLITICAL SCIENCE (POLSC)

UNDERGRADUATE COURSES

POLSC 101 American National Politics 3(3-0)
Basic processes in American politics. Principles and structure of national governments. (*) (Gen Ed: SS, GT-SS1)

POLSC 102 State and Local Government and Politics (3-0)
Behavioral aspects, government organization and inter-relationships of state and local politics, relations with federal government and other states. Special attention to Colorado government. (S)

POLSC 105 (PSYCH, SOC, WS 105) Understanding Human Diversity 3(3-0)
Americans live in a complex and diverse society. This course examines the nature, impact and strategies for dealing with diversity in personal and social contexts. (*)

POLSC 106 Minority Politics in America 3(3-0)
An overview of the historical and contemporary struggles for empowerment by groups traditionally excluded from full societal participation because of racial designation. (*)

POLSC 201 International Relations 3(3-0)
Introduction to international relations and world politics. Focuses on global political issues, including conflict, war, political economy, environmental politics and globalization. (F,S) (Gen Ed: SS, GT-SS1) (CC)

POLSC 202 Comparative Politics 3(3-0)
Introduction to comparative political analysis through study of selected political systems. Emphasis on basic political functions and processes in developed countries. (S) (Gen Ed: SS) (CC)

POLSC 250 Research Methods in Political Science 3(3-0)
Introduction to the basic methods and tools of research in political science, including the scientific method, research design, data collection and qualitative and quantitative analysis. (F)

POLSC 270 Introduction to Homeland Security 3(3-0)
An overview of homeland security, key threats, challenges and potential responses. (F)

POLSC 271 Terrorism 3(3-0)
An examination of extremist groups and private violence in the context of monitoring, prevention, and responses. (S)

POLSC 272 Critical Incident Management 3(3-0)
The policies and practices of local first responders, inter-agency relationships, political violence and unconventional weapons. (F)

POLSC 291 Special Topics (1-3 VAR)
Study of political events. Prerequisite: permission of instructor. (*) Repeatable

POLSC 300 Political Parties and Elections 3(3-0)
Examines the organization and function of political parties and the roles of political parties, pressure groups, and public opinion in American elections. (F)

POLSC 305 Causes of War 3(3-0)
Study of theories related to the cause of war. Emphasis on international warfare, competing domestic and international pressures, and case study analysis. Prerequisite: POLSC 201 or permission of instructor. (S)

POLSC 306 Peace Studies 3(3-0)
Study of violent conflict prevention, mitigation, and resolution. Emphasis on international law, peacekeeping, peace building, ethics, non-violent organization, and independent research. Prerequisite: POLSC 201 or permission of instructor. (F)

POLSC 321 American Constitutional Development 3(3-0)
Political context of the origin of the U.S. Constitution, Supreme Court procedures, court decisions defining uses and scope of the powers of the court, the Congress and the presidency. Prerequisite: POLSC 101 or permission of instructor. (F)

POLSC 322 American Constitutional Law 3(3-0)
Survey of American constitutional law; emphasis on Supreme Court decisions defining the extent and limits and of governmental authority and the rights and liberties of individual citizens. Prerequisite: POLSC 321 or permission of instructor. (S)

POLSC 323 Criminal Law and Procedure 3(3-0)
Content and characteristics of criminal law and procedures. Roles and functions of persons and agencies involved in judicial administration. Prerequisite: POLSC 101 or permission of instructor. (F)

POLSC 324 Family Law 3(3-0)
Survey of legal issues concerning domestic relations; Supreme Court decisions and legislative enactments. Prerequisite: POLSC 101 or permission of instructor. (S)

POLSC 330 Introduction to Public Administration 3(3-0)
Role of public bureaucracy in modern society. Principles and processes of public administration, personnel management and administrative responsibility. Prerequisite: POLSC 101 or permission of instructor. (*)

POLSC 340 Public Policy 3(3-0)
Introduces the process of formulation, implementation, and evaluation of public policy. Examines program development and execution in the context of political, economic, and institutional environments. Prerequisite: POLSC 101 or permission of instructor. (*)

POLSC 370 Western Political Thought 3(3-0)
Systematic survey of political thought from beginnings in Ancient Near East to present. Emphasis on contributions relevant to contemporary political theory. Prerequisite: POLSC 101 or permission of instructor. (F,S)

POLSC 373 Intelligence and National Security 3(3-0)
Examines inter-agency relations as well as practical and political elements of domestic intelligence gathering. (F)

POLSC 374 Homeland Security and the Law 3(3-0)
Explores the legal and constitutional aspects of homeland security and homeland defense. (S)

POLSC 375 Threat and Strategic Planning 3(3-0)
Topics include the development of threat assessment and planning, public-private sector resource partnering and crisis communication. (S)

POLSC 376 Cyber Defense 3(3-0)
Study of Issues and policies related to war, terrorism, espionage, and surveillance in the cyber environment. Additional emphasis on identification and prevention of emerging threats. (*)

POLSC 395 Independent Study (1-3 VAR)
Independent study involving specialized reading and research. Prerequisite: permission of instructor. (*) Repeatable (6)

POLSC 405 The American Presidency 3(3-0)
Analysis of the powers and politics of the American presidency and those who have held the office. Presidential decision making, legislative and judicial relationships, elections. Prerequisite: POLSC 101 or permission of instructor. (S)

POLSC 411 The U.S. Congress 3(3-0)
Study of the U.S. Congress structure, law-making, politics and reforms. Prerequisite: POLSC 101 or permission of instructor. (F)

POLSC 440 Nationalism/Ethnic Conflict 3(3-0)
The course will survey theories of identity formation and study the political origins and consequences of national and ethnic identities in countries around the world. (*)

POLSC 445 Economic Development 3(3-0)
Studies the politics of economic development worldwide, the political economy of the welfare state in developed economies, and the causes of economic growth and inequality. (*)

POLSC 450 Democracy and Dictatorship 3(3-0)
Studies and compares the politics of various dictatorships and democracies. Studies democratic constitutional design and its implications for governance and the avoidance of corruption. (*)

POLSC 455 States, Citizens and Human Rights 3(3-0)
Introduces students to the theories, politics and issues involved in building states, promoting human rights and defining citizenship in modern political systems. (*)

POLSC 460 U.S. Foreign and Security Policy 3(3-0)
Study of U.S. foreign policy development and implementation. Emphasis on evolution of strategic policy, institutional development, military application, and independent research. Prerequisite: POLSC 201 or permission of instructor. (F)

POLSC 461 War and Film 3(3-0)
Study of the relationship between war, film, and political culture. Emphasis on portrayal of politics through film and popular interpretation of politics given this medium. (*)

POLSC 473 American Political Thought 3(3-0)
Development of American segment of modern political thought from colonial times to present. Interrelationship of individuals, ideas and institutions shaping modern American political responses. (*)

POLSC 480 Practicum in Politics and Public Service (1-6 VAR)
For advanced students. Practical experience as interns in governmental agencies, political parties or legal offices. Prerequisite: departmental permission. (S/U Grading) (*) Repeatable (12)

POLSC 491 Special Topics (1-3 VAR)
Independent study involving seminars and research. Prerequisite: junior or senior status with adequate preparation and approval of instructor. (*) Repeatable

POLSC 492 Research (1-3 VAR) (*) Repeatable (6)

POLSC 493 Seminar (1-3 VAR)
Application of research methods and materials. Emphasis on in-depth study of specific political topics. Involves writing and discussion of research papers at advanced level. Prerequisite: POLSC 250 and 370 or permission of instructor. (S)

PSYCHOLOGY (PSYCH)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

PSYCH 100 General Psychology 3(3-0)
Overview of the field of psychology including learning, perception, motivation, emotion, heredity, personality, development, abnormal and psycho-therapy. (F,S,SS) (Gen Ed: SS, GT-SS3)

PSYCH 103 Introductory Psychology for Majors 3(3-0)
Explore psychology as a career in addition to an introduction to the basic skills required for conducting psychological research including APA writing style, journal article analysis, and basic statistics. (F,S,SS/E)

PSYCH 105 (POLSC, SOC, WS 105) Understanding Human Diversity 3(3-0)
Americans live in a complex and diverse society. This course examines the nature, impact and strategies for dealing with diversity in personal and social contexts. (*)

PSYCH 151 Human Development 3(3-0)
Survey of human development through life span. A multi-disciplinary approach to the study of both change and stability in physical, cognitive, social and personality development Review of relevant developmental theory and research. (F,S,SS) (Gen Ed: SS, GT-SS3)

PSYCH 205 Introduction to Sport Psychology 3(3-0)
An introduction to psychological theories and constructs affecting performance, coaching & development in sports and athletics. (F)

PSYCH 207 Quantitative Research Methods I 3(3-0)
Introduction to research development and use of quantitative methods. Prerequisite: PSYCH 100, PSYCH 103, Gen Ed Math. Corequisite: PSYCH 207L. (F,S)

PSYCH 207L Quantitative Research Methods Lab I 1(0-1)
Introduction to methods of psychological experimentation. Prerequisite: PSYCH 100, PSYCH 103, Gen Ed Math. Corequisite: PSYCH 207. (F,S)

PSYCH 209 Quantitative Research Methods II 3(3-0)
Continuation of PSYCH 207. Focus on research development and quantitative methods. Prerequisite: PSYCH 100, PSYCH 103, PSYCH 207, PSYCH 207L and Gen Ed Math. Corequisite: PSYCH 209L. (F,S)

PSYCH 209L Quantitative Research Methods Lab II 1(0-1)
Continuation of Quantitative Research Methods Lab I. Prerequisite: PSYCH 100, PSYCH 103, Gen Ed Math, PSYCH 207, PSYCH 207L. Corequisite: PSYCH 209. (F,S)

PSYCH 211 (WS 211) Women and Society 3(3-0)
Statistical overview of the current status of women, followed by examination of theories concerning equality of the sexes. Prerequisite: PSYCH 100. (F)

PSYCH 212 (WS 212) Psychology of Diversity 3(3-0)
To raise awareness of social inequities, promote cultural competency & appreciation of differences. (*)

PSYCH 220 Drugs and Behavior 3(3-0)
Principles of drug action with attention to beneficial and harmful uses of drugs. (F,S)

PSYCH 222 Understanding Animal Behavior 3(3-0)
Basic comparative and ethological perspectives regarding animal behavior. Scientific techniques for observation of animal behavior may be demonstrated at the Pueblo Zoo. (F,S) (Gen Ed: SS, GT-SS3)

PSYCH 231 (SOC, WS 231) Marriage and Family Relationships 3(3-0)
Marriage and family from an institutional and relationship perspective: cross-cultural diversity, mate selection, marital dynamics, parenting, divorce, remarriage, emerging patterns. (F,S) (Gen Ed: SS)

PSYCH 241 Human Sexuality 3(3-0)
Psychological and biological aspects of human sexual behavior. Prerequisite: PSYCH 100 and sophomore standing. (*)

PSYCH 251 Childhood and Adolescence 3(3-0)
Physical, social, cognitive, and emotional growth of the individual from childhood through adolescence. Topics include intelligence, social development, self development, moral development, family relations. Prerequisite: PSYCH 100. (F,S) (Gen Ed: SS)

PSYCH 291 Special Topics (1-4 VAR)
Prerequisite: Instructor permission. Repeatable (6)

PSYCH 311 Theories of Personality 3(3-0)
Major theories of personality and the methods of personality investigation. Prerequisite: PSYCH 100. (F,S)

PSYCH 314 Environmental & Conservation Psych 3(3-0)
The influence of the physical and social environment on the individual. Variables considered include architecture, city size, noise, pollution and allocation of resources. Prerequisite: PSYCH 100. (*)

PSYCH 315 Industrial/Organizational Psychology 3(3-0)
Application of the principles of psychology to the workplace, including personnel selection, motivation, group processes, leadership, job analysis, and organization. Prerequisite: PSYCH 100. (*)

PSYCH 331 Physiological Psychology 3(3-0)
Structure and function of the brain, nervous and endocrine systems; biological basis of sensation, perception, sleep and arousal, motivation, learning and memory, and drug action. Prerequisite: PSYCH 100. Corequisite: PSYCH 331L. (S)

PSYCH 331L Physiological Psychology Lab 1(0-2)
Prerequisite: PSYCH 100. Corequisite: PSYCH 331. (S)

PSYCH 334 Perception 3(3-0)
The senses and how they cooperate with the brain to provide awareness and knowledge of the world about us. Empirical findings and theoretical analysis of the processes of seeing, hearing, tasting, smelling and touching. Role of learning in normal and illusory perception is considered. Prerequisite: PSYCH 100. Corequisite: PSYCH 334L. (*)

PSYCH 334L Perception Lab 1(0-2)
Prerequisite: PSYCH 100. Corequisite: PSYCH 334. (*)

PSYCH 336 Learning and Motivation 3(3-0)
Principles of learning and memory. Empirical findings and theoretical analyses of topics including conditioning, reinforcement and punishment. Research and application. Prerequisite: PSYCH 100 or permission of instructor. (*)

PSYCH 337 Memory and Cognition 3(3-0)
Theory and research on current topics in cognition, including attention, concept formation, imagery, memory, decision making, language acquisition, problem solving and text comprehension. Prerequisite: PSYCH 100. (F)

PSYCH 342 Educational Psychology 3(3-0)
The contribution of psychology theory, research and methods to our understanding of teaching and learning. Prerequisite: PSYCH 100 or 151. (*)

PSYCH 351 Psychology of the Exceptional Individual 3(3-0)
Survey of characteristics of those individuals considered significantly above or below the norm of the population. Emphasis on behavioral identification and modification of the home, school and social environment. Prerequisite: PSYCH 100. (*)

PSYCH 352 (SOC 352) Social Psychology 3(3-0)
General and applied psychological principles of the individual's interaction with a group. Prerequisite: PSYCH 100. (*)

PSYCH 353 Advanced Developmental Psychology 3(3-0)
Emphasis on theoretical foundations of developmental psychology. Research strategies used in conducting developmental research. Prerequisite: PSYCH 100 or PSYCH 151. (F,S)

PSYCH 362 Abnormal Psychology 3(3-0)
Etiology, diagnosis and therapy of maladaptive or abnormal behaviors and mental functioning. Prerequisite: PSYCH 100. (F,S)

PSYCH 381 Principles of Psychological Testing I 3(3-0)
Theories and principles of psychological testing are applied to the selection, use and evaluation of available tests. Prerequisite: PSYCH 100, 209, and 209L. (*)

PSYCH 401 History and Systems of Psychology 3(3-0)
The historical development of modern psychology from its roots in classical philosophy and the social, cultural, and political context within which psychological theory emerged. Prerequisite: PSYCH 100, 209, and 209L. (F,S)

PSYCH 403 Emotional Intelligence 3(3-0)
This course examines scientific research from the fields of Affective Neuroscience, Personality and Positive Psychology regarding emotional intelligence, specifically: emotional awareness, expressivity, motivation and regulation. Prerequisite: PSYCH 100. (*)

PSYCH 405 Positive Psychology 3(3-0)
This course examines the latest scientific research constituting positive psychology. Topics include: Well-Being, Gratitude, Empathy, Forgiveness, Hope, Resilience, and Humor. Prerequisite: PSYCH 100. (*)

PSYCH 410 Advanced Data Analysis 3(3-0)
Advanced techniques in data analysis, including analysis of variance/covariance, post-hoc tests, multiple regression and non-parametric tests. Use of computer software programs will be addressed, especially for those interested in graduate school admission. Prerequisite: PSYCH 209 and 209L. (*)

PSYCH 417 Health Psychology 3(3-0)
Students will study how the biopsychosocial model interacts dynamically and influences the well being of the whole person. Prerequisite: PSYCH 100. (*)

PSYCH 420 Human Evolutionary Psychology 3(3-0)
A synthesis of the modern principles of psychology with evolutionary biology with an emphasis on the origins of higher cognitive functions, emotions, and culture. Prerequisite: PSYCH 100 & junior or senior standing. (*)

PSYCH 463 Psychopathology of Childhood 3(3-0)
A survey of the unique conceptual models of etiology, assessment and therapy appropriate to the study of the psychological disorders of childhood. Prerequisite: PSYCH 100 and 362. (*)

PSYCH 464 Systems of Counseling and Psycho-therapy 3(3-0)
Traditional and contemporary theories of counseling and psychotherapy through use of case studies and other selected materials. Prerequisite: PSYCH 100, 311, and 362. Corequisite: PSYCH 464L or permission of instructor. (F)

PSYCH 464L Systems of Counseling and Psycho-therapy Lab 1(0-2)
Prerequisite: PSYCH 100, 311, and 362. Corequisite: PSYCH 464. (F)

PSYCH 465 Behavior Modification 3(3-0)
Advanced methods and techniques of behavior modification as practiced in various agencies and institutions. Prerequisite: PSYCH 100 and junior or senior standing. (*)

