
2007-2008 • **Catalog**



{ **Y O U R C O M M U N I T Y C O L L E G E** }

• • • • • **2100 16th Avenue South** • Great Falls, MT 59405
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A WELCOME FROM THE DEAN . . .



Academic Year 2007-2008 is a building year at Montana State University – Great Falls. If you take classes in Great Falls, when you visit the campus in Fall 2007, you will see an enormous new wing being added to the northwest portion of our building. By Spring 2008, the construction should be complete.

“Building out” – there’s something so exciting about that phrase. “Building out” means new growth, new possibilities, and new opportunities. It means incorporating the new into the old. It means a transformation that you can actually watch evolve, as cement becomes foundation, beams become roof, and a skeletal framework gradually becomes a thriving facility humming with students, faculty, staff, and community members.

This year can be a year for you to “build out” as well. When you enroll at MSU – Great Falls – whether you take classes on our Great Falls campus, online, or at one of our extension sites in Bozeman – you invest in your own growth, with all the new possibilities and opportunities that personal and professional development brings. You engage in the act of transforming yourself by adding new knowledge and new skills to your potential. Like our new addition, the process of building out intellectually is a gradual one. One week, you’re fumbling with a concept in a science class or with a piece of equipment in one of our healthcare programs. A month later, the new concept or skill is firmly in place in your mind. Over time, concepts and skills integrate, like all the elements that go into a building, and the construction you hoped for is complete.

Welcome to MSU – Great Falls, where everyone – administration, staff, faculty, and students – is a work in progress. Think of yourself as “under construction.” We are all here to help you transform your future. Build out.

Sincerely,

Dr. Mary Sheehy Moe
Dean

Mission Statement

Montana State University - Great Falls College of Technology, a student-centered two-year college, provides quality educational opportunities responsive to community needs.

TYPE OF INSTITUTION

Montana State University-Great Falls College of Technology is a public postsecondary two-year educational institution affiliated with Montana State University-Bozeman. The College is committed to a dual mission: providing viable technical education to prepare individuals for work in a technologically driven global economy and providing learning opportunities to enhance educational access to the Montana University System.

DEGREES OFFERED

Montana State University-Great Falls College of Technology delivers course offerings on-campus as well as at appropriate off-campus sites and through electronic technology. The college has an academic mission to:

- award Associate of Applied Science Degrees or Certificates in the career areas of Health Sciences and Business and Technology;
- award Associate Degrees for transfer to four-year programs;
- offer general education courses reflective of the core curriculum requirements at Montana State University-Bozeman as well as those of the Montana University System;
- offer courses, seminars, workshops, and customized training to meet the educational needs of individuals, businesses, and other populations.

CONSTITUENCIES SERVED

Montana State University-Great Falls College of Technology is a teaching institution that:

- provides beneficial and accessible technical education for training or retraining in high demand career fields to meet present and emerging employment needs;
- provides quality general core transfer courses and associate degrees parallel to the first two years of a four-year degree;
- stresses a student-centered approach to the delivery of educational services;
- promotes equal opportunity in education for all students;
- engages in community service and technical assistance activities.

ACADEMIC RESPONSIBILITIES

Montana State University-Great Falls College of Technology designs its programs and courses to enhance the student's ability to:

- demonstrate competence in technical and related subject matter to attain lifelong career goals;
- demonstrate intellectual skills to realize advancement in higher education;
- acquire the knowledge and skills to live a productive life while achieving a balance between career, personal life, and service to others;
- analyze problems and identify and evaluate important information resources;
- recognize the importance of lifelong learning and gain the confidence to be a self-directed learner;
- think critically with a sensitivity to the human community and the ethics of the physical world;
- discover personal potential, and respect the uniqueness of others.

ACCESS AND PARTNERSHIPS

Montana State University-Great Falls College of Technology is committed to strengthening access to public postsecondary educational opportunities through the administration of the Great Falls Higher Education Center; maintenance of a contemporary telecommunications complex; and expansion of collaborative relationships with secondary and postsecondary institutions as well as with appropriate business, government, and human service entities to ensure the most effective use of resources.

COMMITMENT TO ASSESSMENT

MSU – Great Falls College of Technology, a student-centered two-year college providing quality educational opportunities responsive to community needs, is committed to the evaluation of institutional effectiveness and the assessment of student learning outcomes. This commitment is reflected through an assortment of activities and processes that all begin with a patent expression of the College's mission, vision, values, goals, strategic plan, and the espousal of these principles by the academic departments, their programs and all co-curricular divisions and departments.

MONTANA STATE UNIVERSITY-GREAT FALLS COLLEGE OF TECHNOLOGY EIGHT ABILITIES

The faculty and staff of MSU – Great Falls College of Technology have deemed the following abilities to be central to the personal and professional success of all students:

1. **Communication:** The ability to utilize oral, written and listening skills to effectively interact with others.
2. **Quantitative Reasoning:** The ability to understand and apply mathematical concepts and models.
3. **Inquiry and Analysis:** The ability to process and apply theoretical and ethical bases of the arts, humanities, natural and social science disciplines.
4. **Aesthetic Engagement:** The ability to develop insight into the long and rich record of human creativity through the arts to help individuals place themselves within the world in terms of culture, religion, and society.
5. **Diversity:** The ability to understand and articulate the importance and influence of diversity within and among cultures and societies.
6. **Technical Literacy:** The ability to use technology and understand its value and purpose in the workplace.
7. **Critical Thinking:** The ability to demonstrate critical evaluation of an argument's major assertions, its background assumptions, and the evidence used to support its assertions, and explanatory utility.
8. **Effective Citizenship:** The ability to commit to standards of personal and professional integrity, honesty and fairness.

Great Falls - The Heart of Montana

ALL ABOUT GREAT FALLS AND CASCADE COUNTY

Population	
Great Falls	56,690
Cascade County	79,903
Elevation	3,300
Founded	1882

FINANCES

Per capita income	\$20,957
State	\$19,338

RESIDENTIAL REAL ESTATE

Median sales price	\$138,000
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ATTRACTIONS

Children's Museum
CM Russell Museum
Giant Springs Heritage Park
Gibson Park
Great Falls Symphony
The History Museum
Lewis & Clark Interpretive Center
Montana Expo Park & State Fair
Paris Gibson Square Museum of Art
Rivers Edge Trail
Showdown Ski Area
Ulm Pishkun Archaeological Site

OUTDOOR RECREATION

Biking
Camping
Cross-Country Skiing
Downhill Skiing
Fishing
Hiking
Hunting
National Forests
National Parks
And much more . . .



GREAT FALLS HISTORY

In 1803, Thomas Jefferson commissioned Meriwether Lewis and William Clark and the Corps of Discovery to find "the most direct and practicable water communication across this continent for the purposes of commerce." Lewis and Clark documented their experiences on the banks of "the thundering great falls of the Missouri" in their famous journals. You will enjoy reliving their epic expedition in a visit to the Lewis & Clark Interpretive Center.

In 1882, Paris Gibson, a Minneapolis city planner and engineer, recognized the potential in the area's abundant resources and central location and with the backing of railroad magnate James J. Hill, became the city's first developer. Gibson's legacy was a carefully planned city incorporating 56 parks, a heritage of beauty that makes Great Falls unique today.

GREAT FALLS . . . ALWAYS IN SEASON

Located in the heart of Montana, Great Falls is a progressive city surrounded by three mountain ranges, nestled in wheat fields with the Sun and Missouri rivers converging near the center of the city. A moderate climate with clean, pure air, low humidity, and long days of sunshine is enjoyed by Great Falls residents and visitors. Southwesterly Chinook winds make most winter days warm and pleasant.