PSYCH 471 Clinical Psychology 3(3-0)
Survey of clinical psychology as a profession. Training requirements, opportunities, future directions, current research and ethical problems. Prerequisite: PSYCH 100, 362, and junior or senior standing. (F)

PSYCH 475 Group Process 3(3-0)
Study and practice of basic group theory and approaches as they are applied in mental health. Basic group therapeutic techniques and procedures will be demonstrated in an experiential setting. Prerequisite: PSYCH 100, 311, 362, 464, 464L, and junior or senior standing. (S)

PSYCH 491 Special Topics (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

PSYCH 492 Research (1-3 VAR)
Faculty directed research project for undergraduate student. May be repeated for a maximum of 3 total credits. Prerequisite: junior or senior standing or permission of instructor. (F,S,SS) Repeatable (3)

PSYCH 494 Field Experience (1-12 VAR)
In-depth, on-the-job experience in psychology, individually designed. Ability to use psychological tests and counseling techniques recommended. Prerequisite: PSYCH 100, 311, 362, 464, 464L, junior or senior standing, and permission of instructor. (F,S,SS) Repeatable (12)

PSYCH 495 Independent Study (1-3 VAR)
Prerequisite: PSYCH 100 and junior or senior standing. (F,S,SS) Repeatable (3)

GRADUATE COURSES

PSYCH 515 Psychology of Minorities 3(3-0)
Designed to provide a systematic analysis of the forces that shape the behavior of minorities and consequent counseling methods with this population. (*)

PSYCH 517 Life Span Development 3(3-0)
Leads to a broad understanding of the impact of external influences on a person through the life span. Format includes exploration of topics of interest, discussion of research and active class participation (*)

PSYCH 524 Philosophy and Theories of Counseling 3(3-0)
Designed to acquaint students with the range of theories currently directing the work of the counselor and to facilitate the development of a personal model of counseling. Personal professional ethics emerge as a major course focus. (*)

PSYCH 525 Tools and Techniques of Guidance Services 3(3-0)
Open to graduate students in the secondary school counseling program. A study of materials and methods used in secondary schools and of the counselor as a consultant and coordinator. The importance and role of the secondary school counselor will be the focus of this class. (*)

PSYCH 526 Organizational Development 3(3-0)
Designed to provide the graduate student with experience and skills necessary to improve programs and organization. (*)

PSYCH 527 Group Counseling 3(3-0)
Leads to an understanding of the function of group methods in the guidance program and assists the student in developing group facilitation skills. (*)

PSYCH 528 Career Development 3(3-0)
Designed to help students gain insight and understanding of the development process of occupational decision. Explores career counseling provided by counselors for clients in the areas of future education and in the world of work. (*)

PSYCH 530 Family Therapy 3(3-0)
This course is an introduction to Family Systems Theory. Emphasis is on the history and development of treatment models in family interventions and techniques. Prerequisite: graduate standing. (*)

PSYCH 536 Practicum 3(3-0)
Designed to provide the beginning counseling student with basic interpersonal training experience. Individual and group contact focuses on personal growth and skill development. (*)

PSYCH 538 Elementary Counseling 3(3-0)
Designed to provide methods and techniques for elementary school counselors. (*)

PSYCH 546 Assessment in Counseling 3(3-0)
This course provides students with an understanding of group and individual educational and psychometric theories and approaches to appraisal. Prerequisite: graduate standing. (*)

PSYCH 563 Psychopathology of Childhood 3(3-0)
Unique conceptual models of etiology, assessment, and therapy appropriate to psychological disorders of child-hood. Graduate students complete an independent project and consider treatment and management techniques. Prerequisite: graduate standing, permission of instructor and PSYCH 362 or equivalent. (*)

PSYCH 591 Special Topics (1-3 VAR)
Prerequisite: graduate standing and permission of instructor. (*)

PSYCH 592 Research 3(3-0)
Designed to assist students with the knowledge and skills necessary for a consumer of research. The fundamentals of research procedure and analysis of statistics are stressed. (*)

PSYCH 595 Independent Study (1-3 VAR)
Prerequisite: graduate standing & permission of instructor. (*)

PSYCH 598 Internship 3(0-3)
Designed to provide the student with actual field work experience in counseling and guidance. (*)

READING (RDG)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

RDG 099 Development Reading Skills 3(3-0)
Students will apply strategies for improving comprehension, developing vocabulary, and increasing rate for reading college textbooks. (S/U grading) (F,S)

RDG 310 Current Approaches to Reading and Writing Instruction 3(3-0)
Various approaches to teaching reading and writing including research findings and classroom application of the reading and writing process. Prerequisite: RDG 410 or 435. (F)

RDG 360 Practicum (1-3 VAR)
Work with small groups and individual pupils in the public school preparing materials and lessons under the supervision of a reading teacher. Applies to both elementary and secondary schools depending upon the instructor's assignment. Prerequisite: RDG 410 or 435. (F,S)

RDG 410 Teaching Reading 3(3-0)
Includes reading instruction, emphasizing methods and assessment strategies to meet K-6 Colorado content standards; 30 hours of field experience. Prerequisite: admission to Education. (F,S)

RDG 411 Teaching Elementary Language Arts 2(2-0)
Focuses on language arts instruction for K-6 students; 30 hrs. field work required. Prerequisite: admission to Education. (F,S)

RDG 431 Developing Creative Centers   1(1-0)
Involves planning, developing and implementing the use of learning centers in the classroom. Prerequisite: RDG 410 or 435. (SS)

RDG 435 Content Area Literacy 4(3-2)
Focuses on skills and strategies to improve comprehension of textual material as well as writing in various content areas; 60 hours of field experience. Prerequisite: admission to Education. (F,S)

RDG 436 New Directions in Reading Comprehension 2(2-0)
Exploration of and simulations of research-based strategies to increase students' comprehension of reading in elementary and secondary classes. Prerequisite: RDG 410 or 435. (F,SS)

RDG 437 Newspapers as a Teaching Resource 1(1-0)
Strategies and procedures for using the newspaper as a supplementary resource in content area classrooms at all grade levels (K-12). (SS)

RDG 442 Reading Across Cultures 2(2-0)
Techniques of adapting reading instruction for the linguistically and culturally different child. Problems of many minority groups are analyzed. Prerequisite: RDG 410 or 435. (S)

RDG 450 Diagnosis and Remediation of Reading Problems 3(2-3)
Diagnostic and evaluation procedures used in detecting and remediating problems and individualized instruction. Appropriate for elementary and secondary teachers. Field experience required. admission to teacher program required. Prerequisite: RDG 410 or RDG 435. (F,S)

RDG 491 Special Topics (1-2 VAR) (*)

RDG 495 Independent Study (1-2 VAR)
Individual projects and problem-solving experiences designed to meet students' special needs. With instructor's permission, certain program requirements may be completed through independent study. (*)

GRADUATE COURSES

RDG 510 Foundations of Reading Instruction 3(3-0)
Basic course for other graduate reading courses, including reading skills, sequence, materials, psychology of reading and relationship to other language arts. Prerequisite: admission to Teacher Education, Teacher in Residence Program, or M.Ed. Program. (*)

RDG 511 Teaching Elementary Language Arts 2(2-0)
Focuses on language arts instruction for K-6 students; 30 hrs. field work required. Prerequisite: admission to Teacher Education, Teacher in Residence Program, or M.Ed. Program. (F,S)

RDG 531 Developing Creative Centers 1(1-0)
Students will investigate various types of learning centers and means of successful implementation in the classroom. Development of materials, lesson plans and record-keeping systems which will result in a complete reading center. Investigation into research on effectiveness of learning centers. Prerequisite: graduate standing. (SS)

RDG 535 Content Area Literacy 3(3-0)
Focuses on skills and strategies to improve comprehension of textual material as well as writing in various content areas. Prerequisite: admission to Teacher Education, Teacher in Residence Program, or M.Ed. Program. (*)

RDG 536 New Directions in Reading Comprehension 2(2-0)
Current research-based theory and practical classroom strategies and procedures for increasing comprehension of reading in elementary and secondary content area. Emphasis on open-ended, higher-order thinking skills. Prerequisite: graduate standing. (*)

RDG 537 Newspapers as a Teaching Resource 1(1-0)
Strategies and procedures for using the newspaper as a supplementary resource in content area classrooms at all grade levels (K-12). Prerequisite: graduate standing. (SS)

RDG 542 Reading Across Cultures 2(2-0)
Techniques of adapting reading instruction for the linguistically and culturally different child. Prerequisite: graduate standing. (*)

RDG 550 Diagnosis and Remediation of Reading Problems 3(2-3)
Formal and informal diagnostic procedures for the classroom teacher including standardized testing, informal inventories, close, criterion-referenced testing and Reading Miscue Inventory. Prescriptions based on diagnosis; remediation strategies applied by students. Prerequisite: admission to Teacher Education, Teacher in Residence Program, or M.Ed. Program and one of the following RDG courses: 410, 510, 435, 535. (*)

RDG 552 Psycholinguistic Views of Reading: Process to Practice 2(1-3)
Introduction to psycholinguistic perspectives through analysis of oral reading errors. Reading Miscue Manual as an instrument for investigating reader's strengths and weaknesses. Strategies for remediating poor quality miscues. Prerequisite: admission to Teacher Education, Teacher in Residence Program, or M.Ed. Program and one of the following RDG courses: 410, 510, 435, 535. (*)

RDG 560 Practicum 2(0-6)
Work with small groups and individual pupils in the public school preparing materials and lessons under the supervision of a reading teacher. Applied to both elementary and secondary schools depending on the instructor's assignment. Prerequisite: RDG 410 or 435, and graduate standing. (*)

RDG 591 Special Topics (1-2 VAR)
Prerequisite: graduate standing. (*)

RDG 595 Independent Study 1(0-2)
Prerequisite: graduate standing. (*)

RECREATION (REC)

UNDERGRADUATE COURSES

REC 100L Wilderness Technical Skills 1(0-2)
Introduction to wilderness skills paramount for outdoor leadership competence. Students will learn and demonstrate technical skills. (F)

REC 102 Mountain Orientation 2(1-2)
An intensive one-week field experience in the Colorado mountains. Clothing and equipment selection, nutrition and rations planning, back country conservation and sanitation, navigation, and trail techniques. (*)

REC 103 Winter Orientation 2(1-2)
An intensive one-week ski tour experience in the Colorado mountains. Group dynamics, leadership, and expedition behavior. Travels hut to hut with some winter camping. (*)

REC 104 Desert Orientation 2(1-2)
An intensive one-week desert camping and backpacking experience, accompanied by nine lectures in preparation for the trip. Natural and cultural history, desert conservation, group dynamics. (*)

REC 105 Canyon Orientation 2(1-2)
Students will develop proficiency in canyon travel, group camping, and will explore the geology, geography, and ecology of the canyon country. (*)

REC 112L Rock Climbing 1(0-2)
An introduction to the basic understanding of rock climbing, equipment, Leave No Trace environmental ethics and rock climbing as an outdoor recreational activity. (S)

REC 113L Whitewater Boating 1(0-2)
Introduction class in which the following skills are taught: basic strokes, Eskimo rolling, how to read water, and clothing requirements. The class will include lecture, pool and river trip sessions. (*)

REC 114L Basic Mountaineering Techniques 1(0-2)
Students will learn necessary information and techniques including clothing, equipment, physical conditioning, stewardship, access, knot tying, and will participate in an incline climb. Prerequisite: REC 100L. (F)

REC 116L Camping 1(0-2)
A basic camping class designed to teach the fundamentals of self-sufficient tent camping. Emphasizes clothing, equipment selection, nutrition, and Leave No Trace guidelines. (*)

REC 117L Backpacking 1(0-2)
An introduction course to instruct the basics of traveling in the backcountry with everything one needs in their backpack. Clothing, equipment, orienteering, first aid, route and campsite selection will be emphasized during the trips that are required for this class. (F)

REC 240 Recreation Program Design 3(3-0)
Rationale supporting and methods of conducting recreation programs in a wide variety of public, private, voluntary and commercial recreation agencies. (F)

REC 249 Challenge Course Leadership 2(2-0)
This course is designed to teach knowledge, skills, and methods necessary to facilitate challenge course programs in a variety of settings for specific client groups. (F,S)

REC 250 Commercial Recreation and Tourism 3(3-0)
Designing for-profit recreation programs and facilities that are linked to tourism. Practical approach to programming in a commercial setting. (F)

REC 270 Outdoor Leadership I 2(1-2)
An introduction to the concepts of outdoor leadership including a field experience focused on the application of theoretical and practical concepts. Additional costs apply. Pre or corequisite: REC 100L. (F)

REC 280 Foundations of Therapeutic Recreation 3(3-0)
Prescribed recreational activities as clinical treatment modality for impaired clients. Services for developmentally delayed, law offenders, psychologically impaired, sensory impaired, physically disabled, disadvantaged or aging. (F)

REC 291 Special Topics (1-5 VAR)
Undergraduate level of study designed to increase understanding in areas not covered by the department. (*) Repeatable

REC 322 Wilderness First Aid 2(2-0)
Course teaches theory, knowledge, and skills needed for basic medical treatment and evacuation in the wilderness. Involves 3 days of medical training, scenarios and testing. (S/U grading) (F)

REC 350 Leadership and Ethics 3(3-0)
Addresses leadership techniques and styles, leadership theory, group dynamics, and ethical considerations in recreation. Prerequisite: EXHP 101, junior or senior level standing or permission of instructor. (S)

REC 360 Outdoor Education 3(3-0)
Concepts and methods of outdoor education and interpretation. Students learn to teach outdoor living skills and natural history using experiential methods in an outdoor setting. Prerequisite: EXHP 101, junior or senior level standing or permission of instructor. (F)

REC 370 Outdoor Leadership II 2(1-2)
A practical application of the concepts and theory introduced in REC 270. Students will be required to plan and lead REC 104. Prerequisite: REC 104, REC 240, and REC 270 with grades of C or better. (S)

REC 375 Research and Evaluation of Recreation 3(3-0)
Provides an overview of research designs and methodologies using recreation participation data, for needs assessment and program evaluation. Prerequisite: MATH 109 equivalent or higher (with a grade of C or better), and EXHP 101 or permission of instructor. (F)

REC 381 Environmental Interpretation 3(3-0)
History, philosophy, and techniques of interpreting our natural and cultural heritage to visitors in natural resource-based parks. Addresses public, private, and non-profit agencies. (*)

REC 388 Outdoor Leadership Practicum (1-3 VAR)
Involves selected practical experiential opportunities in outdoor leadership. Minimum of 50 contact hours per credit hour. Prerequisite: REC 270, REC 370. (F,S,SS) Repeatable (3)

REC 389 Community/Commercial Rec Practicum 3(0-3)
Minimum of 150 hours of practical experience in a selected recreation agency. Prerequisite: REC 280 and REC 360. (F,S,SS)

REC 483 Sustainable Practices 3(3-0)
Sustainable, long-term strategies for ecological survival and environmental stabilization, discussed from the perspectives of ethics, economics and political processes. Includes community research and service projects. Prerequisite: BIOL 121/121L. (*)

REC 484 Outdoor Resources and Management 2(2 -0)
Examination of the outdoor recreation experience, the organization of resource-based recreation management and key outdoor recreation policy issues. Prerequisite: EXHP 101, junior or senior standing or permission of instructor. (S)

REC 485 Recreation Facility Design/Management 3(3-0)
Presentation of basic elements of design and management of recreational facilities, taking into account the interaction between natural resources and man-made structures. Prerequisite: EXHP 101, junior or senior level standing or permission of instructor. (*)

REC 489 Internship in Therapeutic Rec 12(0-36)
Supervised experience with approved professionals in select therapeutic recreation settings. Assumes the normal responsibilities as an entry-level professional in therapeutic recreation. Prerequisite: senior standing, completion of all degree requirements, 2.5 GPA in major, and internship coordinator approval. (F,S,SS)

REC 491 Special Topics (1-5 VAR) (*) Repeatable

REC 493 Seminar 2(2-0)
Advanced in-depth examinations of contemporary issues in leisure/recreation. Includes student-led discussions, in-depth term projects and comprehensive examinations. Interview and resumé preparation are emphasized. Prerequisite: REC 388 or REC 389. (S)

REC 494 Field Experience (1-4 VAR)
Learning experience to be conducted in an actual recreation environment facilitated by an on-site supervisor and an EXHPR supervisor. Prerequisite: approval of the field experience coordinator. (S/U grading) (*) Repeatable

REC 495 Independent Study (1-5 VAR) (*) Repeatable

REC 498 Internship (1-12 VAR)
Supervised experience with approved professionals in select recreation settings. Prerequisite: senior standing, completion of all other degree requirements, 2.50 GPA in the major, and internship coordinator approval. (F,S,SS)

GRADUATE COURSES

REC 550 Leadership and Ethics 3(3-0)
Advanced study of leadership techniques and styles, leadership theory, group dynamics, and ethical considerations in recreation. Prerequisite: graduate standing or permission of instructor. (S)

REC 560 Outdoor Education 3(3-0)
Advanced study of the concepts and methods of outdoor education and ethics. Students will assess outdoor living skills and ecological concepts using experiential methods. Prerequisite: graduate standing or instructor permission. (F)

REC 569 Outdoor Leadership I 2(1-2)
Concepts of outdoor leadership including field experience focused on the application of theoretical and practical ideas and research. (F)

REC 570 Outdoor Leadership II 2(1-2)
Advanced practicum in outdoor leadership. Includes responsibilities in trip planning, management, evaluation, group facilitation and processing, and natural resource agency relations. Prerequisite: REC 569 with a grade of C or better and graduate standing or permission from the instructor. (S)

REC 584 Outdoor Resources and Management 3(3-0)
Advanced study of the outdoor recreation experience, the organization of resource-based recreation management and key outdoor recreation policy issues. Prerequisite: graduate standing or permission of instructor. (S)

REC 591 Special Topics (1-5 VAR)
Graduate level of study designed to increase understanding in areas not covered by the department. (*) Repeatable

REC 594 Field Experience (1-6 VAR)
Graduate level field experience project completed in coordination with a faculty member. Prerequisite: faculty permission. (F,S,SS) Repeatable (6)

REC 595 Independent Study (1-6 VAR)
Graduate level independent study completed in coordination with a faculty member. Prerequisite: faculty permission. (F,S,SS) Repeatable

RUSSIAN (RUS)

UNDERGRADUATE COURSES

RUS 101 Introduction to Russian I 3(3-0)
Pronunciation, conversation, grammar, alphabet, easy reading and writing. (F) (Gen Ed: H) (CC)

RUS 102 Beginning Spoken Russian II 3(3-0)
Students are placed by the department. Practice in oral, aural, reading and writing experiences. (F,S) (Gen Ed: H) (CC)

RUS 201 Intermediate Russian I 5(5-0)
Grammar and vocabulary. Reading of short stories, oral and written reports. Prerequisite: RUS 102 or equivalent. (*) (Gen Ed: H) (CC)

RUS 202 Intermediate Russian II 5(5-0)
Prerequisite: RUS 201 or equivalent. (*) (Gen Ed: H) (CC)

RUS 211 Russian Conversation 2(2-0)
Intensive practice. Prerequisite: RUS 102 or equivalent. (*)

RUS 303 Conv and Comp: Russian 3(3-0)
Focus on improving linguistic proficiency within the context of Russian culture. Prerequisite: RUS 202 or equivalent. (*)

RUS 311 Advanced Russian Conversation 2(2-0)
Intensive practice. Prerequisite: RUS 211 or permission of instructor. (*)

RUS 341 Russian Short Story 2(2-0)
Selected short stories. Discussion of ideas, art and authors. Stress on both oral and written work. Prerequisite: RUS 202 or permission of instructor. (*)

SCIENCE (SCI)

GRADUATE COURSE

SCI 500 Workshop (1-4 VAR)
Science workshops designed specifically for professional development of science teachers. Workshops are subtitled and no subtitle may be repeated for credit (not for MSANS credit). Prerequisite: graduate standing or permission of instructor. (*) Repeatable

SOCIOLOGY (SOC)

UNDERGRADUATE COURSES

SOC 101 Introduction to Sociology 3(3-0)
The scientific study of patterns and processes of human social relations. (*) (Gen Ed: SS, GT-SS3)

SOC 105 (POLSC, PSYCH, WS 105) Understanding Human Diversity 3(3-0)
Americans live in a complex and diverse society. This course examines the nature, impact and strategies for dealing with diversity in personal and social contexts. (*)

SOC 155 Minority and Ethnic Relations 3(3-0)
Sociological theories, studies, and findings concerning group maintenance and interaction in contemporary society. (*)

SOC 201 Social Problems 3(3-0)
Sociological perspectives applied to an understanding of global and domestic social problem, including the environment, corporate control, economic and political inequalities, health care, and crime. (*) (Gen Ed: SS, GT-SS1)

SOC 203 The Criminal Justice System 3(3-0)
This course examines origin, nature, and utilization of criminal law; policing, court adjudication and sentencing; jails and prisons; community based corrections; criminal justice policy. (*)

SOC 206 (WS 206) Gender and Society 3(3-0)
Examination and evolution of relationships between sex roles, culture, and societal institutions and processes. Includes an analysis of sexual stratification. (*)

SOC 212 (ANTHR 212) The Forensics of Bones 3(3-0)
Familiarize students with the basic procedures used by forensic anthropologists to obtain evidence in criminal investigations. (*)

SOC 231 (PSYCH, WS 231) Marriage and Family Relationships 3(3-0)
Marriage and family from an institutional and relationship perspective; cross-cultural diversity, mate selection, marital dynamics, parenting, divorce, remarriage, emerging patterns. (*) (Gen Ed: SS)

SOC 248 Environmental Sociology 3(3-0)
We will use our sociological imaginations to explore the often puzzling relationships that humans all over the globe have developed with their environment. (*)

SOC 250 (ANTHR 250) The Sacred in Culture 3(3-0)
Concepts of the supernatural studied cross-culturally and in particular cultures. Consideration of how religion helps individuals adjust to stress and aging. (*)

SOC 291 Special Topics (1-3 VAR) (*) Repeatable

SOC 301 Sociological Methods 3(3-0)
The methods of research and investigation in sociology and the social sciences. Prerequisite: SOC 101. (F,S)

SOC 302 Collective Behavior and Social Movements 3(3-0)
An analysis of elementary forms of spontaneous and unstructured behavior (panics, rumors), and complex forms of more structured group phenomena (riots, social movements.) Prerequisite: SOC 101. (S)

SOC 303 Crime and Deviance 3(3-0)
The nature and causes of crime as well as of behavior defined as socially deviant, including violent, corporate, political crimes; sexual, cultural, political deviance. Prerequisite: SOC 101 or SOC 203. (F)

SOC 304 Race and Crime 3(3-0)
Explores historical and contemporary intersecting issues of race and crime in the United States. Theoretical grounding and factual information provide the foundation for the course. Prerequisite: SOC 101 or SOC 155. (*)

SOC 305 (WS 305) Crime and Women 3(3-0)
Exploration of social, cultural and political variables that create both women victims and women criminals. (*)

SOC 306 Delinquency and Juvenile Justice 3(3-0)
Theory and history of delinquency; relationship to family, peer groups, schools, gangs, drugs, young offenders legislation, juvenile courts and police response, youth corrections. (*)

SOC 308 Popular Culture 3(3-0)
Advertising, television, music, novels, and the news are among the topics to be investigated for their social significance. (*)

SOC 310 (ANTHR 310) Social and Cultural Theory 3(3-0)
Examine from classical to contemporary theory in sociology and anthropology. Prerequisite: SOC 101 or ANTHR 100. (*)

SOC 352 (PSYCH 352) Social Psychology 3(3-0)
General and applied psychological principles of the individual's interaction with a group. Prerequisite: PSYCH 100 or SOC 101. (*)

SOC 353 Penology 3(3-0)
The history and role of corrections; correctional practice, relationship to law, prison society, working in prisons, special needs of prisoners, capital punishment, administration, privatization. Prerequisite: SOC 101 or SOC 203. (*)

SOC 354 Urban Sociology 3(3-0)
Development of urban places; analysis of socio-economic organization, urban social forces and the consequences for individuals, groups and social institutions. (*)

SOC 355 Political Sociology 3(3-0)
Analysis of the major sociological variables associated with political decision making and other political processes. (*)

SOC 356 Social Stratification 3(3-0)
Inquire into inequalities of wealth, power, and the consequence for individuals and society. Prerequisite: SOC 101 or SOC 201. (*)

SOC 358 Film and Society 3(3-0)
An in-depth look at the images of social life and social relationships contained in popular movies. (*)

SOC 359 Community Corrections 3(3-0)
The development and practice of probation, parole, diversion, statutory release, electronic monitoring, halfway houses, privatization. Prerequisite: SOC 203. (*)

SOC 374 Crime in Film 3(3-0)
Employ theoretical perspectives to better understand motivations of Hollywood criminals and the peculiar aspects of a society with an insatiable appetite for crime as "entertainment." (*)

SOC 401 (ANTHR 401) Health, Culture and Society 3(3-0)
Analysis of how social, cultural, and psychological factors influence health and health care. Prerequisite: junior or senior standing. (*)

SOC 402 (ANTHR 402) Aging, Culture and Society 3(3-0)
Cultural, sociological and psychological dimensions of aging. Prerequisite: junior or senior standing. (*)

SOC 403 (WS 403) Human Sexuality and Social Behavior (3-0)
Sexuality and sexual conduct from a sociological and social psychological perspective. Prerequisite: junior or senior standing. (*)

SOC 404 Poverty 3(3-0)
Poverty in the United States, its measurement and extent, perpetuating conditions, lifestyle and anti-poverty programs. (*)

SOC 405 Law and Society 3(3-0)
The origins and functions of law; the social organization of legal institutions and decisions; the relationship of law to morality, justice and social change. (*)

SOC 407 (WS 407) Family Violence 3(3-0)
The extent, seriousness, and impact of the major forms of domestic violence. (*)

SOC 408 Science, Technology, and the Future 3(3-0)
Social and structural implications of science and technology as they affect society. (*)

SOC 409 Victimology 3(3-0)
Study of the victims' role in criminal transactions. Examination off individuals and groups as victims of officially defined crime, as well as other social injuries, not officially defined as crime. Prerequisite: SOC 101 or SOC 203. (*)

SOC 410 Structural and Elite Crime 3(3-0)
Examination of crimes and social injuries perpetrated by organizational structures that do physical or economic harm to the environment, their employees, and their customers. (*)

SOC 411 Police and Society 3(3-0)
The history and role of police; including patrol officers, detectives, specialty units, police discretion, women in policing, community policing, private policing, corruption, brutality, accountability. Prerequisite: SOC 101 or SOC 203. (*)

SOC 413 Patterns of Homicide 3(3-0)
Examines the rates, types, patterns, and explanation of homicide in the United States and selected other countries. Prerequisite: SOC 101 and 203. (*)

SOC 414 Serial Murder 3(3-0)
Examines serial murder in historical and contemporary contexts and assesses current control strategies including forensic science and profiling. Prerequisite: SOC 101 and 203. (*)

SOC 415 Forensic Criminology 3(3-0)
Course introduces students to variable aspects of Medicolegal Death Investigation. Students will learn about investigating deaths caused by homicide, suicide, accidents, and natural causes. (*)

SOC 416 (ANTHR 416) Crime and the Mind 3(3-0)
Examination of "crime" as an ongoing aspect of human existence. Prerequisite: SOC 101 or ANTHR 100. (*)

SOC 417 Forensics & Homicide Investigations 3(3-0)
Examines police investigations of homicide and presents a critical analysis of the role of forensic science in the identification of suspects. Prerequisite: SOC 101 and 203. (*)

SOC 418 Crime, Drugs and Social Policy 3(3-0)
This course examines the way in which crime and drug policy is formulated, articulated, implemented, and evaluated. Prerequisite: SOC 101. (*)

SOC 419 Vice Crime 3(3-0)
This course examines the causes, consequences, and control of vice crimes such as drugs, gambling, and prostitution. Prerequisite: SOC 101 or SOC 203. (*)

SOC 420 Explaining Crime 3(3-0)
Examination of major sociological explanations of crime and their policy implications. Prerequisite: SOC 101 or SOC 303 or SOC 310 or ANTHR 310. (S)

SOC 421 Homicide, Courts & Corrections 3(3-0)
Examines criminal law applicable to homicide, the court processing of homicide cases, and the sanctions of life imprisonment and the death penalty. Prerequisite: SOC 101 and 203. (*)

SOC 422 Terrorism and Mass Murder 3(3-0)
Examines mass murder, genocide, and terrorism around the world and assesses current control initiatives. Prerequisite: SOC 101. (*)

SOC 424 Organized Crime 3(3-0)
This course examines how organized crime is defined and structured, its causes, its historical roots, its different manifestations and control efforts, both domestically and internationally. Prerequisite: SOC 101 or SOC 203. (*)

SOC 425 Gangs in Contemporary America 3(3-0)
Trends, organizational characteristics, processes, and causative factors associated with gangs in contemporary American society. (*)

SOC 426 Violence and Rioting 3(3-0)
An overview of episodes of collective behavior in society focusing on racial violence and prison riots, including examination of causes, history, and control efforts. Prerequisite: SOC 101. (SS)

SOC 428 (HIST, WS 428) Women & Work 3(3-0)
Examines historical and contemporary issues for women of various economic, social, and ethnic groups, especially in the US; examines gender ideologies about paid, unpaid work. Prerequisite: junior or senior standing or permission of instructor. (*)

SOC 431 Working in Modern America 3(3-0)
Exploration of the changing patterns, structure, and attitudes toward work in the United States today. (*)

SOC 432 Organization Theory 3(3-0)
Prevailing theoretical model of large organizations and suggested alternatives. (*)

SOC 440 Correctional Administration 3(3-0)
Major issues in correctional administration including the history and theories of corrections in the U.S. are analyzed. Prerequisite: SOC 203. (*)

SOC 448 Emotions in American Culture 3(3-0)
How American norms and values govern the creation, expression, and form of emotions. The content and form of the emotional self. Prerequisite: SOC 101 or SOC 352 or PSYCH 352. (*)

SOC 450 Soc of Mental Health and Suicide 3(3-0)
Examines the social conditions that influence mental health and suicide in the United States and the psychosocial processes that link social experiences to psychological health. Prerequisite: SOC 101 or SOC 352 or PSYCH 352. (*)

SOC 451 (ANTHR 451) Culture/Deviance/Psychopathology 3(3-0)
Analysis of the relationship between culture and the causes and manifestations of deviance and psychopathology. Prerequisite: SOC 101 or ANTHR 100. (*)

SOC 452 (ANTHR 452) Self and Society 3(3-0)
Examination of the self and society within sociological/anthropological theory. Special emphasis will be placed on symbolic interactionism and cross-cultural approaches. Prerequisite: SOC 101 or ANTHR 100 or SOC 352 or PSYCH 352 (*)

SOC 455 (WS 455) Hate Crimes 3(3-0)
Examines assumptions about race, gender, sexuality, and others that are used to justify hate crimes; examines common forms, emphasizing causal factors and effects. (*)

SOC 490 Special Projects (1-3 VAR)
Projects identified by each faculty member in concert with his/her interests. Prerequisite: Sociology major, junior/senior. (*) Repeatable

SOC 491 Special Topics (1-3 VAR) (*) Repeatable

SOC 492 (ANTHR 492) Research 3(3-0)
Qualitative and quantitative methods and designs in sociological research. Prerequisite: junior or senior standing and permission of instructor. (*)

SOC 493 Seminar (2-4 VAR) (*) Repeatable

SOC 494 Field Experience (1-12 VAR)
Practical on-the-job experience in an agency setting. Prerequisite: junior or senior standing and permission of instructor. (*) Repeatable

SOC 495 Independent Study (1-10 VAR)
Prerequisite: previous work in sociology and permission of instructor. (*) Repeatable

GRADUATE COURSES

SOC 500 Workshop (1-3 VAR)
Topics to be identified by subtitles taught. Prerequisite: sociology major, graduate standing. (*) Repeatable

SOC 540 Correctional Administration 3(3-0)
Major issues in correctional administration including the history and theories of corrections in the U.S. are analyzed. Prerequisite: graduate standing. (*)

SOC 590 Special Projects (1-3 VAR)
Projects identified by each faculty member in concert with his/her interests and expertise. Prerequisite: Sociology major, graduate standing. (*) Repeatable

SOC 591 Special Topics (1-3 VAR)
Topics identified by subtitles taught. Prerequisite: graduate standing. (*) Repeatable

SOC 595 Independent Study (1-10 VAR)
Affords students the opportunity to do independent, creative work. Prerequisite: graduate standing and permission of instructor. (*) Repeatable

SOCIAL SCIENCE (SOCSC)

UNDERGRADUATE COURSES

SOCSC 151 Society and Technology 3(3-0)
Role of technology as a prime factor in changing social and political institutions. Addresses technology as the systematic application of organized knowledge and material tools to the extension of human faculties. (*)

SOCSC 209 African American Studies 3(3-0)
Overview of the historical, political, and socio-cultural experiences of African Americans. (*) (Gen Ed: SS) (CC)

SOCSC 493 Seminar 2(2-0)
Various problems within the realm of social science utilizing an integrated approach. For majors in broad area social science disciplines. (*) Repeatable