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Academic Calendar and Directory

FALL SEMESTER 2007

New Student Registration Begins.....	May 16
Orientation for New Students.....	August 22
Challenge Exams (Keyboarding, Intro to Computers, Medical Terminology).....	August 22
Health Science Orientation.....	August 23
Classes Begin.....	August 27
Last Day to Add Classes.....	August 31
Labor Day Holiday (No Classes, Offices Closed).....	September 3
Last Day to Withdraw/Drop Classes with a Partial Refund.....	September 17
Graduation Applications Due.....	October 19
Mid-Term Grades Available on Web.....	October 25
Veterans' Day Holiday (No Classes, Offices Closed).....	November 12
Registration for Spring 2008 Begins.....	November 5
Thanksgiving Holiday (No Classes, Offices Closed).....	November 22-23
Last Day to Drop Classes with a "W".....	November 30
Last Day of Classes.....	December 7
Finals Week.....	December 10-13
Grades Available on Web.....	December 21

SPRING SEMESTER 2008

New Student Registration Begins.....	November 26
Orientation for New Students.....	January 9
Challenge Exams (Keyboarding, Intro to Computers, Medical Terminology).....	January 9
Health Sciences Orientation.....	January 14
Classes Begin.....	January 16
Last Day to Add Classes.....	January 23
Last Day to Withdraw/Drop Classes with Partial Refund.....	February 6
Presidents Day (No Classes, Offices Closed).....	February 18
Graduation Applications Due.....	March 7
Mid-Term Grades Available on Web.....	March 22
Spring Break.....	March 10-14
Registration for Summer/Fall Begins.....	April 2
Last Day to Withdraw/Drop Classes with a "W".....	April 25
Last Day of Classes.....	May 2
Finals Week.....	May 5-8
Commencement.....	May 9
Grades Available on Web.....	May 16

SUMMER TERM 2008

New Student Registration Begins.....	April 28
10-Week Summer Session Begins.....	May 19
Memorial Day Holiday (No Classes, Offices Closed).....	May 26
8-Week Summer Session Begins.....	June 2
Last Day to Add Classes.....	June 6
Last Day to Withdraw/Drop Classes with Partial Refund.....	June 11
Graduation Applications Due.....	June 27
Independence Day Holiday.....	July 4
Last Day to Drop Classes with a "W".....	July 18
Summer Session Ends.....	July 25
Grades Available on Web.....	August 1

Dates subject to change. Check the MSU – Great Falls website www.msugf.edu for up-to-date information.

TELEPHONE DIRECTORY

MSU – Great Falls College of Technology.....	800-446-2698 or 406-771-4300
Admissions & Records.....	406-771-4420
Student Services/Counselors.....	406-771-4414
Arts & Sciences Department.....	406-268-3705
COTtag Bookstore.....	406-771-4367
Business & Technology Department.....	406-771-4391
Business Office.....	406-771-4315
Distance Education Department.....	406-771-4440
Financial Aid.....	406-771-4334
Health Science Department.....	406-771-4350
Help Desk.....	406-771-4433
Learning Center.....	406-771-5127
Library.....	406-771-4398
Outreach and Workforce Development.....	406-771-4303

General Information

NOTICE CONCERNING MATERIALS DESCRIBED IN THIS CATALOG: All provisions within this catalog are subject to change without notice.

While the College will make every effort to provide all described courses and programs, the final decision regarding availability will be determined by enrollment, available faculty, funds, and employer training needs.

GOVERNANCE

Montana State University-Great Falls College of Technology is a two-year technical/community college within Montana's public university system. Central administrative control of the college is vested exclusively in the Montana Board of Regents. The Regents have full power, responsibility, and authority to supervise, coordinate, manage, and control the colleges and universities within the Montana University System.

Although a stand-alone institution for purposes of institutional accreditation, budget, personnel, and management, Montana State University-Great Falls College of Technology has been affiliated with Montana State University-Bozeman since July 1, 1994.

ACCREDITATION

Montana State University-Great Falls College of Technology is accredited by the Northwest Commission on Colleges and Universities, a regional postsecondary accrediting agency. Regional accreditation assures the quality of the educational experience and facilitates the transfer of credit to state and national colleges and universities.

In addition, the Dental Assistant, Dental Hygiene, Emergency Medical Technician, Health Information Technology, Medical Assistant, Physical Therapist Assistant, Practical Nurse, Respiratory Care, and Surgical Technology programs are accredited and/or approved by their respective state and/or national agencies.

All educational programs offered by the college are approved by the Montana Board of Regents, United States Department of Education, United States Department of Veterans Affairs, and Montana Department of Vocational Rehabilitation Services.

IMPORTANT COLLEGE REGULATIONS AND POLICIES

COMPUTER & NETWORK USAGE POLICY

This Campus is pleased to be able to offer students a wide variety of computer facilities, services, equipment, and software. Students are encouraged to use them within the guidelines. The Montana University System Board of Regents has implemented information technology policies that apply to all public institutions of higher education within the state of Montana. These policies may be reviewed at: <http://www.bor.montana.edu/borpol/bor1300/1304-1.htm>. Additional campus policies can be found at <http://www.msugf.edu/facultystaff/PoliciesProcedures.htm>. Failure to comply with these guidelines may result in disciplinary action, including expulsion from the campus and criminal prosecution.

• **Access**

Students have access to computers on the MSU – Great Falls Campus at several locations – in computer labs, the library, computer classrooms, and at the computer kiosks outside the bookstore. Students currently enrolled for classes also may have access to wireless networking but must first sign an agreement with the Information Technology Department when using personal computers for such use and comply with the Network Attached Device Policy and Standards. Students and non-students are welcome to use the computer kiosks, but are asked to share that resource with others who wish to use it. Similarly, students and non-students may use the research computers in the library to meet their informational needs. Computers in the

library dedicated as computer lab workstations will require a current student identification card. Library computer workstations dedicated for research are available to the general public; however, priority for these machines will be given to students enrolled at the college. The library's computers (both student lab workstations and research stations) may not be used for communicative or leisure purposes - for instance, personal email, chat rooms, blogging and online or personal gaming. Because access to computer labs and classrooms is purchased by students through their computer fees, computer labs and classrooms may be used only by students currently enrolled in classes, workshops, or seminars at the College. Students are allowed access to open computer-equipped classrooms when the building is open, Monday - Friday. On weekends, in the event of an overflow from the Library Computer Lab, a classroom may be unlocked for student use.

• **Privacy of Information**

MSU – Great Falls Campus computer systems and networks are public and subject to Montana State laws. Files of personal information, including programs, regardless of the medium on which they are stored or transmitted, may be considered public information and are stored on MSU – Great Falls College of Technology computers. However, simply being able to access a file or other information does not imply permission to do so. The preservation of individual privacy is given high regard on this Campus, and students may not use electronic and other technological methods to infringe upon another's privacy. No one should look at, copy, alter, or destroy any individual's personal files without explicit permission from that individual, unless authorized by the Dean of the College in compliance with law or regulation.

• **Libel, Slander, and Harassment**

No member of the college community may, under any circumstances, use MSU – Great Falls College of Technology computers or networks to libel, slander, or harass any other person. Harassment includes intentionally using the computer to threaten or sexually harass another person; contact another person repeatedly regarding a matter for which one does not have a legal right to communicate once the recipient has provided reasonable notice that he or she desires such communication to cease; and/or disrupt or damage someone's academic, research, administrative, or related pursuits.

• **Responsible Use of Resources**

Students are responsible for knowing what information resources (including networks) are available, remembering that the members of the college community share them, and refraining from all acts that waste these resources or prevent others from using them. Details regarding available resources can be obtained by consulting with the Information Technology Services Department.

Students are discouraged from using campus computing and network services for non-academic purposes such as game playing and non-academic chat rooms. A student using a computer for non-academic matters must give it up when someone who wishes to use the computer for academic purposes is waiting.

State law restricts the use of state facilities and equipment for personal gain or benefit. Computing facilities, services, and networks at the MSU – Great Falls may not be used for compensated outside work or work for the benefit of organizations not related to the MSU – Great Falls without written permission from the Dean. Electronic gambling, stock trading, or any other financial gain method conducted on College computers, services, or networks is forbidden. State law also restricts the use of college computer systems for political advocacy or for commercial advertising.

• **System Security**

Students are prohibited from attempting to circumvent or subvert any security measures, degrade the performance of a computer system or network, or deprive authorized personnel of resources or access to any college computer system or network.

Montana State University - Great Falls College of Technology

The following harmful activities are also prohibited: creating or propagating viruses; disrupting services; deleting or damaging files without proper authorization; intentionally destroying or damaging equipment, software, or data belonging to MSU – Great Falls or other users; and the like.

No software may be installed, copied, or used on campus resources except as permitted by system administrators.

CRIME AWARENESS AND CAMPUS SECURITY

It is the policy and commitment of the college to afford its students, employees, and visitors a campus and educational environment that is as safe and free of crime as possible. Students, employees, and visitors contribute to overall campus safety by reporting criminal activity, by securing personal possessions, and by being aware of personal safety when entering or exiting the campus. A brochure which provides campus crime prevention information as well as statistics on the incidence of campus crime is available from the Information Desk.