SOCSC 591 Special Topics 2(2-0)
Topics identified by subtitles taught. Prerequisite: graduate standing. (*) Repeatable

SOCSC 593 Seminar 2(2-0)
Various problems within the realm of social science, utilizing an integrated approach. For majors in broad area social science disciplines. Prerequisite: graduate standing. (*) Repeatable

SPANISH (SPN)

UNDERGRADUATE COURSES

SPN 100 Intro to Conversational Spanish 3(3-0)
Basis skills for understanding and speaking Spanish. (*)

SPN 101 Beginning Spanish I 3(3-0)
Development of skills in speaking, listening, reading, writing; and cultural understanding (F,S,SS) (Gen Ed: H) (CC)

SPN 102 Beginning Spanish II 3(3-0)
Continuation of the development of skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: SPN 101 or departmental placement test. (F,S,SS) (Gen Ed: H) (CC)

SPN 130 Cultures of the Spanish-Spkg World 3(3-0)
Topics in the history, literatures, and art of selected Spanish-Speaking cultures, taught in English. (*) (Gen Ed: H, GT-AH1) (CC)

SPN 201 Intermediate Spanish I 3(3-0)
Development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: SPN 102 or departmental placement exam. (F,S) (Gen Ed: H, GT-AH4) (CC)

SPN 202 Intermediate Spanish II 3(3-0)
Continued development of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: SPN 201 or departmental placement exam. (F,S) (Gen Ed: H, GT-AH4) (CC)

SPN 203 Intermediate Proficiency Building 3(3-0)
Solidification of intermediate-level skills in speaking, listening, reading, writing, and cultural understanding. Prerequisite: SPN 102 or departmental placement exam. (F,S)

SPN 287 Intensive Spanish Study Abroad (1-9 VAR)
Study of Spanish in an immersion setting abroad, preparing the student for fluency through the study of grammar, civilization and culture, at an approved institution. Prerequisite: SPN 102 and permission of instructor. (*) Repeatable (9)

SPN 294 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: SPN 201 and permission of instructor. (*) Repeatable (7)

SPN 301 Advanced Spanish Grammar 3(3-0)
A concentrated study of Spanish grammar in addition to practice in writing, reading, speaking, and listening. Prerequisite: SPN 202 and 203 or equivalent. (F,S)

SPN 303 Spanish Phonetics and Phonology 3(3-0)
Theory and practice of Spanish language and speech patterns; how to produce and to teach the Spanish sound system accurately. Prerequisite: SPN 202 and 203, or equivalent. (F,S)

SPN 309 Intro to Hispanic Linguistics 3(3-0)
Fundamental terminology and concepts in linguistics; overview of Spanish sound system (phonology), word formation (morphology), phrase structure (syntax), etc. Prerequisite: SPN 300 and 301. (*)

SPN 312 Conv & Comp: Mexico & Central Amer. 3(3-0)
Focus on improving linguistic proficiency within the context of Mexican and Central American cultures. Prerequisite: SPN 202 and 203 or equivalent. (*)

SPN 313 Conv & Comp: South America 3(3-0)
Focus on improving linguistic proficiency within the context of South American cultures. Prerequisite: SPN 202 and 203 or equivalent. (*)

SPN 314 Conv & Comp: Caribbean 3(3-0)
Focus on improving linguistic proficiency with the context of Caribbean Hispanic cultures. Prerequisite: SPN 202 and 203 or equivalent. (*)

SPN 315 Conv & Comp: Spain 3(3-0)
Focus on improving linguistic proficiency within the context of Spanish cultures. Prerequisite: SPN 202 and 203 or equivalent. (*)

SPN 316 Conv & Comp: U.S. Latino 3(3-0)
Focus on improving linguistic proficiency within the context of Hispanic/Latino cultures in the United States. Prerequisite: SPN 202 and 203 or equivalent. (*)

SPN 331 Spanish in the Business World 3(3-0)
Focus on improving linguistic proficiency within the context of the Hispanic business world. Prerequisite: SPN 202 and 203 or equivalent. (*)

SPN 370 Introduction to Hispanic Literature 3(3-0)
Study of the basic tools necessary for analysis and understanding of literature; application of these tools through reading, writing, and discussion of Hispanic texts. Prerequisite: SPN 301 or permission of the instructor. (F,S)

SPN 387 Intensive Spanish Study Abroad (1-12 VAR)
Study of Spanish in an immersion setting abroad preparing the student to become fluent in the language through the study of grammar, civilization and culture. Prerequisite: SPN 202 and 203 or permission of instructor. (*) Repeatable (12)

SPN 391 Special Topics 3(3-0)
Prerequisite: SPN 202 and 203. (*) Repeatable (9)

SPN 394 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: SPN 203 and permission of instructor. (*) Repeatable (7)

SPN 411 Survey of Spanish Literature 3(3-0)
A panoramic overview of Castilian literature from the earliest works in the vernacular to the writings of the post-Franco era. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 412 Survey of Spanish American Literature 3(3-0)
An introduction to the literary and cultural texts of Spanish America and their social, political, intellectual, creative and historical implications. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 421 18th and 19th Century Spanish Literature 3(3-0)
The study of representative works of Spanish literature from 1700 to 1898. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 422 Spanish American Literature from 1900 to 1950 3(3-0)
Intensive analysis of selected readings of Spanish American literature of the first half of the twentieth century. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 424 The Mexican Revolution 3(3-0)
Critical reading of selected texts of the Mexican Revolution and its historical context. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 451 Contemporary Spanish Literature 3(3-0)
Critical reading of selected works of contemporary Spanish Literature. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 452 Contemporary Spanish American Literature 3(3-0)
Critical reading of selected works of contemporary Spanish American Literature. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 460 Literary Theory and Hispanic Literature 3(3-0)
The application of contemporary theory to the reading of Hispanic literature. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 461 Cervantes 3(3-0)
The study of Cervantes, his major works and the period in which they were written. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 462 19th Century Spanish American Literature 3(3-0)
The study of representative 19th Century writers: works by Olmedo Bello, Heredia, Palma, Prieto, Jotabeche, Isaacs, etc. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 471 Medieval and Golden Age Spanish Literature 3(3-0)
An overview of Spanish literature of the Middle Ages and Golden Age, including the evolution of the Spanish language and dominant literary genres. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 472 Colonial Spanish American Literature 3(3-0)
An introduction to the literary and cultural texts of Spanish America before Independence. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 481 Cinema of Spain 3(3-0)
Critical study of selected Spanish Films and their historical context. Prerequisite: SPN 370. (*)

SPN 482 Cinema of Latin America 3(3-0)
Critical study of selected Latin American Films and their historical context. Prerequisite: SPN 370. (*)

SPN 491 Special Topics (1-3 VAR)
Prerequisite: SPN 370 or permission of instructor. (*) Repeatable

SPN 493 Senior Seminar 3(3-0)
In-depth analysis of specific topics, themes, authors, and works in the language literatures and cultures of the Spanish - speaking world. Prerequisite: SPN 370 or permission of instructor. (*)

SPN 494 Field Experience (1-7 VAR)
Continued improvement of language proficiency through experiential learning. Students participate in an immersive target-language environment at home or abroad. Prerequisite: SPN 301 or the equivalent and one of SPN 312-316 plus permission of the instructor. (F,S) Repeatable

SPN 495 Independent Study (1-3 VAR)
Specific themes which address particular problems of literature or culture. May be repeated for credit with approval of major adviser. Prerequisite: SPN 301 or the equivalent and one of SPN 312-316 plus permission of the instructor. (F,S) Repeatable

GRADUATE COURSE

SPN 591 Special Topics (1-3 VAR)
Prerequisite: graduate standing and permission of instructor. (*) Repeatable (9)

SOCIAL WORK (SW)

A grade of C or better is required for prerequisite courses.

UNDERGRADUATE COURSES

SW 100 Introduction to Social Work 3(3-0)
Introduction to the history and philosophy of the social work profession including the knowledge, values, ethics, roles and skills inherent in social work practice. (F,S)

SW 201 Human Behavior and Social Environment I 3(3-0)
Focus on the person in environment throughout the life span with an examination of the relationship between biological, psychological, social, spiritual and cultural systems. Corequisite: SW 100, SOC 101, and/or PSYCH 100. (F)

SW 202 Human Behavior and Social Environment II 3(3-0)
Focus on the person in environment throughout the lifespan with an examination of the impact of larger social systems, including family, groups, communities and organizations. Corequisite: SW 201. (S)

SW 205 Social Welfare in the United States 3(3-0)
Examines the historical development of social work in the United States social welfare system. Critical thinking techniques will be used to analyze policy. (F,S) (Gen Ed: SS, GT-SS1)

SW 210 Statistics for Social Worker 3(3-0)
Introduction to qualitative and quantitative data analysis. Emphasis on descriptive and inferential statistics most utilized in evidence-based social work practice and research. (F,S)

SW 222 Introduction to Community Practice 3(2-2)
Application of the foundation of generalist practice skills. Requires 45 clock hours of volunteer work in an approved human service agency. (F,S)

SW 225 Social Work Policies and Procedures 1(1-0)
Provides fundamental knowledge for social work majors. Includes ethics, handbook, and standards. Corequisite: SW 100, SW 201, SW 202, SW 205, and/or SW 222. (F,S,SS/E)

SW 230 (CS 230) Chicano: Social and Psychological Study 3(3-0)
Social and psychological forces present in the Chicano community. (F) (Gen Ed: SS, GT-SS3) (CC)

SW 250 American Indian Issues 3(3-0)
Foundational knowledge for those interested in working with American Indians; includes law, policy, health, social, community and other issues of reservation and urban populations. (S)

SW 290 Special Projects (1-5 VAR)
Prerequisite: permission of instructor. (*) Repeatable

SW 301 Professional Writing in Social Work 3(3-0)
Ethical and professional documentation for case records and publication in social work practice. Emphasis on current documentation practices and APA writing. Prerequisite: acceptance into the Social Work Program. (F)

SW 310 Social Work Theory 3(3-0)
A comparative approach to explanatory and practice theories relating to social work and the helping professions. Prerequisite: acceptance into the Social Work Program. (F)

SW 320 Human Diversity in Practice 3(3-0)
Critically examines the history, culture, strengths and barriers in social work practice with diverse groups. Identifies skills required for culturally competent practice with populations-at-risk. Prerequisite: acceptance into the Social Work Program. Corequisite: CS 101 or SW/CS 230, and/or a Women's Studies course. (F)

SW 322 Social Work Intervention I 3(3-0)
Elements of generalist micro social work practice and theory. Skill development in assessment, intervention, and evaluation emphasized. Prerequisite: acceptance into the Social Work Program. Corequisite: students who have not yet completed SW 310 and SW 320 must enroll concurrently. (F)

SW 323 Social Work Intervention II 3(3-0)
Generalist mezzo social work practice focusing on small groups and families. Includes assessment, intervention, evaluation and practice theory. May take concurrently with SW 324. Prerequisite: acceptance into the Social Work Program. (S)

SW 324 Social Work Intervention III 3(3-0)
Social work theories and interventions at the macro level; community and organization generalist practice. May take concurrently with SW 323. Prerequisite: acceptance into the Social Work Program. (S)

SW 325 (CS 325) Health in the Chicano Community 3(3-0)
Health care traditions and current health care systems in the barrio. (S)

SW 326 SW Practice with Older Adults 3(3-0)
The biological, psychological, social, cultural and spiritual aspects of aging and the services affecting them. Prerequisite: junior standing or consent from instructor. (*)

SW 327 Child Welfare 3(3-0)
The physical, behavioral, emotional signs of child abuse and neglect; laws designed to protect children, and services available to assist them. Prerequisite: junior standing or consent of instructor. (*)

SW 340 Reintegration for Military Families 3(3-0)
Critically examines the history, culture, strengths and barriers in social work practice with clients who have served in the military and their family members. Prerequisite: SW 100. (F)

SW 350 Social Welfare Policy 3(3-0)
Theory and social work practice related to social policy, problem identification, policy formation, implementation, evaluation and analysis. Development of critical thinking skills for policy analysis. Prerequisite: acceptance into the Social Work Program. Corequisite: any ECON or POLSC course. (S)

SW 365 Understanding Mental Health 3(3-0)
This course provides an introduction to behavioral health diagnoses in the adult population. Prerequisite: SW 202. (S)

SW 481 Field Seminar I 3(3-0)
Capstone course which integrates knowledge, values, skills, and theory with micro, mezzo, macro generalist social work practice with diverse populations in various agency settings. Prerequisite: acceptance into the Social Work Program; successful completion of all SW courses with the exception of field courses. Corequisite: SW 488. (F,S,SS)

SW 482 Field Seminar II 3(3-0)
Capstone course which integrates knowledge, values, skills, and theory with micro, mezzo, macro generalist social work practice with diverse populations in various agency settings. Prerequisite: SW 481, SW 488. Corequisite: SW 489. (F,S,SS)

SW 488 Field Placement I 5(0-16)
Sixteen clock hours per week Fall, 32 per week Spring or Summer I Block for 224 hours in approved agency supervised by professional social worker. Prerequisite: acceptance into the Social Work Program and field practicum; successful completion of all required SW courses with the exception of field courses. Corequisite: SW 481. (F,S,SS)

SW 489 Field Placement II 5(0-16)
Sixteen clock hours per week Spring, 32 per week Spring or Summer II Block for 224 hours in approved agency supervised by professional social worker. Prerequisite: SW 481, SW 488. Corequisite: SW 482. (F,S,SS)

SW 490 Special Projects (1-5 VAR)
Prerequisite: social work major, prior written permission of instructor of record. (*) Repeatable

SW 491 Special Topics (1-3 VAR) (*) Repeatable

SW 492 Research 3(3-0)
Theory and application of continuing social work research designs and methodologies (qualitative and quantitative) utilizing single subject design, needs assessment, and program evaluation. Prerequisite: acceptance into the Social Work Program. Corequisite: SW 210 or MATH 156 or equivalent statistics course. (F,S)

SW 495 Independent Study (1-3 VAR)
Prerequisite: permission of instructor. (*) Repeatable

THEATRE (TH)

UNDERGRADUATE COURSES

TH 111 Theatre Appreciation 3(3-0)
A course emphasizing the understanding of theatre art from the audience's point of view. (*)

UNIVERSITY STUDIES (US)

UNDERGRADUATE COURSES

US 101 Academic & Career Exploration 1(1-0)
Provides undeclared/declared students who are still deciding on their majors an opportunity to assess their abilities, interests and goals while investigating the University's degree programs. (F)

US 151 Introduction to Academic Life 3(3-0)
To provide an opportunity for students to learn and adopt methods to be successful in college. Critical thinking, writing and time management are emphasized. (F,S)

US 251 Student Leadership Development 2(2-0)
Create an opportunity for students to define, learn, adopt, and integrate within themselves the "purpose of leadership". (S)

US 255 Residence Hall Advising 1(1-0)
Will teach student development theory, history of residence life, communication skills and assertiveness training which will enhance the quality of student leaders and resident advisors. (S)

US 350 Orientation Leadership Training 3(3-0)
Course emphasis is to develop a student's leadership and communication skills, enhance knowledge and understanding of University policies and procedures and campus resources and services. (S)

US 355 Becoming an Effective Tutor 3(2-2)
Concepts and techniques of effective tutoring, including issues such as communication, rapport, confidentiality, learning styles, disabilities, and general study skills. Limited hands-on experience required. (*)

WOMEN'S STUDIES (WS)

UNDERGRADUATE COURSES

WS 100 Introduction to Women's Studies 3(3-0)
The course serves two purposes: (1) to train students in feminist perspective-taking, and (2) to introduce them to issues affecting women's lives using an interdisciplinary framework. (F,S) (Gen Ed: SS) (CC)

WS 105 (POLSC, PSYCH, SOC 105) Understanding Human Diversity 3(3-0)
Americans live in a complex and diverse society. This course examines the nature, impact, and strategies for dealing with diversity in personal and social contexts. (*)

WS 206 (SOC 206) Gender and Society 3(3-0)
Examination and evolution of relationships between sex roles, culture, and societal institutions and processes, including an analysis of sexual stratification. (*)

WS 211 (PSYCH 211) Women and Society 3(3-0)
Statistical overview of the current status of women, followed by examination of theories concerning equality of the sexes. (F)

WS 212 (PSYCH 212) Psychology of Diversity 3(3-0)
To raise awareness of social inequities, promote cultural competency & appreciation of differences. (*)

WS 230 (NSG 230) Women, Health and Society 3(3-0)
Introduction to women's health issues and a basic understanding of how women's health has been influenced historically, culturally and by socio-economic factors. (*)

WS 231 (PSYCH, SOC 231) Marriage, Family, and Relationships 3(3-0)
Marriage and family from an institutional and relationship perspective; cross-cultural diversity, mate selection, marital dynamics, parenting, divorce, remarriage, emerging patterns. (F,S,SS) (Gen Ed: SS)

WS 235 (MCCNM 235) Women and Media 3(3-0)
The historical and cultural implications of the mass media's portrayal of women and the extent of their media participation from colonial to contemporary times. (F)

WS 241 (ENG 241) Women in Literature 3(3-0)
Intensive study of literature written by women, in historical, cultural, and critical contexts. Prerequisite: ENG 102. (*)

WS 291 Special Topics (1-3 VAR) (*) Repeatable

WS 301 Theories of Gender, Race, and Class 3(3-0)
Interdisciplinary exploration of feminist theories and the relationships between identity, gender, race, ethnicity, class and other variables. Examines connections between knowledge, ethics, and activism. (*)

WS 305 (SOC 305) Crime and Women 3(3-0)
Exploration of social, cultural and political variables that create both women victims and women criminals. (*)

WS 306 (CS 306) La Chicana 3(3-0)
A social, cultural, and historical overview of the Chicana experience and contributions. (F,S)

WS 330 (MCCNM 330) Gender and Film 3(3-0)
A discussion course which examines gender roles in theatrical and documentary film while considering the perspective of producers, actors, and spectators and salient film theories. Prerequisite: upper division standing in MCCNM or Women's Studies. (S)

WS 335 (ENG, COMR 335) Gender and Communication 3(3-0)
This course examines the ways that gender affects communication behaviors and helps develop an awareness of the processes that affect gender socialization and stereotyping. (*)

WS 341 (CS 341) Chicana Writers 3(3-0)
Survey of Chicana writers from the early 1900s to the present. Along with the literature, aspects of history, sociology and politics will be incorporated. (*)

WS 401 (CS 401) Third World Feminisms 3(3-0)
This course focuses on Third World women's challenging views of global feminism and feminist representations of "other" women. (*)

WS 403 (SOC 403) Human Sexuality and Social Behavior 3(3-0)
Sexuality and sexual conduct from a sociological and social psychological perspective. Prerequisite: junior or senior standing. (*)

WS 407 (SOC 407) Family Violence 3(3-0)
The extent, seriousness, and impact of the major forms of domestic violence. (*).

WS 428 (HIST, SOC 428) Women & Work 3(3-0)
Examines historical and contemporary issues for women of various economic, social, and ethnic groups, especially in the US; examines gender ideologies about paid, unpaid work. Prerequisite: junior or senior standing or permission of instructor. (*)

WS 455 (SOC 455) Hate Crimes 3(3-0)
Examines assumptions about race, gender, sexuality, and others that are used to justify hate crimes; examines common forms, emphasizing causal factors and effects. Prerequisite: SOC 101. (*)

WS 485 Capstone 3(3-0)
Students will develop a project in which they will develop and execute a research assignment related to ethnicity, gender, or diversity. Prerequisite: senior level standing; permission of the instructor. (*)

WS 490 Special Projects (2-6 VAR)
Allows one or more students to conceptualize, create, and complete a project relating to women's studies, under supervision of faculty member(s) approved by WS program. Prerequisite: WS minor, junior or senior standing, and approval of WS curriculum committee. (*) Repeatable (6)

WS 491 Special Topics (1-3 VAR)
Prerequisite: junior or senior standing with adequate preparation or permission of instructor. (*) Repeatable

WS 492 Research (2-6 VAR)
Research project selected by student and supervised by a faculty member with the approval of WS. May be repeated for a maximum of 6 credits. Prerequisite: WS minor, junior or senior standing, and approval of WS curriculum committee. (*) Repeatable (6)

WS 494 Field Experience (2-6 VAR)
Application of the WS disciplinary framework to an off-campus volunteer work experience, under the supervision of a faculty member approved by WS. Prerequisite: WS minor, junior or senior standing, and approval of WS curriculum committee. (*) Repeatable (6)

WS 495 Independent Study (1-3 VAR)
Prerequisite: permission of instructor. (*)

WS 498 Internship (2-6 VAR)
Application of the WS disciplinary framework to a work experience, under the direction of the selected site and a faculty member approved by WS. Prerequisite: WS minor, junior or senior standing, and approval of WS curriculum committee. (*) Repeatable (6)

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Colorado State University-Fort Collins
Dr. Anthony A. Frank	President
Katie Kalkstein	Executive Assistant

Colorado State University-Pueblo
Dr. Lesley Di Mare	President
Niki Whitaker	Interim Executive Assistant

Colorado State University-Global Campus
Dr. Becky Takeda-Tinker	President

ADMINISTRATIVE OFFICES
(Colorado State University-Pueblo)

OFFICE OF THE PRESIDENT

Di Mare, Lesley, President

Folda, Joe, Director, Athletics

Samora, Tracy, Director, Alumni Relations

Whitaker, Niki, Interim Executive Assistant to the President

(Vacant) Director of Equal Employment Opportunity/ Affirmative Action

OFFICE OF THE PROVOST

Kreminski, Richard M., Provost and Executive Vice President for Academic Affairs

(Vacant), Executive Assistant to the Provost

Caprioglio, Helen, Assistant Provost for Assessment, Student Learning, and Effectiveness

Folkestad, William, Dean, College of Humanities and Social Sciences

Gonzales, Rhonda, Dean, University Library

Hannafious, Linda, Executive Support and Grants Manager

Kalevela, Sylvester A., Dean, College of Education, Engineering, and Professional Studies

Lehmpuhl, David W., Dean, College of Science and Mathematics

Milner, Patricia, Program Manager-Distance Learning, Extended Studies

Moreschini, Shelly, Director, President's Leadership Program

O'Connor, John, Director of University Honors Program

Piquette, Jeff, Interim Associate Dean of Teacher Education, College of Education, Engineering, and Professional Studies

Raymond, Bruce C., Dean, Hasan School of Business

Franta, Joe, Interim Associate Dean of Nursing, College of Education, Engineering, and Professional Studies

Yang, Sixian, Acting Director of Institutional Research and Analysis

OFFICE OF THE VICE PRESIDENT FOR FINANCE AND ADMINISTRATION

Spiecker, Karl, Vice President for Finance and Administration

Brewer, Meg, Budget Director

Cason, Craig, Associate Vice President for Facilities Management

Fendrich, Chris, Director, Auxiliary Services

Gonzales, Robert G., Director/Controller, Business Financial Services

Jacobs, Ralph, Director, Human Resources

Matola, Erich, Chief Information Officer

Mestas, Amanda, Executive Assistant and Budget Analyst to the Vice President for Finance and Administration

OFFICE OF THE VICE PRESIDENT OF ENROLLMENT MANAGEMENT AND STUDENT AFFAIRS

(Vacant)**,** Vice President of Enrollment Management and Student Affairs

Alanis, Jennifer, Director, Diversity and Inclusion

Barela, Laura, Director, Veteran Affairs

Gibson, Jeanne, Director, English Language Institute

Gjerde, Michelle B., Director, Career Center

Holliday, Chrissy, Director, Admissions

Humphrey, Marie, Dean of Students and Residence Life

Lopez, Derek, Director, Center for Academic Enrichment

Manos, Michael, Executive Director, College Opportunity Programs/TRiO

Streater, Justin, Associate Director, Financial Aid

Robertshaw, Amy, Registrar

Williams, Annie, Director, International Programs

Zaletel, Cora, Executive Director, External Affairs

FOUNDATION OFFICE

Kelly, Todd, CEO/President, Foundation

Gallegos, Valerie, Director of Finance and Budget

Johnson, Stephanie, Administrative Assistant

Mutz, Samantha, Communications & Stewardship Coordinator

Pagnotta, Susie, Director of Data Analysis and Gift Proc.

Potter, Nick, Director of Scholarships & Donor Relations

Sanchez, Andrew, Director of Development

ADMINISTRATIVE/FACULTY

Di Mare, Lesley (2011) President, Colorado State University-Pueblo; BA, California State University-Chico; MA, California State University-Hayward; Ph.D., Indiana University

Folkestad, William B. (2009) Dean of College of Humanities and Social Science and Professor; BA, Central Washington University; MA, Ph.D., University of Washington

Gonzales, Rhonda (1999) Dean, University Library; BA, Colorado College; MSLIS, Simmons College

Kalevela, Sylvester A. (2005) Dean of College of Education, Engineering, and Professional Studies and Professor of Civil Engineering Technology; B.Sc.Eng., University of Dar-es-Salaam, Tanzania; MS, Virginia Polytechnic Institute and State University; Ph.D., Arizona State University

Lehmpuhl, David (1998) Dean of College of Science and Mathematics and Professor of Chemistry: BS, University of Colorado at Colorado Springs; Ph.D., University of Colorado at Boulder

Kreminski, Richard M. (2009) Provost and Executive Vice President for Academic Affairs; S.B., Massachusetts Institute of Technology; MA, Ph.D., University of Maryland; J.D., Dedman School of Law, Southern Methodist University

Piquette, Jeff (2005) Interim Associate Dean and Professor of Education; BS, Colorado School of Mines; MA, Ph.D., University of Northern Colorado

Raymond, Bruce C. (2012) Dean, Hasan School of Business; BS, Brigham Young University; MBA, Ph.D., University of Utah

Franta, B. Joe (2007) Interim Associate Dean and Associate Professor of Nursing; BSN, Colorado State University-Pueblo; MSN, DNP, Beth-El College of Nursing and Health Sciences at UCCS

ADMINISTRATIVE/PROFESSIONAL STAFF

Alanis, Jennifer (2014) Director of Diversity and Inclusion; BA, Loyola University Chicago, MA, Columbia College Chicago; MA; University of Illinois at Urbana-Champaign; Ed.D, Benedictine University

Alfonso, Gena (2009) Director, Student Engagement & Leadership, Student Life; BS, Colorado State University-Pueblo; MPS, University of Denver

Armstrong, Rebecca (2015) Coordinator of Printing and Publications, External Affairs

Ausbun, Dana (2015) Financial Aid Counselor, Financial Aid; BA, University of Northern Colorado

Barela, Laura (2009) Director of Veteran Affairs; BSW, Colorado State University-Pueblo

Barnosky, John (2007) Architect, Colorado License #B-835, Director of Planning/Construction, Facilities/Physical Plant; BA, University of Colorado

Benesch, Susan (2001) Human Resources Associate; BSBA, University of Northern Colorado

Blaha, Jeremiah (2013) Field Experience Coordinator, Teacher Education; BA, M.Ed., Colorado State University-Pueblo

Blair, Sean (2013) Head Men's Lacrosse Coach, Athletics; BA, Grand Valley State University

Blakey, Kaitlyn (2016) Associate Director of EEO/AA & Title IX Coordinator; BA, Queens University of Charlotte; JD, Charlotte School of Law

Boccumini, Tessa (2015) Athletic Trainer, Athletics; BS, North Park University; MSc University of Colorado at Colorado Springs

Boggs-Elliott, Lacey (2015) Curriculum Lab Coordinator, Teacher Education; BA, St. Andrews Presbyterian College; MS, Pittsburg State University

Bosworth, Diane (2016) Operations Manager, Extended Studies; BA, MS, Regis University

Boughton, Kynna (2009) Financial Aid Operations Specialist, Financial Aid; BSBA, Colorado State University-Pueblo

Brewer, Margaret (1997) Budget Director, Finance and Administration; BSBA, Colorado State University-Pueblo

Brice, Sandy (2006) Academic Adviser, Center for Academic Enrichment; BS, Colorado State University-Pueblo

Campbell, Howard (2002) Network Administrator, Information Technology Services; AAS, Trinidad State Junior College; BS, Colorado State University-Pueblo

Carsella, Jim (2004) Stockroom Coordinator, Chemistry Education; BS, Colorado State University; MS, Colorado State University-Pueblo

Cason, Craig (2004) Associate Vice President for Facilities Management; BS, University of Colorado-Boulder

Cauffiel, Daniella H. (2013) Program Coordinator, Extended Studies; BA, Colorado State University-Pueblo

Charles, Dax (2007) Head Wrestling Coach, Athletics; BS, Colorado State University-Pueblo; MBA, University of Phoenix

Chavez, Veronica (1989) Assistant Director, TRiO Educational Opportunity Center; BSW, Colorado State University-Pueblo

Cornell, Heather (2016) Project Specialist, TRiO Student Support Services; BSBA, Colorado State University-Pueblo

Correa Martinez, Yaneth (2012) PROPEL Curriculum Development Specialist; BS, MS, National University of Colombia

Daugherty, Carol (2012) Director of Student Health and Counseling; AA, BSN, Colorado State University-Pueblo; MSN, FNP, Beth-El College of Nursing & Health Sciences at University of Colorado, Colorado Springs

Davidson, Abby (2014) Curriculum Development Specialist, PROPEL; MA, Prescott College; MS, University of Northern Colorado

De Herrera, Rick R. (2006) Assistant Director of Facilities

Donaghy, Joey (2014) Admissions Counselor, Admissions; BA, Texas Tech University

Duran, Elizabeth (2001) Associate Registrar and Degree Audit Specialist; Registrar's Office; BS, University of Phoenix

Elliott, Sherrea (2013) Admissions Counselor, Admissions; BA, Colorado State University-Pueblo

Encina, Trisha (2014) Procurement Specialist, Purchasing Office; BA, Colorado State University-Pueblo

Escobar Gutierrez, Anaís (2014) International Recruitment Specialist, Center for International Programs; BA, Colorado State University-Pueblo

Fendrich, Chris (2011) Director, Auxiliary Services; BS, Bradley University; MBA, Colorado State University-Pueblo

Ferguson, Gina (2013) Director, Upward Bound; BA, Colorado College; MS, University of Kansas

Folda, Joseph (1987) Athletic Director, Athletics; BS, University of Northern Colorado; M.Ed., Eastern Washington University

Foley, Peggy H. (2008) Adviser/Counselor, Department of Nursing; BS, Colorado State University-Pueblo

Fruland, Bonnie (2015) Coordinator of Student Life, Student Life; BA, MSOL, Regis University; MA, University of Saint Thomas

Gabriel, Timothy (2014) Assistant Strength and Conditioning Coach, Athletics; BS, University of Colorado, Colorado Springs; MS, Texas A&M University-Corpus Christi

Gallegos, Monica (2015) Residence Life Coordinator, Residence Life and Housing; BA, BS, Regis University

Gibson, Jeanne D. (2005) Director, English Language Institute; BA, Brown University; MA, Ph.D., University of California at San Diego

Gibson, Shawn (2014) Site Coordinator, Veteran's Upward Bound; AAS, Pikes Peak Community College, BS, MS, Colorado Technical University

Gjerde, Michelle B. (1997) Director, Career Center; BA, Colorado State University-Pueblo

Gonzales, Deirdre (2013) Manager Athletics-Internal Operations; BS, Colorado State University

Gonzales, Robert G. (2011) Director/Controller, Business Financial Services; BS, Colorado State University-Pueblo; MS, University of Colorado

Gonzalez, Carolina (2012) Staff Accountant, Business Financial Services; BSBA, Colorado State University-Pueblo

Gorham Blanco, Tracey (2015) Math Learning Center Coordinator; BS, University of Texas at El Paso; MA, Ph.D., University of Wyoming

Gregorich, Megan (2011) Employer Relations Specialist, Career Center; BA, Gonzaga University

Grutt, Elizabeth (2006) Adviser, Extended Studies; BS, Colorado State University-Pueblo; MA, University of Colorado at Colorado Springs

Hanna, William (2012) PROPEL Data Analyst; BA, University of Colorado, Denver; MA, Colorado State University

Hannafious, Linda (2012) Executive Support and Grants Manager; BSBA, Colorado State University-Pueblo

Hart, Devin (2015) Athletic Trainer, Athletics; BS, Colorado State University-Pueblo; MSc, University of Colorado at Colorado Springs

Hatfield, John Paul (2005) Instrument Technician, Chemistry Department; BS, MS, Colorado State University-Pueblo

Hausman, Jolene (2015) Outreach Specialist Conferences and Short Courses, Extended Studies; BA, MBA, Colorado State University-Pueblo

Hedrick, Allen (2009) Head Strength & Conditioning Coach, Athletics; BA, Cal State University-Chico; MA, Cal State University-Fresno

Hernandez, Daniel (2014) Colorado Springs Site Coordinator, TRiO Educational Opportunity Center; AA, Pueblo Community College; BS, Colorado State University-Pueblo

Hiniker, Justin (2013) Director of Disability Resource & Support Center; BA, Winona State University

Hinshaw, Jami (2014) Director of Residence Life and Housing; MPA, Eastern Washington University

Holliday, Chrissy (2014) Director of Admissions, BA, Campbell University; MS, Capella University

Horman, Nicholas (2013) Assistant Athletic Trainer, Athletics; BS, Texas State University; MS, University of Colorado-Colorado Springs

Hughes, Hunter (2007) Football Defensive Coordinator, Athletics; MA, Middle Tennessee State University