DRUG-FREE CAMPUS POLICY

In compliance with the Drug Free Workplace Act of 1988, Public Law 101-690, Montana State University – Great Falls College of Technology is committed to a good faith effort to provide a drug-free campus. Therefore, the manufacturing, distribution, sale and/or abuse of illicit and/or prescription drugs, or the inappropriate use of alcohol at the college or in any activity affiliated with the college is prohibited. In addition, the college will enforce the Board of Regents' policy, Section 503.1, of the Policy and Procedures Manual regarding alcoholic beverages. Students must comply with this policy as a condition of attendance. Violations of this policy will result in disciplinary action up to and including expulsion and/or referral for prosecution. At the discretion of the Dean of the College of Technology, a student violating the policy may be required to satisfactorily complete a drug or alcohol abuse rehabilitation program as an alternative to expulsion or as a condition for readmission.

According to information provided by the U.S. Department of Education, drug and alcohol abuse may cause personal health problems, as well as interfere with work, school and daily living performance.

The Great Falls community has a number of excellent resources available to assist an individual who is having difficulty with drug and/or alcohol abuse. Counselors at the College of Technology are familiar with community resources and are available to refer individuals for assistance and/or treatment to overcome the problem of drug or alcohol abuse. If an individual is reluctant to approach college personnel, information about assistance programs may be obtained by calling the Community Help Line--761-6010.

EQUAL OPPORTUNITY POLICY

Montana State University-Great Falls College of Technology is committed to the provision of equal opportunity for education, employment, and participation in all college programs and activities without regard to race, color, gender, marital status, disability, age, disadvantage, religion, political affiliation and/or national origin.

The college's Equal Opportunity Officers are the Human Resources Director and the Assistant Dean for Student Services, 2100 16th Avenue South, Great Falls, MT 59405. Telephone: 406-771-4300.

FIREARMS, MUNITIONS, EXPLOSIVES

Possession, use, or threatened use of firearms, ammunition, explosives, chemicals, and/or any other weapons are prohibited. This applies to all campus locations, including campus grounds and parking facilities. Violations of this policy will result in disciplinary action up to and including dismissal and/or referral for prosecution.

SEXUAL HARASSMENT POLICY

Title VII of the Civil Rights Act of 1964 prohibits discrimination on the basis of gender. Sexual harassment is a form of gender-based discrimination. Montana State University-Great Falls College of Technology prohibits and will not tolerate sexual harassment on its premises, within any of its programs, services or other college-sponsored activities, or by anyone acting as an agent of the college.

MSU – Great Falls College of Technology uses the definition of sexual harassment set forth by the U.S. Equal Employment Opportunity Commission which states:

Unwelcome sexual advances, requests for sexual favors, and other verbal or physical conduct of a sexual nature constitutes sexual harassment when submission to or rejection of this conduct explicitly or implicitly affects an individual's employment, unreasonably interferes with an individual's work performance or creates an intimidating, hostile or offensive work environment.

Title IX extends these protections to include students. Other consumers and members of the general public who come into contact with the college or its agents are covered by this policy as well.

Any employee who believes her or she is experiencing sexual harassment should immediately contact the College's Human Resources Director to discuss options for resolving the issue. Students should contact the Assistant Dean for Student Services and anyone else should contact the college's Dean. Individuals are generally encouraged to attempt to resolve the issue informally by discussing their concerns with the alleged harasser, his or her supervisor, or both. However, the college recognizes that sexual harassment is a sensitive and potentially volatile issue, and if it is not feasible for the harassed individual to follow this recommended procedure, the appropriate agent should be contacted initially to begin an investigation. All complaints will be handled with discretion and information provided in the initial complaint and during the course of the investigation will remain as confidential as possible. The identity of both the complainant and the alleged harasser will be protected.

Any individual found to be guilty of violating the college's sexual harassment policy will be subject to discipline commensurate with the nature of the offense. Disciplinary action up to and including termination (or dismissal in the case of a student, termination of a contract in the case of a contractual relationship, or restricted access to the college in the case of a member of the general public) may be implemented.

Individuals who submit complaints and/or participate in the investigation process are protected from retaliation due to their participation. Anyone engaging in retaliatory behavior will be in violation of the college's sexual harassment policy, and therefore subject to appropriate disciplinary action as outlined above.

MSU – Great Falls College of Technology is committed to providing and ensuring a safe, positive learning environment that is free from harassment. A complete version of this policy may be obtained from Human Resources or online.

Montana State University - Great Falls College of Technology

Admissions

APPLICANTS

As an open admission institution, Montana State University-Great Falls College of Technology will attempt to admit all persons who complete admission requirements. The college reserves the right to deny or conditionally admit, readmit, or cancel the enrollment of any individual, who in the judgment of the college presents an unreasonable risk to the safety and welfare of the college community, or who has failed to maintain satisfactory academic progress. Applicants/current students may be asked to complete either an Inquiry into Student Disclosure form or an Admissions Academic Appeal form before an admissions decision is made or changed.

Notification of an admission decision will be mailed to the applicant. Admission to the college does not guarantee admission into a specific program. Students must contact the program advisor for individual program admission requirements. For students choosing to apply for financial aid, documentation may be required. Admission decisions may be appealed, in writing, to the Dean of the College.

In the case of programs with limited enrollment, acceptance of individuals will be based on the criteria described in the program's information packet or timely completion of the admission requirements for each program.

All applicants will be considered without regard to race, color, religion, national origin, marital status, age, gender, disability, or disadvantage in accordance with the following guidelines:

DEGREE SEEKING

A degree seeking applicant is one who possesses a high school diploma or its equivalent, and will enroll in a specific program to earn a certificate or degree.

NON-DEGREE SEEKING

A non-degree seeking applicant is one who will not enroll in a specific program to earn a certificate or degree. If status changes at a future date to degree seeking, additional admission requirements will have to be met. Non-degree seeking applicants are not eligible for financial aid.

UNDECLARED APPLICANT

An undeclared applicant is one who is degree/certificate seeking but has not declared a specific field of study. Undeclared applicants are not eligible for financial aid.

FULL-TIME STUDENT

A full time student is one who is enrolled in 12 or more credit hours per term. Students who do not meet the criterion for full-time classification are part-time students.

PROGRAM REQUIREMENTS

Some licensing or certification boards have varied restrictions, which may affect persons with a history of felony conviction. The college assumes no responsibility for the denial of licensure or certification by such boards. Prospective students are responsible for contacting the appropriate boards concerning any questions regarding their eligibility for licensure or certification.

Program Directors may deny admission to a specific program based upon individual program admission criteria. In addition, Program Directors may dismiss a student from a specific program and withdraw that student from applicable courses in the case of student misconduct as defined by program and/or standards.

RESIDENCY REQUIREMENTS

Under policies established by the Board of Regents, in accordance with Montana statutes regarding residency, all applicants for admission and all students at the units of the Montana University System shall be classified as in-state or out-of-state for fee purposes:

A person may be classified as in-state following a 12-month continuous period of domicile in Montana with a documented and dated intent to become a resident of Montana as outlined in the Montana University System Guide to Montana's Residency Policy, provided that the person is not registered for more than one-half of a full-time credit load at any post-secondary institution during the 12 month waiting period. Members of the United States Armed Forces assigned to active duty in Montana, their spouses, and dependent children during the member's tour of duty may be granted in-state residency for fee purposes.

Questions regarding residency status should be addressed to the Admissions & Records Office.

ADMISSION REQUIREMENTS

DEGREE SEEKING STUDENTS: *Please note that any documents submitted to the college during the admissions process become the property of MSUGF, and must remain as part of the student's admission and/or conduct file.*

- 1. Complete and Submit Application for Admission:** Applications for admission may be obtained from the Admissions & Records Office at the college or on the college's website at www.msugf.edu. Prospective students are encouraged to consult with an advisor for information about selection of a program and financial aid before submitting their applications. Call 406-771-4414 or 1-800-446-2698 (in Montana) to arrange for an appointment with an advisor. *A one-time non-refundable \$30 application fee must accompany the Application for Admission.*
- 2. Furnish High School and College Transcripts:** Applicants to any program must submit copies of high school transcripts, high school diploma or GED scores to the Admissions & Records Office. High schools must be accredited by the appropriate state office of public instruction. In order to receive transfer credit, official college transcripts must be sent directly to the college from each regionally accredited college or university attended. College transcripts submitted from other institutions cannot be released or duplicated, as they remain the property of the issuing institution.
- 3. Furnish Immunization Records:** In order to be in compliance with Montana state law, amended in 1993, students born after January 1, 1957, taking seven (7) or more credits OR enrolled in a certificate/degree/transfer program must:
Submit proof of 2 vaccinations against measles and one against rubella. Immunizations must have been given after 1967 and after the student's first birthday and must have been administered at least 30 days apart. Current immunizations must have been administered in the form of the MMR vaccine. Immunizations must be documented by a physician, registered nurse, or school official; or
 - Submit titer test results demonstrating previous vaccination; or
 - Submit documentation of having contracted measles and rubella. Documentation by a physician is required including dates of illness; or
 - File a medical or religious exemption.
 - Such evidence must be submitted before students will be permitted to register for courses.
- 4. Complete Placement Assessment:** Before enrolling in a math or English course, all applicants are required to take the COMPASS placement test or submit their American College Test (ACT) or

Montana State University - Great Falls College of Technology

Scholastic Aptitude Test (SAT) scores. These tests must have been taken within the past three years. The COMPASS is a standardized test that is diagnostic in nature and measures an applicant's proficiency in English, reading and mathematics. The results are used to determine placement in courses. Special arrangements can be made for those applicants who have a documented or temporary disability. Arrangements for taking the COMPASS can be made by contacting the Information Desk at 406-771-4414 or 1-800-446-2698 (in Montana). There is a fee for the COMPASS test.

Students may choose to have their ACT or SAT scores sent to the College to determine placement. Please have scores sent to the Admissions & Records Office directly from ACT or SAT. The College's ACT code is 2432, and the SAT code is 4482. The addresses and telephone numbers for ACT and SAT are:

ACT Records
P.O. Box 451
Iowa City, IA 52243-0451
319-337-1313 www.act.org

SAT Program
Princeton, NJ 08541
866-756-7346 www.collegeboard.com

For persons wishing to attend a postsecondary institution other than Montana State University – Great Falls College of Technology, Student Services will provide, for a \$10 fee, monitoring for admission assessments. Individuals must arrange for the assessment materials to be sent to the College and for an assessment date through the Student Services staff. A forwarding address to the appropriate institution must also be provided.

ADMISSION REQUIREMENTS FOR NON-DEGREE SEEKING STUDENTS

Non-degree seeking students must complete and submit the Application for Admission. For students taking courses with prerequisite requirements, an appropriate placement exam score, a challenge exam, or official transcripts demonstrating successful completion of prerequisite courses will be required. A one-time \$30 application fee must accompany the Application for Admission. Please note that non-degree seeking students are not eligible for financial aid.

READMISSION TO THE COLLEGE

Students who have previously attended Montana State University-Great Falls College of Technology must reapply when they have been absent for one semester, excluding summer. Readmit applications are available at the Information Desk, the Admissions & Records office, or on the college website (www.msugf.edu).

Readmitted students must follow the graduation requirements for the catalog under which they are readmitted. Previously earned credits will be evaluated on the basis of the current degree or certificate requirements. Credits earned 5 or more calendar years earlier will be reviewed by the appropriate department chair, lead faculty, and/or registrar, who may require repetition of any course in which the content has substantially changed.

Those students applying for readmission after serving at least one term of academic suspension must complete an Admissions Academic Progress Appeal Form along with the Application for Readmission. Such appeals will be reviewed by the Registrar/Admissions Committee before the student is informed in writing of the readmission decision.

EARLY ADMISSION

High school students may be admitted and allowed to register for college-level courses provided they are academically prepared. This process shall be confined to students who present evidence of the ability and maturity to do college work. This admission requires that the high school principal or counselor approve participation of a student in the college level courses. High school students may earn college-level

credit to be applied to a degree at Montana State University-Great Falls College of Technology or to transfer to another college or university once they graduate from high school. Course records for students will be entered and maintained on an MSU – Great Falls College of Technology transcript.

HOME SCHOOL ADMISSION

Home school students must submit the admissions application and application fee, a notarized copy of the home school curriculum, two letters of recommendation from people other than family members, a parental approval form if the student is under 18 and immunization records if the student is degree seeking and taking more than six credits. Home school students must complete the ACT, SAT, or COMPASS test before enrolling at the College.

NONIMMIGRANT FOREIGN STUDENTS

Montana State University-Great Falls College of Technology is authorized under federal law to enroll nonimmigrant foreign students. Each nonimmigrant foreign student is required to furnish the following documents in order to be considered for admission:

1. Completed Application for Admission accompanied by a \$30 non-refundable application fee;
2. TOEFL (Test of English as a Foreign Language) scores from an accredited testing service. A minimum score of 500 is the acceptable standard on the paper-based test, 173 on the computer-based test and 61 on the internet-based test. More information about TOEFL may be obtained from the Education Testing Service, Princeton, NJ 08540 or on the featuring websites, www.ets.org and www.toefl.org;
3. Proof of completion of the equivalent of an American high school education with satisfactory grades. Transcripts must be evaluated by a credential evaluation service to make this determination. Please contact Admissions & Records for a list of credential evaluation services;
4. A Declaration of Finances or other present evidence of funds necessary to pay all living expenses and travel to and from the college;
5. All nonimmigrant foreign students must show a physician-validated immunization record for measles, rubella, diphtheria, tetanus, and skin testing for tuberculosis. The evidence must be presented before a student will be permitted to register;
6. Evidence of an accident and sickness insurance policy or one of equal coverage for each semester in attendance at the college.

After a nonimmigrant foreign student has completed all of the above items and returned the required forms, his/her admission file will be reviewed and a letter will be sent indicating either acceptance or denial of admission. Upon acceptance, the college will issue an I-20 Certificate of Eligibility for non-immigrant F-1 student status.

NEW STUDENT REGISTRATION AND ORIENTATION

Degree seeking students will attend a STAR (STudent Advising and Registration) session with an advisor or counselor to register for their first semester of courses. These sessions are scheduled at various times for the student's convenience. Distance learning students can complete these sessions with an advisor over the phone. After the student is accepted to the College they will receive a letter directing them to call to schedule their STAR session. The student should have completed placement testing (ACT/SAT or COMPASS) prior to their STAR session. Students can call the college to sign up to take the COMPASS test if they do not have ACT or SAT scores, or transfer work in English and math. An Orientation Day will be held before each fall and spring semester. More information on the activities of this day will be given to the students during their STAR session.

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STUDENT IDENTIFICATION CARD

Each student may obtain a nontransferable identification card. The identification card may be necessary when purchasing books, cashing checks in the bookstore and using the library. Lost identification cards may be replaced by purchasing them through the Business Office for \$5.

CREDIT BY EXAMINATION

College credit earned by currently enrolled students who successfully complete approved advanced placement examinations, CLEP examinations, and Tech Prep articulations will have credits recorded on their academic records without an additional fee. Credit will not be awarded for courses that are prerequisites to subsequent courses that have been completed, or for courses that have been failed or previously audited.

COLLEGE ADVANCED PLACEMENT (HIGH SCHOOL STUDENTS)

Applicants who have taken advanced placement courses in high school should request that the official scores be sent to the College's Admissions & Records Office. Grades of 3, 4, or 5 on an advanced placement examination will be granted college credit for the appropriate courses.

CHALLENGE

The college offers challenge examinations for some of the courses described in this catalog. If an applicant or student feels he/she has knowledge about a particular subject area and wishes to take an examination to demonstrate that knowledge, the student may, with the approval of faculty, take a comprehensive examination. If a student's performance is sufficient to merit the awarding of credit, a grade of "P" (generally equivalent to a "C" or above) will be recorded on the student's academic record. There is a \$20.00 fee associated with each challenge exam regardless of the outcome of the exam. A challenge exam for a course must be completed before the student begins attending the course being challenged. A course that has been failed or previously audited may not be challenged.

COLLEGE LEVEL EXAMINATION PROGRAM (CLEP) AND DANTES

Montana State University-Great Falls College of Technology awards credit toward graduation for successful performance in certain subject examinations of the CLEP and DANTES programs. Students may arrange to take these examinations at designated centers. Passing grades and the awarding of credit is determined by the American Council on Education (ACE) credit recommendations.

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Test identification numbers:

CLEP7691

DANTES.....9472

ACT2432

SAT4482

TECH PREP CREDIT



Tech Prep provides high school students an opportunity to earn credits toward one-year or two-year certificates or degrees at Montana State University-Great Falls College of Technology while still in high school. It is a cooperative program carried out under articulation agreements between secondary and postsecondary institutions that have made a commitment to the program. Counselors and instructors at participating high schools have information available for interested students. Courses that have been approved for Tech Prep credit with at least one high school are identified with the Tech Prep logo (see above) in the course descriptions section of this catalog.