Humphrey, Marie (2014) Dean of Students and Residence Life; BA, MSPH, University of Alabama at Birmingham; Ph.D., Colorado State University

Ihnat, Mychael (2015) Residence Life Coordinator, Residence Life and Housing; MS, Minnesota State University, Mankato

Jacobs, Ralph (2012) Director, Human Resources. BA, Weber State University; MPA, University of Nebraska at Omaha

Johnson, Tommie (2009) Assistant Men's Basketball Coach, Athletics; BS, University of Colorado at Colorado Springs

Keller, Patricia (2012) Graduate Nursing Program Associate; BA, Colorado State University-Pueblo

Kingrey, Tiffany (2008) Assistant Director of Admissions; BA, Colorado State University-Pueblo

Koschke, Josh (2009) Head Men's/Women's Golf Coach and Director of Marketing, Athletics; BS, Colorado State University-Pueblo

Krider, Jack (2008) Director Student Recreation; BA, MA, University of Northern Colorado

Laino, Heidi (1997) Assistant Director, NSE Coordinator, Center for International Programs; BSBA, MBA, Colorado State University-Pueblo

Langoni, Ashley (2014) Assistant Softball Coach, Athletics; BS, Louisiana State University

Larson, Carol (2014) Transfer Counselor, Registrar's Office; BS, Texas A&M University

Larson, Dax (2014) Athletic Media Relations Director, Athletics; BS, MS, Minnesota State University, Mankato

Leomiti, Donnell (2008) Football Defensive Backs Coach/Recruiting Coordinator, Athletics; BA, University of Colorado

Lobato, Mathew (2015) Admissions Counselor, Admissions; BA, Colorado State University; MA, Universidad de Alcala Henares

Lopez, Derek (2007) Director, Center for Academic Enrichment; BA, Colorado State University-Pueblo; Ph.D., Stanford University

Lowell, Sarah (2015) Accounts Payable Specialist, Business Financial Services; BSBA, Colorado State University-Pueblo

Lucero, Gene (2006) Undergraduate Academic Adviser, Hasan School of Business; BS, MBA, Colorado State University-Pueblo

Mangino, Jenna (2013) Station Media Manager; KTSC-FM; AA, Trinidad State Junior College; BS, Colorado State University-Pueblo

Manos, Michael D. (2003) Executive Director, College Opportunity Programs/TRiO; BS, Central Missouri State University; MA, Webster University; MA, University of Colorado at Colorado Springs

Marquez, Melissa (2010) Graduation Evaluator, Registrar's Office; BA, Metropolitan State University of Denver

Martin, Jennifer (2015) Human Resources Specialist; BS, Goldey-Beacom College

Martin, Lisa (1995) Assistant Director, Student Recreation Center; BS, Colorado State University-Pueblo

Mascarenas, Christina (2014) Student Success Coordinator, Upward Bound; BS, Colorado State University-Pueblo; MA, University of Colorado at Colorado Springs

Matola, Erich (2012) Chief Information Officer, Information Technology Services; AS, Community College of the Air Force; BA, University of Maryland, College Park; MA Chapman University; MS, College of Notre Dame, Belmont

McKenzie, Kenneth (2011) Interlibrary Loan Assistant; BS, Colorado State University-Pueblo

McKinney, Joseph A. (2008) Retention Specialist, TRiO Student Support Services; BA, Colorado State University-Pueblo; MA, Colorado State University

McMahan, Paige (2014) Assistant Women's Swim and Dive Coach, Athletics; BS, Colorado State Univerity

Melin, Carl (1985) Associate Director Transfer Counseling and Articulation, Registrar's Office; BA, Adams State College; MS, University of Southern California

Mestas, Amanda (2005) Executive Assistant and Budget Analyst to the Vice President for Finance and Administration; BSBA, Colorado State University-Pueblo

Milavec, Frank (2004) Student Technology Support Specialist, Information Technology Services; BS, Colorado State University-Pueblo

Milliken, Christopher E. (2013) Network Administrator, Information Technology Services; BS, American Sentinel University

Milner, Patricia (2011) Program Manager, Extended Studies; BA, Sterling College; MA, University of Colorado, Denver; Ph.D., University of Colorado, Colorado Springs

Minatta, Louis (1996) Graduation Evaluator, Registrar's Office; AAS, Pikes Peak Community College; BS, Colorado State University-Pueblo

Montoya, Lisa (2015) Program Coordinator, TRiO Upward Bound; AAS, Pueblo Community College

Moore, Benton (2013) Financial Aid Counselor, Financial Aid; BS, Colorado State University-Pueblo

Moore, Bettina (2012) PROPEL Project Director; BA, Lehigh University; ME, University of Colorado at Colorado Springs

Moore, Dennis (2002) Director, Hoag Hall; BA, Colorado State University-Pueblo

Moorman, Bill (2015) Coordinator of Intramural and Club Sports, Student Recreation; BS, Colorado State University-Pueblo; MPA, Drake University

Moreschini, Shelly (2004) Director, President's Leadership Program; BS, Colorado State University-Pueblo; MA, Regis University

Morris, Matthew (2013) Head Track and Field/Cross Country Coach; BS, University of Montana; MS, Western Illinois University.

Morris, Racheal (2014) Associate Athletic Director/Director of Development, Athletics; BS, Buena Vista University; MS, Western Illinois University

Muhe, Jill (2016) Head Women's Volleyball Coach, Athletics; BS, University of California, Davis; MBA, University of La Verne, Ph.D., Capella University

Nordholm, Holand (2015) Program Coordinator-Colorado Springs, Extended Studies; BSBA, Colorado State University-Pueblo; MA, Webster University

Obregon, Victoria Ann (2011) Regional Site Coordinator, College Assistance Migrant Program; BA, Colorado State University-Pueblo; MA, Adams State College

Ojeda, Bob (2012) Veterans Education Benefits Coordinator; BA, University of Puerto Rico; MS, University of Bridgeport

Pantoya, John (2013) Academic Adviser, Center for Academic Enrichment; BS, Colorado State University-Pueblo

Pearson, Brian (2013) Head Women's Swimming/Diving Coach, Athletics; BS, University of Wyoming

Peralta, David (2009) Academic Adviser, Center for Academic Enrichment; BA Colorado State University-Pueblo

Pfingston, Valerie (1997) Senior Accounting Manager, Business Financial Services; BSBA, Colorado State University-Pueblo

Pickering Chad M. (2014) Writing Room and CHASS General Education Tutoring Coordinator; AA, Leeward Community College; BA, MA, University of Hawaii-Manoa

Pocius, Adam (2008) Information Technology Manager, Instructional Technology Services; BS, Colorado State University-Pueblo

Potter, Monica (2013) Head Women's Lacrosse Coach, Athletics; BS, Webster University; MBA, Lindenwood University

Regrutto, Paul (2012) Head Women's Soccer Coach, Athletics; BS, Colorado State University-Pueblo

Rincon, Eric (2004) Pueblo Site Coordinator, TRiO Educational Opportunity Center; BS, Colorado State University-Pueblo

Rivera, Jamie (2007) Office Assistant, Center for Academic Enrichment; AS, Pueblo Community College

Robertshaw, Amy (2013) Registrar, Registrar's Office; BS, University of Minnesota; MA, University of Colorado-Denver

Robertshaw, Scott (2004) Associate Director, Student Recreation; BS, Western Illinois University; MA, Georgia College & State University

Ruiz, Kandy (2014) Trinidad Site Coordinator, TRiO Educational Opportunity Center; BA, BS, Colorado State University-Pueblo

Samora, Tracy (2009) Director of Alumni Relations; BS, Colorado State University-Pueblo

Sanchez, Stan (1994) Head Baseball Coach, Athletics; BS, California State University; MA, Azusa Pacific University

Sandoval, Christina (2014) Program Coordinator, Upward Bound; BS, M.Ed., University of Phoenix, MA, Adams State University

Sandoval, John (2005) Academic Adviser and Advising Coordinator, Center for Academic Enrichment; BS, Adams State College

Schleif, Mark (2012) Head Men's Tennis Coach, Athletics; AA, Indian River Community College

Sewell, Samuel (2014) Assistant Football Coach; Athletics; BA, University of Northern Colorado

Shelman, Matisha (2014) Instructional Technologist; Information Technology Services; BS, Fort Hays State University; BS, Colorado State University-Pueblo; M.Ed., Lesley University

Simons, Michael (2010) MMCR Technician, Information Technology Services; BS, Colorado State University-Pueblo

Smiley, Joanne (2012) Psychiatric Nurse Practitioner, Student Health and Counseling; RN, BSN, MSN, Beth-El College of Nursing and Health Sciences at UCCS

Souder, Donna M. (2008) Grant Project Director/Director, of the Center for Teaching & Learning; BS, MA, Texas A&M University-Texarkana; Ph.D., Texas Women's University

Spencer-Workman Sarah (2013) PROPEL Sustainability Education Specialist; BENVD University of Colorado, Boulder; MRP, University of Massachusetts; LEED Professional

Spiecker, Karl (2014) Vice-President for Finance and Administration; BS, University of Colorado-Boulder; MPP, Ford School of Public Policy, University of Michigan, Ann Arbor; MS, University of Michigan, Ann Arbor

Stallings, Michelle (2016) Graduation Evaluator, Registrar's Office; BA, University of Colorado, Colorado Springs

Stanley, Roy (1994) Head Coach, Men's and Women's Soccer, Athletics; BA, Princeton University; MA, University of Tulsa

Stevens, Theresa (2015) Shipping Receiving Supervisor/ Textbook Assistant, Bookstore; BSBA, Colorado State University-Pueblo

Streater, Justin (2015) Associate Director of Financial Aid, Financial Aid;

Street, Sommer (2016) Interim Marketing and Communications Specialist, External Affairs; BSBA, Colorado State University-Pueblo

Swope, Melissa (2014) Financial Aid Specialist-Loan Programs, Financial Aid; BS, Colorado State University-Pueblo; MA, University of Arizona

Swope, Strider (2016) International Education Program Assistant, Center for International Programs; AA, AGS, AAS, Pueblo Community College; BSBA, MBA, Colorado State University-Pueblo

Tafoya, Amy L. (2012) Program Coordinator Distance Learning, Extended Studies; BS, University of Phoenix; MBA, Colorado Technical University

Taibi, Vonnie (2011) Head Cheer/Dance Coach, Athletics

Tapia, Felicia (2010) Online Writing Lab (OWL) Coordinator, Center for Academic Enrichment and Administrative Assistant, RAGE; BA, Colorado State University-Pueblo

Thorsten, Greg (2005) Assistant Director of Financial Aid, Financial Aid; BA, University of Northern Colorado

Trujillo-Aranda, Brenda (1996) Director, TRiO Student Support Services; AAS, Pueblo Community College; BS, Regis University; MA, Adams State College

Turgeon, Jim (2015) Head Women's Basketball Coach, Athletics; BA, Washburn University

Turner, Ralph (2011) Head Men's Basketball Coach, Athletics; BA, Lipscomb University; MA, Tennessee State University

Unglaub, Ricardo A.G. (2014) Laboratory Coordinator for Physics and Engineering Departments; EEE, National University of Cordoba, Argentina; MS, Cal Poly Pomona, Ph.D., University of Colorado, Colorado Springs

Varela, Jacobo (2016) Director, Veterans Upward Bound; BBA, MPA, New Mexico State University

Vigil, Lisa (2011) Admission Counselor, Admissions; BA, Colorado State University-Pueblo

Waggener, Beverly, (2004) Retention Specialist, Nursing; BSN, University of Missouri; MS, Portland State University

Walda, Kevin (2005) Assistant Director, TRiO Veterans Upward Bound; BS, University of Colorado, Colorado Springs; MA, University of Colorado

Wallgren, Jacklin (Jackie) (2015) Associate Athletic Director, Compliance/Senior Woman Administrator, Athletics; BS, University of Wisconsin-Superior; MA, University of North Carolina at Chapel Hill

Walsh, Patrick (2008) System Software/Net Administrator; Information Technology Services; BS, Colorado State University Pueblo

Ward, Craig (2012) Assistant Defensive Football Line Coach, Athletics

Welte, Mark (2013) Manager of Network Support Service, Information Technology Services; BSIE, MBA, Colorado State University-Pueblo

Whatley, Nancy (1986) Assistant Director, TRiO Educational Opportunity Center; AS, Otero Junior College

Whitaker, Niki (2006) Interim Executive Assistant to the President, President's Office; BS, Colorado State University-Pueblo

White Davis, Kristyn (2011) MBA Director/Special Assistant to Dean, Hasan School of Business; BS, MA, University of Colorado-Boulder

Williams, Annie (1994) Director, Center for International Programs; BA, MBA, Colorado State University-Pueblo

Willis, Jordan (2011) Assistant Volleyball Coach, Athletics; BA, MA, St. Mary's College of California

Wristen, John T. (2007) Head Coach Football, Athletics; BS, Colorado State University-Pueblo; MA, Adams State College

Yang, Sixian (2008) Acting Director, Institutional Research and Analysis; BA, Peking University; MBA, Marquette University, Master of Philosophy in Accountancy, City University of Hong Kong

Zaletel, Cora (2002) Executive Director, External Affairs; BS, MA, Emporia State University; Ph.D., ABD, University of Kansas

Zichterman, Jason (2011) Assistant Cross Country and Track Coach, Athletics; BA, Pacific University; MS, Chadron State College

Zinanti, Christie (2012) Head Softball Coach, Athletics; BS, Brigham Young University

RANKED FACULTY

The following individuals were ranked faculty members in the 2016-2017 academic year. The date in parenthesis indicates the initial year of regular appointment to the ranked faculty.

Ahmadian, Ahmad (1985) Professor of Management; BA, Tehran University; MBA, Ph.D., North Texas State University

Allen, Beverly (2009) Associate Professor of Library Services; BA, MA, University of Missouri-St. Louis; MSLS, University of Illinois at Urbana-Champaign

Arnegard, Iver (2011) Associate Professor of English; BA, University of Montana; MFA, University of Alaska-Fairbanks; Ph.D., Ohio University

Aviña, Maya (1995) Professor of Art; BA, Humboldt State University; MFA, University of California at Santa Barbara

Baca, Judy M. (1981) Associate Professor of Social Work; BS, Colorado State University-Pueblo; MSW, Arizona State University

Balek, Kathryn M. (2015) Assistant Professor of Library Services; AA, North Iowa Area Community College; BA, University of Northern Iowa; MA, University of Missouri-Columbia

Barnett, Janet H. (1990) Professor of Mathematics; BS, Colorado State University; MA, Ph.D., University of Colorado

Bedoya-Valencia, Leonardo (2009) Associate Professor of Engineering; BS, MS, National University of Colombia, Mines School, Medellin; Ph.D., Old Dominion University

Belport, Susan (2009) Associate Professor of Nursing; BSN, Colorado State University-Pueblo; MSN, Beth-El College of Nursing and Health Sciences at UCCS

Bencini, William K. (2010) Assistant Professor of Automotive Industry Management; AAS, John A. Logan Community College; BA, Monmouth College; MA, Northern Arizona University

Berardi, Gayle K. (1994) Professor of Political Science; BA, MA, University of Colorado at Colorado Springs; Ph.D., University of Colorado

Bonetti, Sandra J. (1991) Professor of Chemistry; BS, Ph.D., Georgia Institute of Technology

Bowan, Daniel (2014) Assistant Professor of Exercise Science, Health Promotion and Recreation; BS, MS, University of Tennessee

Brennan, Ian (2003) Professor of Marketing; BA, University of Nottingham; MBA, University of Evansville; Ph.D., University of Texas-Arlington

Brett-Green, Barbara (2010) Assistant Professor of Psychology; BA, Rutgers University; MA, Ph.D., University of Colorado at Boulder

Bridgmon, Krista D. (2008) Associate Professor of Psychology; BS, MS, M.Ed., Ph.D., Northern Arizona University

Brown, William C. (2000) Associate Professor of Physics; BA, Wayne State University; MS, Ph.D., University of Colorado

Calhoun-Stuber, Susan (1994) Assistant Professor and Department Chair of Sociology and Anthropology; BA, Knox College; MA, Ph.D., University of Denver

Caprioglio, Daniel (1993) Professor of Biology; BA, University of California at Los Angeles; Ph.D., North Carolina State University

Caprioglio, Helen M. (1995) Assistant Provost for Assessment, Student Learning, and Effectiveness and Associate Professor of Biology; BS, MS, Oregon State University; Ph.D., North Carolina State University

Carter, Colette (1994) Assistant Professor of Political Science and Chair of History/Political Science/Philosophy/Geography Department; BA, Incarnate Word College; MA, Catholic University; Ph.D., University of Washington

Cerankowski, Leah (2007) Associate Professor of Nursing; BSN, St. Xavier College, Chicago; MSN, University of Colorado, Health Sciences Center