TRANSFER FROM OTHER INSTITUTIONS

Credits from other regionally accredited postsecondary institutions may be accepted as they apply to the established course requirements of Montana State University-Great Falls College of Technology under the following guidelines:

- The transferring student must initiate the request for evaluation of credit during the admission procedure by furnishing an official transcript from the transferring institution(s) and the necessary materials, including copies of the appropriate catalog descriptions or course syllabi, to the Admissions & Records Office. Official transcripts must be sent directly by the issuing institution to the following address:
- Admissions and Records Office
MSU – Great Falls College of Technology
2100 16th Ave S
Great Falls, MT 59405
- Grades less than a "C-" for previous course work will not be considered for transfer credit. Course work taken more than 5 years prior to transfer request may not be accepted. If transfer credit cannot be granted, the student has the option of challenging a course or courses.
- Transfer credit will be accepted only as it applies to the student's declared program of study.
- Students will be awarded a certificate/degree upon satisfactory completion of all program requirements, provided 25% of the credits required in the degree related program has been completed at MSU – Great Falls College of Technology.
- Transfer credit will be posted on the transcript for accepted transferred course work.
- Transfer grades are not figured in the grade point average (GPA).

TRANSFER TO OTHER INSTITUTIONS

Montana State University-Great Falls College of Technology is accredited by Northwest Commission on Colleges and Universities. A listing of websites providing transfer equivalencies within Montana may be found at the following website: <http://mus.montana.edu/transfer/CourseEquivGuide.htm>. For more information regarding the transferability of courses to other institutions, students should contact the institution they are planning to attend.

For transfer to another Montana school, a student may complete a Request for Transmittal of Application Materials form in order to have the contents of his/her admission file forwarded to the transfer school. There is an \$8 fee for this service.

The college offers a number of transfer options including the Montana University System Transferable Core and the Associate of Science and Associate of Arts degrees. In addition, students may choose from a variety of recommended and articulated Associate of Science degree programs with emphasis in various academic areas.

ADVISORS

Students will be assigned academic advisors. Advisors are generally faculty members who will assist in course scheduling each term, and be available to provide information regarding courses and/or academic progress as needed. Students must meet with their advisor each semester to plan and register for the upcoming semester.

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TUITION AND FEES POLICY

DEFERRED PAYMENT PLAN

The deferred fee payment plan is an installment loan available, for the fall and spring terms, for qualified applicants who are unable to make full payment of current semester tuition, fees, and other charges on the regular fee payment day. This plan is available to all qualifying students through the Business Office Cashiers. Installment payments and applicable fees are collected and processed by the Business Office.

LATE FEE

A \$40.00 late fee will be assessed if fees are not paid by fee payment deadline and there is not financial aid or a third party contract confirmed.

FEE REFUNDS

~ Withdrawal from the College

Unless otherwise required by the Higher Education Act of 1965, as amended, students withdrawing from Montana State University-Great Falls College of Technology are refunded the fees paid in accordance with the following schedule established by the Board of Regents. In order for a student to receive a refund under the Board of Regents policy, an official withdrawal form must be on file in the Registrar's Office:

Fall & Spring Semester:

Days of Instruction*	Percent Refunded
Registration day.....	100
1-5	90
6-10	75
11-15	50
16-on	0

* Days of Instruction begin with the first day of classes for a term and conclude on the 15th day, which is the deadline to drop/delete courses.

The Registration Fee and Application Fee are nonrefundable.

~ Refund Policy for Courses Numbered 116 and 199

All students wishing to drop or withdraw from courses numbered 116 and 199 are required to fill out an Add/Drop or Withdrawal Form. These forms are available at the Office of Outreach & Workforce Development.

- If a class is dropped at least **3 working days** prior to the first day of class, the full amount of tuition and fees will be refunded. For credit-bearing courses (those with a course number of 116), the \$30 semester registration and \$30 one-time application fee will not be refunded.
- If a class is not dropped at least 3 working days prior to the first day of class or the student enrolls and does not attend, the full amount of tuition and fees will be assessed. In certain instances exceptions to this policy may occur for drops occurring less than 3 working days prior to the first day of class. To be considered for an exception, an appeal stating the justification for this exception must be made in writing to the Registrar's Office.
- If the Division of Outreach & Workforce Development decides to cancel a class, students will receive a 100% refund on all tuition and fees.

See Course Descriptions section of this catalog for more information on these courses.

CHANGES IN CREDIT LOAD AFTER PAYMENT OF FEES

Students adding courses after payment of fees are required to pay additional fees created by the change in credit load.

Students dropping classes (but not withdrawing) will receive a 100 percent refund on courses dropped before the end of the 15th class day. Refunds will not be made after the 15th class day. This schedule applies only to fall and spring semesters. For the summer withdrawal schedule, please see the academic calendar for that term.

Fee refunds are processed approximately 5 weeks after the start of a semester and mailed to the student's permanent address.

RETURNED CHECK POLICY

Individuals presenting checks to the College of Technology, which the bank subsequently refuses to honor, are required to reimburse the college for the amount of the check plus any fee charged by the bank for processing the dishonored check. Individuals (faculty, staff, and students) will be notified in writing of the dishonored check(s) and the amount needed to clear the item(s). Personal checks may not be used to clear dishonored checks.

Dishonored checks presented by students will be added to their account balance. Unpaid balances may result in a 'Hold' being placed on the student's account. This 'Hold' will prevent the student from registering for further semesters at this or any other Montana State University campus.

Individuals presenting two dishonored checks within a calendar year to the college will be prohibited from writing further checks payable to the college during that calendar year even after clearing the two dishonored items.

This applies to all checks payable to the college or a college entity including the library, bookstore, cafeteria and dental clinic.

STUDENTS OWING DEBTS

The college reserves the right to deny registration access to a student who has an overdue debt to any Montana State University unit. Transcripts, certificates, and degrees will be withheld from any student owing tuition, fees, or charges to a Montana State University unit. In the event a student has not returned books and/or materials belonging to this college or any other Montana University System unit, transcripts, certificates, and degrees may be withheld.

BILLING

The college will be moving to paperless billing, as well as online bill payment by credit card or bank account.



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TUITION AND FEES SCHEDULE

The Montana Board of Regents of Higher Education has approved the following tuition and fees schedule for the 2007-2008 academic year beginning Fall Term 2007. Tuition and fees are based on credit hours and are paid by the student each semester. Tuition may increase by Board of Regents action at a future date.

Semester Credit Hours	Registration Fee	Resident Tuition	Building/Maintenance Fee	Computer Fee	Equipment Fee	Network Services Fee	Library Fee	Student Government	Total Resident Tuition & Fee	Additional Nonresident Tuition	Total Nonresident Fee
1	\$30.00	\$104.00	\$5.57	\$10.87	\$2.79	\$2.59	\$1.50	\$10.00	\$167.32	\$236.08	\$403.40
2	\$30.00	\$208.00	\$11.14	\$14.74	\$5.58	\$5.18	\$3.00	\$10.00	\$287.64	\$472.16	\$759.80
3	\$30.00	\$312.00	\$16.71	\$18.61	\$8.37	\$7.77	\$4.50	\$10.00	\$407.96	\$708.24	\$1,116.20
4	\$30.00	\$416.00	\$22.28	\$22.48	\$11.16	\$10.36	\$6.00	\$10.00	\$528.28	\$944.32	\$1,472.60
5	\$30.00	\$520.00	\$27.85	\$26.35	\$13.95	\$12.95	\$7.50	\$10.00	\$648.60	\$1,180.40	\$1,829.00
6	\$30.00	\$624.00	\$33.42	\$30.22	\$16.74	\$15.54	\$9.00	\$10.00	\$768.92	\$1,416.48	\$2,185.40
7	\$30.00	\$728.00	\$38.99	\$34.09	\$19.53	\$18.13	\$10.50	\$10.00	\$889.24	\$1,652.56	\$2,541.80
8	\$30.00	\$832.00	\$44.56	\$37.96	\$22.32	\$20.72	\$12.00	\$10.00	\$1,009.56	\$1,888.64	\$2,898.20
9	\$30.00	\$936.00	\$50.13	\$41.83	\$25.11	\$23.31	\$13.50	\$10.00	\$1,129.88	\$2,124.72	\$3,254.60
10	\$30.00	\$1,040.00	\$55.70	\$45.70	\$27.90	\$25.90	\$15.00	\$10.00	\$1,250.20	\$2,360.80	\$3,611.00
11	\$30.00	\$1,144.00	\$61.27	\$49.57	\$30.69	\$28.49	\$16.50	\$10.00	\$1,370.52	\$2,596.88	\$3,967.40
12-25	\$30.00	\$1,248.00	\$66.84	\$53.44	\$33.48	\$31.08	\$18.00	\$10.00	\$1,490.84	\$2,832.96	\$4,323.80

Academic Information

ACADEMIC PROGRESS

Academic progress standards are as follows:

- All students enrolled in credit bearing courses at Montana State University - Great Falls College of Technology are required to maintain a 2.0 cumulative grade point average (CGPA). Students with less than a 2.0 CGPA at the end of any academic term will be notified by the Registrar's office that they have been placed on academic probation for the following academic term. If, at the end of a subsequent term, they meet the required 2.0 CGPA, they are removed from academic probation. Academic probation serves to notify students that the quality of their work is below an acceptable level and that the continuation of unsatisfactory work during their next semester of enrollment will result in academic suspension. Students on probation should not carry more than 13 credits in the probationary period.
- All students enrolled in credit bearing courses who receive less than a 2.0 GPA and have a CPGA below a 2.0 for the second consecutive academic term will be suspended from the college. Students on academic probation who earn at least a 2.0 grade average for the semester without raising their cumulative grade average to the required minimum will remain on academic probation.
- Following suspension, students will not be considered for reinstatement until at least one semester (excluding summer) has passed. Readmission must be initiated through the Admissions & Records Office by completing the Application for Readmission and the Admission Academic Progress Appeal Form. If the appeal for readmission is approved, students will be readmitted on probationary status, limiting students to 13 credits in the fall and spring terms and 6 credits in the summer term, and will be re-enrolled under the current catalog requirements for graduation.
- Transfer applicants may be admitted on academic probation based upon their academic standing at previous institution(s).
- Readmitted applicants may be admitted on academic probation based upon their cumulative grade point average (CGPA) and/or academic standing when last in attendance.
- Students who have been placed on academic probation or suspension may appeal in writing to the Registrar for review of circumstances.

ADDING AND DROPPING COURSES

Students may add and drop courses on Banner Web up to the end of the 5th day of the semester. Between the 5th and the 15th day faculty must approve any add requests.

Students may drop one or more courses with no grade up to the end of the 15th day of the semester. Although no refund will be given, students may continue to drop one or more courses with a grade of "W" prior to the end of the published deadline. See the tuition and fees section of the catalog for further information. These deadlines are pro-rated for the summer term(s).

In all courses for which a student fails to complete all requirements and for which no formal drop (withdrawal) has been filed in the Admissions & Records Office, the final grade will be the grade the student has earned at the end of the course.

The following steps must be completed in order to drop or add a course after the 5th day of the term.

1. Obtain an official drop/add card from the Admissions & Records Office;
2. Complete the card and secure the necessary faculty signature(s). Note: No signature is required for dropping; and
3. Return the card to the Admissions & Records Office.

ATTENDANCE

Absences are handled exclusively within the purview of the faculty. When a student enrolls in a course, he/she enters into a contractual agreement with faculty for the duration of the course. Both the student and the faculty are expected to honor the specified terms of that agreement. It is important, therefore, for the student to understand the particular attendance requirements in each course. Generally, faculty communicate these requirements to students through the course syllabus and/or verbally during the first or second class meeting.

COURSE NUMBERING SYSTEM

Courses numbered below the 100 level cannot be used to satisfy core requirements or general elective requirements and do not count toward graduation requirements, except when required in certificate programs. They do count as credits required to meet financial aid satisfactory academic progress requirements if enrollment is required based on placement test scores.

A unit of credit at MSU – Great Falls College of Technology is defined as 3 hours of student work per week for a 15 week semester, or an equivalent number of work hours in an instructionally related activity, and/or student study time. Academic credit is awarded based upon this definition, which is consistent with the glossary definition of a credit unit as defined by the Northwest Commission on Colleges and Universities.

COURSE SUBSTITUTION

Students may request a substitution for a course if they have previously completed a college course in which the subject matter closely parallels that of the course for which they request the substitution. The Department Chair, Advisor and the Registrar must approve all substitutions. In no instance will a reduction be made in the number of credits required for completion of a program.

COURSE WAIVER

A course may be waived if the student has previously completed equivalent work. All waivers must be approved by the student's advisor, Department Chair, and the Registrar. College credit will not be given for a waiver. In no instance will a reduction be made in the number of credits required for completion of a program.

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Degrees Offered

CERTIFICATE OF APPLIED SCIENCE (C.A.S.)

The Certificate of Applied Science recognizes a short program of study designed to prepare the student for entry-level employment in a specific technical field. The Certificate of Applied Science is comprised of 30 - 45 credits; with rare exceptions. Students must be able to complete the Certificate program in one calendar year or less if they are academically prepared in math and English. The general education course work in a Certificate of Applied Science often has an applied, rather than an academic focus.

ASSOCIATE OF APPLIED SCIENCE (A.A.S.)

The Associate of Applied Science (AAS) degree is awarded in specific technical career fields. This degree is designed to prepare students for immediate entry into employment but may be fully or partially transferable to programs at selected four-year institutions.

The Associate of Applied Science degrees must be comprised of at least 60 but no more than 72 credits. For students entering these degrees prepared for the math and English required, the Associate of Applied Science degree requires at least two academic years to complete. A main difference between this degree and the Certificate of Applied Science is the added general education course work required.

Montana State University-Great Falls College of Technology offers AAS degrees in both the Business/Technology and Health Science areas. Specific requirements for each program are listed in the program section of this catalog.

ASSOCIATE OF ARTS (A.A.)

The Associate of Arts degree is a general transfer degree indicating that the student has completed a course of study equivalent to the first two years of a bachelor's degree. This degree does not officially include a major or minor course of study. For example, a student who plans to emphasize history receives the Associate of Arts degree, not an Associate of Arts in History. At MSU – Great Falls College of Technology, students may choose to emphasize programs of study preparatory to specific career choices (e.g., visual arts, history, communications) or they may choose to emphasize a general program of study.

ASSOCIATE OF SCIENCE (A.S.)

The Associate of Science degree is a general transfer degree indicating that the student has completed a course of study equivalent to the first two years of a bachelor's degree. This degree does not officially include a major or minor course of study. For example, a student who plans to emphasize mathematics receives the Associate of Science degree, not an Associate of Science in Mathematics. At MSU—Great Falls College of Technology, students may choose to emphasize programs of study preparatory to specific career choices (e.g., natural science, mathematics), or they may choose to emphasize a general program of study.

Baccalaureate requirements vary considerably among and within universities. It is strongly recommended that students pursuing a general program of study for their Associate of Science or Associate of Art degrees carefully select courses that will meet specific university program requirements for a baccalaureate degree. A current catalog of the selected university should be consulted. Students should work closely with a university academic advisor.

EVALUATION OF COURSES

Students are provided the opportunity to evaluate each of the courses they complete at the college during the final 4 weeks of each course.

Students are asked to approach the serious task of course evaluation professionally and positively. All faculty look forward to input from students who complete a course. Faculty utilize the input from their students to improve or modify courses.

GRADING

The following table outlines the grading system used at Montana State University-Great Falls College of Technology:

Grades	Quality of Work	Grade Points for Each Credit
A	Excellent	4.0
A-		3.7
B+		3.3
B	Above average	3.0
B-		2.7
C+		2.3
C	Average	2.0
C-		1.7
D+		1.3
D	Passing	1.0
F	Failing	0
P	Pass	0
AU	Audit	0
CR	Credit	0
W	Withdraw	0
I	Incomplete	0
NC	No Credit	0
NR	Not Recorded	0

AUDIT

Registered students may, with the permission of faculty, enroll in a course as an auditor for no credit. A student must decide to audit a course by the Add deadline of the term. Auditors pay the same fees as students enrolled for credit and are expected to follow the attendance guidelines set forth in the course. If attendance guidelines are not followed, the student may be issued a failing grade. If attendance guidelines are followed, the student will receive a grade of AU.

INCOMPLETE

An Incomplete (I) grade is issued at faculty discretion when student course work has been satisfactory, but unavoidable mitigating circumstances have prevented the student from completing the course. After consulting with the instructor of the course, a student must make a formal request for an Incomplete grade by completing the Request for an Incomplete Grade form, stating what unavoidable mitigating circumstance(s) prevented completion of the work and proposing the conditions under which the work will be completed. If a request form does not accompany the final grade, the student will be issued a Not Recorded (NR) grade until the proper paperwork is completed and submitted to the Records Office. If the instructor approves the request, the student will have until the end of the following semester to make up the Incomplete. If a student fails to make up an Incomplete within the allotted time, the Incomplete grade will be converted to an "F". The Department Chair will approve all Requests for Incomplete Grades before they are submitted to the Registrar for posting. The Department Chair must be given all information necessary to do final grading for the student as backup for the instructor in case he/she is not available to do the grading at the appropriate time.