Chacon, Paul R. (1990) Professor of Mathematics; BS, University of British Columbia; Ph.D., University of Washington

Chi, Jacob (1997) Professor of Music and Conductor of the Symphony; BA, Siena Heights College; MA, School of Music, University of Michigan; Ph.D., Michigan State University

Cho, Joey J. (2008) Associate Professor of Computer Information Systems; BCE, MCE, Chungbuk National University, Korea; BS, MCS, Ph.D., Utah State University

Clark, Laura (2002) Clinical Instructor of Athletic Training, EXHPR; BS, Pennsylvania State University; MS, University of Arizona

Clark, Roger (2002) Director of Athletic Training Education Program and Associate Professor, EXHPR; BS, University of Illinois; MS, University of Arizona; Ph.D., University of Pittsburgh

Cobián-Klein, Dora Luz (1995) Professor of Spanish; BA, MA, University of California at San Diego; Ph.D., University of California at Riverside

Conrad, Paul (2011) Assistant Professor of History; BA, Stony Brook University; MA, Ph.D., University of Texas at Austin

Conroy, Colleen (2001) Clinical Instructor of Athletic Training, EXHPR; BS, New Mexico State University; MSEd, Northwest Missouri State University

Coram, Cathy (2014) Assistant Professor of Nursing; ADN, Otero Junior College, BSN, MS, Colorado State University-Pueblo; Ph.D., University of Northern Colorado

Correa-Martinez, Yaneth C. (2009) Assistant Professor of Supply Chain Management/POM; BS, MS, National University of Columbia; ABD, Old Dominion University

Cranswick, Matthew A. (2012) Assistant Professor of Chemistry; BS, Oregon State University; Ph.D., University of Arizona

Dallam, George (1999) Professor of Exercise Science, Health Promotion and Recreation; BS, MS, University of Arizona; Ph.D., University of New Mexico

Dalton, Dennis (1993) Professor of Art; BA, University of Toledo; MFA, University of Utah

DePalma, Jude (1997) Professor of Engineering; BSEE, University of Florida; MSEE, Purdue University; Ph.D., Colorado State University

DePalma, Ruth (1995) Undergraduate Nursing Program Coordinator and Associate Professor of Nursing; BSN, John Hopkins University; MSN, University of Florida

Diawara, Moussa (1993) Professor of Biology; BS, Institute Polytechnique Rural de Katibougeu, Mali, West Africa; MS, Ph.D., University of Georgia

Dillon, David (2005) Assistant Professor of Chemistry; BS, MS, East Texas State University; Ph.D., University of Wyoming

Druelinger, Melvin L. (1984) Professor of Chemistry; BS, Indiana University; Ph.D., University of Wisconsin

Duncan, Kevin C. (1994) Professor of Economics; BA, University of California at Riverside; Ph.D., University of Utah

Ebersole, Samuel (1990) Professor of Mass Communications; BA, Southern California College; MA, Ph.D., Regent University

Eriksen, Scott (2005) Professor of Accounting; BS, University of Illinois; MS, Ph.D., University of North Texas

Eskew, Douglas (2008) Associate Professor of English; BA, MA, Ph.D., University of Texas-Austin

Farrer, Richard (2006) Associate Professor of Chemistry; BS, Aquinas College, Grand Rapids, Michigan; Ph.D., Boston College

Foust, Carol (2001) Professor of Exercise Science, Health Promotion, and Recreation; BS, MS, University of New Mexico; M.Ed., Lamar University; Ph.D., Texas A&M University

Fowler, Karen L. (2008) Professor of Management, BS, Colorado State University-Pueblo; MBA, University of Wyoming; Ph.D., University of Nebraska-Lincoln

Fraser, Jane (1998) Professor and Department Chair, Engineering; BA, Swarthmore College; MS, Ph.D., University of California at Berkeley

Frounfelker, Savra (2015) Assistant Professor of Social Work; BA, Whittier College; MSW, California State University, Sacramento; Ph.D., University at Buffalo, School of Social Work

Funk-Neubauer, Darren (2007) Associate Professor of Mathematics; BS, University of Michigan-Dearborn; MA, Ph.D., University of Wisconsin-Madison

Furrh, Douglass (2011) Assistant Professor of English; BA University of Texas; MA University of Nevada-Reno; Ph.D., University of Washington

Gabaldon, Annette (2004) Associate Professor of Biology; BS, New Mexico State University; Ph.D., University of California-Davis

Gaughan, Judy (2012) Associate Professor of History; BA, San Francisco State University; MA, Ph.D., University of California at Berkeley

Gilbreath, Brad (2008) Professor of Management; BA, MBA, Baylor University; MS, Purdue University; Ph.D., New Mexico State University

Gomme, Ian (1995) Professor of Sociology; BA, University of Waterloo; B.Ed., Queen's University; M.Ed., University of Toronto; MA, University of Guelph; Ed.D, University of Toronto

Goss, Justin R. (2015) Assistant Professor of Marketing; BA, Long Beach State; MS, Montana State University; Ph.D., University of Texas at San Antonio

Grunert, Jonathan D. (2016) Assistant Professor of Library Services; BA, Eastern University; MSLS, The Catholic University of America; MA, MS, Virginia Polytechnic Institute and State University

Gula, Joanne (2015) Assistant Professor of Mass Communications; Ph.D., University of Massachusetts-Amherst

Hackett, Colleen (2015) Assistant Professor of Sociology; Ph.D., University of Colorado, Boulder

Hansen, Richard (1993) Professor of Art; BA, College of William and Mary; MLA, University of Colorado

Hansen, Victoria (1993) Professor of Art; BA, College of William and Mary; MFA, Kansas State University

Harris, Mathew L. (2005) Professor of History; BA, MA, Brigham Young University; M.Phil., Ph.D., Syracuse University

Hassan, Aun (2009) Associate Professor of Economics; BA, MA, Punjab University, Pakistan; Ph.D., Texas Tech University

Heintzelman, Jacinda (2014) Assistant Professor of Nursing; BSN, Bloomsburg University of Pennsylvania; MSN, Walden University

Hudock, Sandra (1997) Professor of Library Services; BA, Gordon College; MSLS, University of Kentucky; MA, Colorado State University

Huff, Richard A. (1997) Associate Professor, Computer Information Systems; BS, San Diego State University; MS, North Texas State University; Ph.D., University of North Texas

Ihm, Dana E. (2005) Professor of Music; BA, MM, Pittsburg State University; Ph.D., University of South Carolina

Jaksic, Nebojsa I. (2000) Professor of Engineering; BSEE, Belgrade University, Belgrade, Yugoslavia; MSEE, MSISE, Ph.D., Ohio State University

Johnson, Joel W. (2010) Associate Professor of Political Science; BA, San Jose State University; MA, Ph.D., University of California, San Diego

Kinney, Chad (2007) Department Chair and Professor of Chemistry and Director, RAGE Program; BA, University of California at San Diego; Ph.D., Colorado School of Mines

Kwon, He-Boong (2012) Associate Professor of Production and Operations Management; BS, Republic of Korea Air Force Academy; MS, Ph.D., Florida Institute of Technology; MBA, Pacific Lutheran University; Post-Doctoral Bridge Program, University of Toledo

Langer, Carol L. (2014) Professor and Department Chair of Social Work; BA, Peru State College; MSW, University of Nebraska-Omaha; Ph.D., University of Nebraska-Lincoln

Liebel, Steven R. (2012) Assistant Professor of Political Science; BA, MA, Texas Tech University; Ph.D., University of North Texas

Long, Yuan (Yoanna) (2006) Associate Professor of Computer Information Systems; BS, China University of Geoscience; MS, East China Computer Institute; Ph.D., University of Nebraska-Lincoln

Louisell, James (1989) Professor of Mathematics; BS, Ph.D., University of Minnesota

Lovato, Samuel (2003) Professor of Mass Communications; BS, Colorado State University-Pueblo; MA, University of Northern Colorado

Lundberg, Bruce (1993) Department Chair and Professor of Mathematics; BS, Grand Canyon University; MA, Arizona State University; MA, Fuller Theological Seminary; Ph.D., Colorado State University

Martinez, Lee Anne (1992) Associate Professor of Biology; BA, University of California at Santa Barbara; MA, University of California at Santa Cruz; Ph.D., Cornell University

Massey, Margie (2000) Associate Professor of Education; AGS, Pueblo Community College; BSBA, Colorado State University-Pueblo; MS, Ed.D, University of Wyoming

McClaran, Steve (2008) Associate Professor and Department Chair, EXHPR Department; BS, MA, University of Northern Colorado; MS, Colorado State University; Ph.D., University of Wisconsin

McGettigan, Timothy (2000) Professor of Sociology; BA, University of California, Santa Barbara; MA, Ph.D., Washington State University

Mejias, Roberto J. (2013) Assistant Professor of Computer Information Systems; BS, MS, Ph.D., University of Arizona

Melnykov, Igor (2005) Associate Professor of Mathematics; BS, Kharkov State Polytechnic University, Kharkov, Ukraine; Ph.D., Bowling Green State University

Messer, Chris (2008) Associate Professor of Sociology; BA, MA, Ph.D., Oklahoma State University

Metchkov, Zahari (2010) Associate Professor of Music; BM, MM, DMA, Cleveland Institute of Music

Mills, Alan W. (2008) Director of Bands and Associate Professor of Music; BA, University of Minnesota-Morris; M.M.E., University of Colorado; M.M., University of Arizona, Ph.D., Florida State University

Mincic, Michael A. (2005) Associate Professor and Department Chair of Civil Engineering Technology, Construction Management, and Automotive Industry Management; BSCET, Colorado State University-Pueblo; M.Ed., Colorado State University; Professional Surveyor-Colorado and New Mexico

Montoya, Fawn-Amber (2007) Associate Professor and Coordinator of Chicano/a Studies; BA, Brigham Young University; MA, Ph.D., University of Arizona

Montoya, Yvonne (2012) Assistant Professor of Communication and Rhetoric; BA, University of Colorado-Boulder; MA, University of Phoenix; Ph.D., Arizona State University

Morales, Juan (2007) Associate Professor of English and Director of Creative Writing; BA, Colorado State University-Pueblo; MFA, University of New Mexico

Nichols, Janet G. (1977) Associate Professor of Mathematics; BA, Adelphi University; MS, Lehigh University

O'Connor, John K. (2008) Associate Professor of Philosophy and Director of Honors Program; BA, Middle Tennessee State University; MA, Northern Illinois University; Ph.D., Boston College

Pardue, Karen (2005) Associate Professor of Library Services; BA, University of Colorado-Colorado Springs; MSLIS, University of Illinois at Urbana-Champaign

Peters, Caroline (2006) Assistant Professor of Art; BFA, Northern Illinois University; MFA, University of Montana

Peters, Timothy W. (2005) Associate Professor of Education; BA, Carleton College; MS, University of Michigan; Ed.D, University of Wyoming

Pettit, Sue L. (2005) Associate Professor of Education; BS, University of North Dakota; M.Ed., Ed.D, University of Northern Iowa

Piazza, Jenny (1996) Associate Professor of Education; BA, Park College; MA, Adams State College; Ed.D., Oklahoma State University

Picicci, Chris L. (2008) Associate Professor of Italian; BA, Gonzaga University; MA, Ph.D., University of Oregon

Poritz, Jonathan (2007) Associate Professor of Mathematics; A.B., Harvard University, S.M., Ph.D., University of Chicago

Pratarelli, Marc E. (1999) Director of University Honors Program and Professor of Psychology; BA, University of California, San Diego; MA, Ph.D., University of Southern California

Proctor, Kristina G. (1989) Professor of Chemistry; BS, Colorado State University-Pueblo; Ph.D., Colorado State University

Ramos, Claire V. (2013) Assistant Professor of Biology; BA, Bowdoin College; Ph.D., Washington State University

Rees, Jonathan (1999) Professor of History; BA, University of Pennsylvania; MA, Ph.D., University of Wisconsin-Madison

Regassa, Hailu (1989) Professor of Finance; BBA, Haile Selassie University, Ethiopia; MBA, Ph.D., University of Oregon

Ribadeneira, Alegria (2006) Associate Professor of Spanish; BA, Fort Lewis College; MA, Ph.D., University of Florida, Gainesville

Richmond, Pam (2009) Associate Professor of Social Work; BA, Saint Joseph College; MSW, University of Wisconsin-Milwaukee; Ph.D., Ohio State University

Robbe, Cathi J. (2006) Associate Professor of Automotive Industry Management; BS, Colorado State University-Pueblo; MS, Capella University

Rochester, Christine (2000) Professor of Exercise Science, Health Promotion, and Recreation; BS, Indiana University of Pennsylvania; MS, Canisius College; Ed.D., University of Northern Colorado

Shah, Abhay (1988) Department Chair, Hasan School of Business and Professor of Marketing; BA, St. Xavier's College (Calcutta University); MBA, University of Evansville; Ph.D., Oklahoma State University

Smith, Jeff (2006) Associate Professor of Biology; BA, BS, University of Minnesota; Ph.D., University of New Mexico School of Medicine

Steel, J. Jordan (2015) Assistant Professor of Biology, BS, Brigham Young University, Idaho; Ph.D., Colorado State University

Steffen, Leticia (2004) Professor of Mass Communications; BA, Saint Louis University; MA, University of Denver

Taylor, Cynthia (1989) Associate Professor of English and Chair of the Department of English and Foreign Languages; BA, MA, University of Idaho; Ph.D., University of Minnesota

Taylor, Ted (1990) Assistant Professor of English; BA, MA, University of Idaho; Ph.D., University of Minnesota

Trujillo, Daniel (2015) Assistant Professor of Construction Management; BA, University of Colorado, Boulder; MS, University of Denver

Vanden Heuvel, Brian D. (2004) Professor of Biology and Department Chair; BS, Colorado State University; Ph.D., University of Texas at Austin

Volk, David (2013) Associate Professor of Music and Department Chair; BM, MM, Florida State University; DMA, University of Georgia

Wakefield, Michael (2000) Professor of Management; BA, MBA, New Mexico State University; Ph.D., University of Nebraska-Lincoln

Walker, W. Richard (2015) Associate Professor and Chair of Psychology; BA, Ohio State University; MS, Ph.D., Kansas State University; Ph.D.,

Whited, Hsin-hui (Ida) (2001) Professor of Finance; BS, Soochow University; MA, Ph.D., The Claremont Graduate School

Wollega, Ebisa (2015) Assistant Professor of Engineering; BS, Mekelle University, MS, Ph.D., University of Oklahoma

Wright, Carl (2013) Professor of Accounting; BS, Virginia State University; MBA, Virginia Commonwealth University; Ph.D., Jackson State University

Yescavage, Karen (1992) Professor of Psychology; BS, Northwest Missouri State University; MA, Ph.D., University of North Carolina-Greensboro

Yuan, Ding (Elena) (2007) Associate Professor of Engineering; Bachelor of Engineering, Dalian University of Technology, P.R. China; Ph.D., New Jersey Institute of Technology

Zizza, Frank (2009) Professor of Mathematics; BS, CUNY Queens College; Ph.D., University of California, Berkeley

LECTURERS

Bremer, Adrianne (2006) Lecturer of Mathematics; BS, MS, University of Southern Mississippi

Brown, Paul (2011) Lecturer of Biology; BA, Earlham College; MS, Purdue University; MS, Washington University, St. Louis

Collie, Gillian (2008) Lecturer of English; BA, University of Washington; BS, University of Iowa; MBA, MA, Colorado State University-Pueblo

Darvay, Daniel (2013) Lecturer of English; BA, Babes-Bolyai University; MA, University College Dublin; Ph.D., University of Oklahoma

Hawthorne, James (2005) Lecturer of English; BA, University of Kansas; MA, State University of New York at Stony Brook

Heedt, Dorothy (2009) Lecturer of English; BA, MA, Colorado State University-Pueblo

Hurley, Byron (2005) Lecturer of Mathematics; BS, South Dakota School of Mines and Technology; MS, University of Wyoming

Johnston, Tatiana (2007) Lecturer of Spanish; BA, MBA, DeVry University

Little, Constance (2008) Lecturer of English; BA, Western State College; MA, Colorado State University

Maal, Diana (2008) Lecturer of Mathematics; BS, Texas A&M University; MS, University of Colorado at Colorado Springs

Marley, Karen (2010) Lecturer of Exercise Science, Health Promotion and Recreation; BA, MA, West Chester University; MA, University of Phoenix

Martinez, Wayne C. (2006) Lecturer of Computer Information Systems; BS, MBA, Colorado State University-Pueblo

Nyawalo, Shureka (2015) Lecturer of French; BA, Truman State University; MA, Penn State University