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PASS/FAIL POLICY

As a general policy, courses at Montana State University-Great Falls College of Technology are graded with the letter grades A, A-, B+, B, B-, C+, C, C-, D+, D, D- and F. However, certain courses, as indicated in the catalog, are offered only on a pass/fail basis for ALL students registered in the course. A passing (P) grade is equivalent to a grade of "C-" or better. Students receiving "P" grades may not request a change to a letter grade.

COURSE REPEAT

Courses may be repeated to increase one's knowledge and/or grade point average. The original grade, as well as subsequent grade(s) in the course, is reflected on the academic transcript. However, the grade and grade point value for the repeated course will replace the earlier grade and grade point value in the cumulative totals. The grade and accompanying information for a repeated course will be posted on the student's academic transcript for the semester during which the repeated course was completed. Course repeats will not affect academic progress as it relates to recipients of Federal and State financial aid.

GRADE POINT AVERAGE (GPA)

A student's level of academic performance is determined by the grade point average (GPA). To calculate the GPA the total number of grade points is divided by the total number of completed credits.

GRADE REPORTS

Grades are available on Banner Web one week after the end of Finals Week.

ACADEMIC RECORDS

Appeals regarding academic records must be addressed within three years of course enrollment. Any appeals filed more than three years after the date of last attendance will not be considered. Note: This policy applies to appeals for retroactive withdrawals and tuition refunds only. For policy on academic performance appeals, please see the Academic Complaints section of this catalog.

CHANGE OF GRADE

A change of grade may be submitted to the Registrar's Office for a variety of reasons. All grade changes must come from the instructor or department chair. If, after consulting with the faculty member, questions still remain about the changing of a grade, please refer to the Academic Complaint Procedure.

GRADUATION

Montana State University-Great Falls College of Technology students follow the catalog in effect when they began their enrollment at the college or may elect to follow any subsequent catalog. If a student is absent for one or more semesters, the catalog in effect at the time of readmission governs the student's graduation requirements. Students must pass all required courses and have an overall grade point average of 2.0 to graduate from Montana State University-Great Falls College of Technology.

Each program in the Health Science Department has specific requirements for matriculation and graduation. Students are informed of other specific program policies and requirements both at the time of orientation and throughout their educational experience.

Identified programs in the Business and Technology Department have specific requirements for matriculation and graduation. Courses that require a grade of "C" or above are designated for each program in the program section of this catalog.

A student must submit a formal application for graduation by the published term deadline. Applications can be obtained from the information Desk. A \$25 non-refundable graduation fee is due upon submission of the application to the Business Office. Application deadlines are published on page one of this catalog and on the Academic Calendar located on the college's website. Students who fail to submit an application for graduation will not receive a certificate/degree.

Students will be awarded a certificate/degree upon satisfactory completion of all program requirements, provided that 25% of the course work required in the degree program has been completed at MSU – Great Falls College of Technology.

The commencement ceremony is held each May, at the conclusion of the Spring semester. Caps and gowns can be purchased through the Bookstore for a fee. Graduation announcements are also available for purchase through the Bookstore.

Diplomas can be replaced at the request of the student. The cost of replacing a certificate, diploma, and/or cover is \$10.

HONORS

Montana State University-Great Falls College of Technology recognizes students' academic achievements according to the following standards:

HONOR ROLL

The honor roll includes students who earn 12 or more credits with no Incomplete grades in Non-Pass/Fail courses at the 100 level or above, and who have a grade point average of 3.49 - 3.25 for that semester.

DEAN'S LIST

To be eligible for the Dean's List, a student must earn 12 or more credits in Non-Pass/Fail courses at the 100 level or above in one term, have a semester grade point average of 3.5 or above, and not have any Incomplete grades. If Incomplete grades changed to passing grades affect Dean's List eligibility, the student may request a letter noting Dean's List recognition.

PHI THETA KAPPA

A chapter of Phi Theta Kappa, an international honor society for two-year colleges, was chartered at MSU – Great Falls College of Technology in 1998. Membership is based primarily on academic achievement. Students who meet the criteria are invited to join each semester. To be eligible, students must be full-time, must have completed 12 semester credits, and must have a cumulative grade point average of 3.5.

Membership in Phi Theta Kappa offers much more than a mere certificate of membership. The organization offers opportunities for scholarships, intellectual enrichment and personal development through programs based on the four hallmarks of Scholarship, Leadership, Service and Fellowship.

For further information, contact the chapter advisors: Roger Peffer and Lesa Pribyl.

GRADUATION HONORS

Upon successful completion of program requirements, a graduating student with a cumulative GPA of 3.75 or higher will receive highest honors, and a graduating student with a cumulative GPA between 3.5 and 3.749 will receive honors.

Montana State University - Great Falls College of Technology

REGISTRATION

Registration for continuing students is available via “Banner Web” on the Internet. For registration purposes, continuing students are defined as students who have been enrolled at MSU – College of Technology in at least one of the last two academic terms (excluding summer).

Registration information and dates for new and continuing students will be available on the Academic Calendar posted on the College website.

The college reserves the right to deny registration access to a student who has an overdue debt to any Montana State University unit. Transcripts, certificates, and degrees will be withheld from any student owing tuition, fees, or charges to any Montana State unit. In the event a student has not returned books and/or materials belonging to this college or another Montana State University unit, transcripts, certificates, and degrees may be withheld.

Web Services: Banner Web - www.msugf.edu

To register, check grades, transcripts and course schedules, go to “Banner Web.”

Login to Secure Area

User ID Social Security Number or student ID number
PIN 6 numeric digits

Student Services

- Registration
 - Add/Drop Classes
 - Look Up Classes
 - Fee Assessment
- Student Records
 - View Student Holds
 - Final Grades
 - Unofficial Transcript
 - Account Summary

Personal Information

Change PIN
View Address Information

Financial aid and billing information are accessible through Banner Web.

Students experiencing any problems accessing or using Banner Web should contact Student Services.

TRANSCRIPT OF RECORD

Walk-in requests for transcripts should be turned in to the Business Office. If the student requesting a transcript has an unpaid financial obligation to any Montana State University campus, the request will not be processed until the bill has been paid and the student has notified the Registrar’s Office of payment.

Please note that no appeals for adjustments to the official transcript records will be reviewed beyond three years of the last date of attendance.

During most of the year, requests for transcripts will be processed within three to five working days after being received by the Registrar’s Office. Requests received during the last week of a semester will be held until final grades are processed.

Transcripts are sent only at the written request of the student. The request must include a signature, and can be paid with cash, check, money order, or credit card. Requests should be addressed to:

Registrar’s Office-Transcripts
MSU – Great Falls College of Technology
2100 16th Ave S
Great Falls, MT 59405

The first request for an official transcript will be processed without a fee; thereafter the processing fee for each transcript is \$3.00.

Transcripts/records submitted from other institutions/agencies cannot be released or duplicated, as they remain the property of the issuing institution/agency.

Students attending Montana State University – Great Falls College of Technology after 1987 can access an unofficial transcript at our website: www.msugf.edu by clicking “Banner Web” and logging onto the secure area.

WITHDRAWAL FROM THE COLLEGE

Students planning to withdraw from all courses must consult a Student Services counselor. The counselor will provide important information regarding the way a withdrawal will affect financial aid eligibility, tuition refunds, readmission to the college and grade point average. Courses the student is enrolled in at the time of withdrawal from the college will be entered on the student’s transcript in accordance with the grading policy in effect.

Montana State University - Great Falls College of Technology

Distance and Online Learning

DISTANCE EDUCATION DEPARTMENT

The college offers online courses which are an extension of the on-campus course offerings. Over 100 Internet courses are offered in general education, computer technology, business, health science, and office technology. During each term, emphasis is placed on offering Internet courses which support programs at the College of Technology, as well as other units of the Montana University System.

PROGRAMS OFFERED ON THE INTERNET

- Medical Transcription AAS Degree
- Medical Transcription Certificate
- Health Information Coding Specialist Certificate
- Health Information Technology AAS Degree
- Medical Billing Specialist Certificate
- Montana University System Core
- Associate of Arts
- Associate of Science
- Computer Information Technology (90% online) AAS degree
 - o Microcomputer Support
 - o Network Support
 - o Web Development

Additional information, including detailed course descriptions, is available on the web at <http://distance.msugf.edu>. For answers to questions about distance learning opportunities, please visit our website or call the Distance Education Department at 406-771-4440 or 800-446-2698, ext 4440.