Pickering, Duane (1995) Lecturer of Mathematics; BA, MA, Adams State College

Saphara, Jason (2002) Lecturer of English; BA, Colorado State University-Pueblo; MA, Kansas State University

Sargeant, William (2009) Lecturer of Mathematics; BA, Elmira College; MS, Binghamton University

Satterfield, James R. (2014) Lecturer of Biology, BS, MS, Ph.D., Colorado State University

Spangler, Julie (2012) Lecturer of Physics; BS, Colorado State University-Pueblo; MS, University of Tennessee

Starkey, Kathryn (2014) Lecturer of Communication and Rhetoric and Director of Forensics; BA, University of Wyoming; MA, Texas Tech University

Vidmar, Shawn (2008) Lecturer of English; BA, University of Denver; MA, Colorado State University

Watkins, Tamara (1998) Lecturer of Mathematics; BA, Colorado School of Mines; MSANS, Colorado State University-Pueblo

Wink, Geri (2004) Lecturer of Accounting; BBA, MBA, Sam Houston State University

ARTISTS-IN-RESIDENCE

Beck, Barbara (2000) Artist-in-Residence, Music; BA, University of Colorado; MM, Colorado State University; MM, University of Northern Colorado

De Luca, Mike (2006) Artist-in-Residence, Music; BA Colorado State University-Pueblo; MA, University of Colorado

Eastin, Charles Brad (2005) Artist-in-Residence, Music; BA, MM, University of South Florida

Eberhardt, Allan R. (1999) Artist-in-Residence, Music; BA, University of New Mexico; Graduate USAF NCO Academy

Eickelman, Diane (2012) Artist-in-Residence, Music; BA, Colorado State University-Pueblo; MM, University of New Mexico

Hsu, Timothy (2015) Artist-in-Residence, Music; BM, University of Central Oklahoma; MM, Peabody Conservatory

Turner, Aaron (2005) Artist-in-Residence; Music; BM, Lawrence University; MM, University of North Texas

EMERITUS FACULTY

Abrahamson, Gayle (1985-2008) AA, BA, MAR, MA, Professor Emeritus of Library Services

Aguilar, Kay M. (1964-1999) BS, MA, Ed.D., Professor Emerita of Exercise Science and Health Promotion

Aichele, Ronald G. (1972-2006) BA, MA, Ph.D., Professor Emeritus of Philosophy

Allen, Ernest E., (1963-2002) BS, MA, MATM, Ed.D., Dean Emeritus of the College of Science and Mathematics and Professor Emeritus of Mathematics

Anderson, Deyrol E. (1983-2002) BA, MA, Ph.D., Professor Emeritus of Mass Communications

Anderson, Norris D. (1965-1984) BA, MA, Ed.D., Professor Emeritus of Education

Askwig, William J. (1962-1994) BSBA, MBA, Ph.D., Professor Emeritus of Economics

Bailey, Wade H. (1993-2013) BS, MS, Professor Emeritus of Civil Engineering Technology

Baldauf, Boyd J. (1964-1988) BS, MA, Ed.D., Professor Emeritus of Computer Science Technology

Banks, Jessie (1966-1996) BS, MA, Professor Emerita of Human Performance and Leisure Studies

Barber, Margaret (1995-2009) BA, MA, Ph.D., Professor Emerita of English

Bartlett, Thomas J. (1967-1977) BS, MA, Professor Emeritus of Mathematics

Bassein, Beth Ann (1966-1991) BA, MA, Ph.D., Professor Emerita of English and Speech Communication

Benton, Johnny (1968-1996) BA, MA, Ph.D., Professor Emeritus of Speech Communication

Billington, Peter J. (1989-2014) BS, MBA, Ph.D., Professor Emeritus of Management

Blandford, Robert D. (1965-1989) BS, MA, DA, Professor Emeritus of Mathematics

Borton, John M. (1983-2009) BA, MS, Ph.D., Professor Emeritus of Computer Information Systems

Bory, Rosanne (1984-2008) BA, MA, MA, Professor Emerita of Library Services

Bottini, Patrick W. (1968-1999) BS, MA, Professor Emeritus of Industrial Science and Technology

Bradley, Lawrence B. (1966-1988) BA, MA, Professor Emeritus of Speech Communication/Theater

Brassill, Joann A. (1967-1987) BA, MA, MFA, Professor Emerita of Art

Bright, Leon A. (1963-1995) BS, MA, Ph.D., Professor Emeritus of Foreign Language

Browne, James H. (1991-2007) AA, BA, MA, Ph.D., Professor Emeritus of Management

Cain, Robert L. (1970-1993) BA, MLS, Professor Emeritus of Library Services

Cameron, James (1970-2003) BA, MA, Ph.D., Professor Emeritus of Psychology

Carrasco, Hector R. (1993-2013) BSME, MSME, Ph.D., Professor Emeritus of Engineering and Dean Emeritus of the College of Education, Engineering and Professional Studies

Chen, Frank (1982-2005) BSME, MSME, Ph.D., Professor Emeritus of Mechanical Engineering Technology

Cheng, Joseph K. (1973-2005) BS, MS, Ph.D., Professor Emeritus of Civil Engineering Technology

Connelly, Jerald (1979-1990) BS, Ph.D., Professor Emeritus of Chemistry

Cook, Robert N. (1981-1999) BEE, MSE, M.SC., Ph.D., Professor Emeritus of Computer Information Systems

Cotner, Jane (1960-1976) AB, BSLS, Professor Emerita of Library Sciences

Covi, Silvio (1986-2008) B.Th., MA, Ph.D., Professor Emeritus, of English/Foreign Languages

Croxton, Carol (1978-1994) BA, MA, Ph.D., Professor Emerita of English

Davison, Earl (1950-1975) BS, Professor Emeritus of Industrial Technology

Derr, James, B. (1984-2007) BA, Ph.D., Professor Emeritus of Mathematics

Dhatt, Yashwant S. (1983-2003) B.Comm, MA, MBA, Ph.D., Professor Emeritus of Finance

Dille, Ralph (1976-1996) BA, BS, MA, Ph.D., Professor Emeritus of English

Dorsch, John A. (1965-2003) BA, MS, Ph.D., Professor Emeritus of Biology

Driscoll, Donald J. (1965-2001) BA, MA, Ph.D., Professor Emeritus of Philosophy

Eisenbeis, Richard H. (1988-2005) BA, MS, Ph.D., Professor Emeritus of Management

Farley, Mary (1991-1996) BSN, MS, Ph.D., Professor Emerita of Nursing

Farwell, Hermon W. (1966-1984) AB, MA, Professor Emeritus of Speech Communication

Forsyth, Dan W. (1983-2014) BA, MA, Ph.D., Professor Emeritus of Anthropology

Fouts, Kenneth B. (1962-1985) AA, BFA, MA, Ph.D., Professor Emeritus of Speech Communication

Gill, John (1971-1999) BS, MA, Ph.D., Professor Emeritus of Mathematics

Green, Pearl (Penny) (1982-2014) BA, MA, Ph.D., Professor Emerita of Sociology

Hammer, Charles R. (1964-1995) BS, Ph.D., Professor Emeritus of Chemistry

Hench, Robert W. (1965-1993) BFA, MA, Professor Emeritus of Art

Herrmann, Scott J. (1968-2014) BS, Ph.D., Professor Emeritus of Biology

Hobbs, Harold C. (1966-1984) BA, MA, Ph.D., Professor Emeritus of Psychology

Ihrig, Paul R. (1946-1971) BS, MA, Professor Emeritus of Fine Arts

Janes, Donald W. (1963-1993) BA, MA, Ph.D., Professor Emeritus of Biology

Jensen, Carl G. (1970-2004) BS, MAT, MFA, Professor Emeritus of Art

Joyce, Richard (1994-2016) BS, MA, Associate Professor Emeritus of Mass Communications and New Media

Keller, Robert L. (1974-2005) BA, MS, Ph.D., Professor Emeritus of Sociology

Kent, (Kahn) Theodore C. (1965-1978) BA, MA, Ph.D., Sc.D., Professor Emeritus of Behavioral Science

Kleszynski, Margaret (2000-2014) BA, MLS, MS, Professor Emerita of Library Services

Knight, Douglas W. (1980-2003) BS, MS, Ph.D.; Professor Emeritus of Computer Information Systems

Knight, Shirley (1972-2000) AA, BSCE, MSCE, Professor Emerita of Civil Engineering Technology

Krinsky, Richard (1968-2005) BA, MA, Ph.D., Professor Emeritus of Psychology

Krinsky, Suzanne G. (1968-2005) BA, MA, Ph.D., Professor Emerita of Psychology

Kulkosky, Paul J. (1984-2010) BA, MA, Ph.D., Professor Emeritus of Psychology

Kuntzman, Ann (1993-2002) BA, MLS, Professor Emerita of Library Services

Li, Hung C. (1965-1990) BA, MS, Ph.D., Professor Emeritus of Mathematics

Linam, Jay (1965-1991) BS, MS, Ph.D., Professor Emeritus of Biology

Loats, Carol (1993-2014) BA, MA, Ph.D., Professor Emerita of History

Madrid, Leasher Dennis (1976-2013) BA, MS, Ph.D., Professor Emeritus of Psychology

Mahan, Kent (1969-1997) BS, Ph.D., Professor Emeritus of Chemistry

Marino, Charles J. (1966-1999) BA, BFA, MA, Professor Emeritus of Art

Marquesen, Victoria (1999-2014) BA, MA, Ph.D., Professor Emerita of Teacher Education

Martinet, Anthony (1969-1990) BS, M.Ed., Professor Emeritus of Automotive Parts and Service Management

Massey, Frank A. (1963-2003) BIE, BBA, MS MFA, Ph.D., Professor Emeritus of Engineering

McCanne, Roy (1974-1994) BA, MA, Ed.D., Professor Emeritus of Education

Meyer, Russell J. (2000-2011) BA, MA, Ph.D., Professor Emeritus of English

Miller, Glenn W. (1974-2003) BA, MA, Professor Emeritus of Mass Communication

Miller, Margaret (1976-1990) BA, MS, Ph.D., Professor Emerita of Teacher Education

Miller, Robert E. (1952-1983) BS, MS, Professor Emeritus of Chemistry

Milne, Donald C. (1965-1993) BA, MA, Ph.D., Professor Emeritus of English/Foreign Languages

Mo, Suchoon S. (1973-2002) BS, Ph.D., Professor Emeritus of Psychology

Moffeit, Tony (1976-2003) BS, MLS, Professor Emeritus of Library Science

Montgomery-Ratcliff, Barbara M. (2001-2012) BS, MA, Ph.D., Professor Emerita of Speech

Moore, Beverly (1970-2001) AA, BA, MA, Dean Emerita, University Library and Professor Emerita of Library Services

Morales, Heberto (1987-1999) Ph.D., Professor Emeritus of Foreign Language

Mullen, Jennifer (1990-2013) BA, MA, Professor Emerita of Mass Communications and New Media

Muller, Doyle K. (1963-1999) BM, BA, Professor Emeritus of Music

Murray, Hallard (1969-1997) Professor Emeritus of Biology

Nicholl, Larimore R. (1968-2003) BA, MA, Professor Emeritus of Philosophy

O'Leary, Emmett (1972-2005) BA, MA, Ph.D., Professor Emeritus of Speech Communication

Olin, Carol M. (1971-1991) BA, MA, Professor Emerita of English

Orman, Patricia (1978-2010) BA, MA, Ph.D., Professor Emerita of Mass Communications

Osborn, Neal L. (1965-2004) BA, BA, MS, Ph.D., Professor Emeritus of Biology

Padgett, John J. (1967-1999) BS, MBA, Professor Emeritus of Computer Information Systems

Perkins, David M. (1978-1995) BSEE, MSEE, Professor Emeritus of Electronics Engineering Technology

Phillips, David L. (1971-1995) BS, MS, Ph.D., Professor Emeritus of Mathematics

Plonkey, Kenneth (1968-1998) BA, MA, Ph.D., Professor Emeritus of Theatre

Post-Gorden, Joan C. (1970-1999) BS, MS, Ph.D., Professor Emerita of Psychology

Reiff, Glenn A. (1978-1989) BS, MS, Professor Emeritus of Electronics Engineering Technology

Reinier, Edward R. (1964-1988) BS, MA, Professor Emeritus of Management

Rodriguez-Arenas, Flor-Maria (1955-2014) MA, Ph.D., Professor Emerita of English/Foreign Languages (Spanish)

Ryan, John E. (1980-2012) BA, MA, Ph.D., Professor Emeritus of Education

Sabo, Barbara J. (1974-2004) RN, AA, BS, MS, Ph.D., Professor Emerita of Nursing

Sadler, George (1965-1987) BS, MS, Ph.D., Professor Emeritus of Economics

Sajbel, Edward (1955-1989) AA, BA, MA, Professor Emeritus of Art

Sandoval, David A. (1980-2011) BS, MA, Ph.D., Professor Emeritus of History

Sauer, Wolfgang (1993-2007) Diplom Ingenieur, Ph.D., Professor Emeritus of Mechanical Engineering

Senatore, Margaret L. (1964-2003) BA, MA, Professor Emerita of English

Sheidley, William E. (1994-2008) BA, MA, Ph.D., Professor Emeritus of English/Foreign Languages

Sherman, John R. (1971-2005) BA, MA, Ph.D., Professor Emeritus of Speech Communication

Shih, Tsang Yu (Tom) (1964-1984) BSM, Professor Emeritus of Metallurgical Engineering Technology

Shirley, Robert C. (1984-1996) BA, MA, Ph.D., President Emeritus and Professor Emeritus of Management

Simms, Houston C. (1947-1975) BA, MA, Professor Emeritus of Biology

Sisson, Ray (1960-1996) AA, BSEE, MSEE, Ed.D., Professor Emeritus of Engineering and Dean Emeritus of the College of Applied Science and Engineering Technology

Smith, John E. (1962-1989) AA, BA, Ph.D., Professor Emeritus of Chemistry

Smith, Robert (1969-1996) BA, MA, Professor Emeritus of Computer Information Systems

Socha, Frances J. (1967-1982) BSN, MA, Professor Emerita of Nursing

Solis, Jose (1963-1996) BS, MSW, Professor Emeritus of Social Work

Spenny, David L. (1980-2004) BS, Ph.D., Professor Emeritus of Physics

Steen, Melva (1992-2001) BSN, MA, Professor Emerita of Nursing

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Strobel, John D. (1960-1993) BME, MM, DMA, Professor Emeritus of Music

Stutters, Donald G. (1960-1992) BA, MA, Ed.D., Professor Emeritus of Human Performance and Leisure Studies

Stuyt, Jeff A. (1999-2013) Associate Professor Emeritus of Exercise Science, Health Promotion, and Recreation

Sublette, James E. (1984-1995) BS, MS, Ph.D., Professor Emeritus of Biology

Sullivan, Daniel R. (1970-2012) BA, MLS, Professor Emeritus of Library Services

Sweet, Jerry (1969-1999) AAS, BSMET, MS, Ph.D., Professor Emeritus of Mechanical Engineering Technology

Tedrow, Charles E. (1968-1993) AB, MA, Professor Emeritus of Industrial Science Technology

Valerio, Luis G. (1975-2005) BA, MA, Ph.D., Professor Emeritus of Teacher Education

Vorndam, Paul E. (1994-2005) BA, MS, Ph.D., Professor Emeritus of Chemistry

Vunovich, Bogdan (Bob) (1967-1988) AB, MA, Professor Emeritus of Mathematics

Wack, Dunstan J. (1969-1982) BS, MA, Ph.D., Professor Emeritus of Psychology

Wallen, Marta J. (1987-2014) MS, Ph.D., Professor Emerita of Physics

Wands, Robert (1963-1996) BFA, MA, Professor Emeritus of Art

Warfield, Dale E. (1971-1995) AA, BEE, MSEE, Professor Emeritus of Electrical Engineering Technology

Watkins, Sallie A. (1966-1988) BS, MS, Ph.D., Professor Emerita of Physics

Weinhouse, Donald S. (1991-2005) BA, MA, M.Ed., Ph.D., Professor Emeritus of Teacher Education

Whitmer, Jean J. (1970-1987) BA, MA, Ph.D., Professor Emerita of Education

Whitsitt, Ronald G. (1959-1989) BA, MA, Professor Emeritus of English

Wilkin, Ted (1999) Professor Emeritus of History

Wilkes, Linda M. (1983-2011) BA, Ph.D., Professor Emerita of Chemistry

Williams, Euphemia G. (1995-2002) BS, MS, Ph.D., Professor Emerita of Nursing

Withnell, Melvin C. (1967-1994) BS, MS, MA, Ph.D., Professor Emeritus of Mathematics

Wright, Will (1986-2008) BA, MA, Ph.D., Professor Emeritus of Sociology

Zeis, Charles (1987-2010) BA, MS, Ph.D., Professor Emeritus of Business Administration

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