INTERNET CLASSES

The college uses a variety of delivery methods to best accommodate students, and hires qualified faculty, both inside and outside of the Great Falls area, to meet the needs of students working part-and full-time. These faculty are trained and supported by the Distance Education Department to deliver effective instruction over the Internet. Courses are delivered using the WebCT C.E. 4.1 course management software. To avoid confusion, online students follow the same registration procedures as campus-based students. Online students have full access to MSU – Great Falls College of Technology library resources and now have the opportunity to order textbooks online through the COTtage Bookstore (<http://www.thecottagebookstore.com>). The college plans distance learning opportunities, coordinates their delivery with academic departments and provides student and faculty support services. Please contact the Distance Ed office for more information about the programs and/or course offerings. Students at a distance are an important part of the campus community!

MIXED-MODE (HYBRID) CLASSES

A hybrid or mixed-mode course combines the traditional classroom setting with an online component. The amount of on-campus class time varies but is less than a traditional face-to-face class. Students enjoy the flexibility and convenience of an online course as well as the benefits of meeting face-to-face for interactive classroom instruction.

ADVANTAGES: YOU CAN –

- Take courses from the comfort of your home.
- Earn a degree online while you work.
- Log in and complete assignments any time of day or night.
- Complete prerequisite courses online before relocating.
- Save on travel and childcare costs.
- Blend a course with your work schedule.
- Enjoy learning through an online format.

CHALLENGES: YOU MUST –

- Be self-motivated.
- Learn to communicate effectively using technology to connect with other students, faculty, and the Distance Education Department by using e-mail, phone calls, and posting to discussion groups.
- Beware of procrastination – online courses follow the same calendar as on-campus courses.
- Learn to use the technology along with the content of the course.
- Own, purchase, or gain access to updated software and a newer personal computer for some courses. The latest version of Microsoft Office Professional and the newest Internet Explorer browser are recommended.
- Install a sound card (required for some courses).
- Read instructions and all course materials versus attending on-campus course lectures.
- Have regular access to an Internet-ready computer and basic computer skills.



Montana State University - Great Falls College of Technology

College of Technology in Bozeman

INTRODUCTION

Gallatin Valley and MSU students now have access to some of the best benefits of a local two-year college at The College of Technology in Bozeman, an extension of MSU – Great Falls College of Technology.

MISSION STATEMENT

The mission of College of Technology in Bozeman is to be responsive to the educational and workforce needs of the Gallatin Valley by developing, delivering, and continually improving quality educational programs and services which will allow individuals to achieve their goals and create opportunities that will enrich their lives.

BOZEMAN STATS

Bozeman Population: 32,414 **Gallatin County:** 78,210
Elevation: 4,810 **Founded:** 1863

ATTRACTIONS

Bozeman Hot Springs	Bridger Mountains	Buffalo Jump
Canyon Ferry Lake	Downtown Bozeman	Virginia City
Hyalite Canyon	Lewis & Clark Caverns	Missouri Headwaters
Paradise Valley	Spanish Peaks	Gallatin National Forest
Yellowstone National Park		

OUTDOOR RECREATION

Hiking	Biking	Camping	Fishing
Hunting	Skiing	Snowmobiling	Horseback riding
Photography			

BOZEMAN HISTORY

The Bozeman Trail began as a gold-rush trail--a shortcut from the main trail on the North Platte River to the gold fields of Montana. The several routes of the Trail overlaid earlier Indian, trader and exploration routes in Wyoming and Montana. While only about 3,500 emigrants traversed the trail in 1864-66, its most significant consequence was that it cut through the Powder River Basin, the last and best hunting grounds of the Northern Plains Indians, and led to military occupation of the region and ultimately resulted in the Indian wars on the Northern Plains. After emigrant use ceased, the Trail served as a military road to the forts until it was abandoned in 1868 following the Fort Laramie Treaty. It was used again in 1876 by the forces of General George C. Crook, and shortly after the Battle of the Little Bighorn, the route was opened and used by settlers. ~ Susan Badger Doyle <http://www.bozemantrail.org/>

BOZEMAN ... ALWAYS IN SEASON

Bozeman is in the heart of southwestern Montana's Rocky Mountains. Clean air, a moderate climate, and excellent access to Yellowstone National Park are just some of the attributes of Bozeman. With its eclectic mix of professors, artists, ranchers, and sporting enthusiasts, the small Montana town of Bozeman is the ideal place to reside and recreate. (Excerpted from www.allbozeman.com)

PROGRAMS

- **AVIATION, ASSOCIATE OF APPLIED SCIENCE**
See page 40 for program information.
- **INTERIOR DESIGN, ASSOCIATE OF APPLIED SCIENCE**
See page 50 for program information.
- **WELDING TECHNOLOGY, CERTIFICATE OF APPLIED SCIENCE**
See page 55 for program information.
- **COLLEGE PREPARATORY CLASSES**
Preparatory classes are available and can be used as electives in the student's program of study, with the exceptions of Math 065 and English 118. Preparatory courses are designed to develop skills to ensure the success in follow-on courses in MSU curricular areas. High quality instruction and out-of-class support are hallmarks of the College of Technology in Bozeman.
COLS 100: Effective Academic Practices
COLS 101 US: First Year Seminar
English 118: Introduction to Critical Reading/Writing
English 119: Introduction to College Writing
Math 065: Pre-Algebra
Math 101: Introductory Algebra

SERVICES FOR STUDENTS

The Academic Development Center (ADC) is located at 201 Culbertson Hall on the Montana State University campus in Bozeman. The ADC offers math tutoring, a Writing Center, a computer lab, technical support for online courses, assessment testing and proctoring services, admissions, advising, and other administrative services.

GENERAL INFORMATION

Students enrolled in degree-seeking programs with the College of Technology in Bozeman have access to many campus amenities offered to the MSU-Bozeman university students, including residential life (dormitories), food services, library facilities, health services, bus transportation, and fitness facilities (some at extra cost). Students are encouraged to acquire an MSU-Bozeman student identification card. This "One Card" costs a one-time fee of \$15 plus the cost of each additional campus service.

CUSTOMIZED TRAINING CENTER - TECH CENTER

Located at 20 East Olive Street, Suite LL10, the Bozeman Tech Center offers short-term training in Microsoft Office, web design, computer-aided drafting, financial planning, real estate, selling on eBay, conflict and communication styles, creating business plans, and more. The workshop schedule can be found at <http://outreach.msugf.edu/bozeman/> or call (406) 522.0830. See page 17 for more information.



COLLEGE OF TECHNOLOGY IN BOZEMAN AN EXTENSION OF MSU-GREAT FALLS

201 Culbertson Hall, Montana State University Campus
PO Box 170515, Bozeman, MT 59717
Tel: 406.994.5536 Fax: 406.994.5577
Email: COTatBozeman@msugf.edu
Website: <http://bozeman.msugf.edu/>

Montana State University - Great Falls College of Technology

Division of Outreach & Workforce Development

PROFESSIONAL AND CONTINUING EDUCATION

An integral and growing part of the College's outreach mission are those activities termed "professional and continuing education" specifically, "non-academic" learning opportunities providing workforce preparation, employee training or re-training, business support, and life-long learning. These educational activities may be organized under varying instructional formats -- workshops, seminars, conferences, institutes, symposia, colloquia, short courses, etc.; however, they are aligned in their focus on imparting information to community members, employers, employees, and other groups in a high-quality, results-oriented manner. These activities are a major component of the workforce development mission extending the College's resources throughout the community.

The Division of Outreach and Continuing Education at Montana State University-Great Falls College of Technology anticipates and/or assesses needs for professional and continuing education and facilitates the delivery of coursework and programs to meet these needs. The Division is founded on the philosophy of academic excellence, entrepreneurship, sound business practice, and community collaboration. Training and educational opportunities are provided through the Centers for Extended Studies, Continuing Education, and Customized Training.

CENTER FOR EXTENDED STUDIES

The Center for Extended Studies provides Professional Certifications, Certificate, and Degree programs as well as credit-bearing (116) courses both on and off-campus. Credit-bearing courses provide excellent professional development opportunities for teachers who are in need of re-licensure with the State and also serve as general electives for students pursuing an Associate of Arts Degree at the College.

PROFESSIONAL CERTIFICATIONS

Note: All professional certifications are under review. Contact the Outreach Department at (406) 771.4303 for more information.

The Center for Extended Studies and the college's academic departments offer Professional Certification programs which provide the student with the opportunity to move rapidly into the job market with a core of skills. The Professional Certification programs are offered during the day, late afternoon, and evening as well as online to afford individuals the opportunity to earn credits while working. Serving as pivotal courses in many degree and certificate programs, these courses provide students the opportunity to utilize the credits to earn a Degree or a Certificate at a later date.



BUSINESS MANAGEMENT

Course No.	Title	Credits
BUS 106	Introduction to Business	3
BUS 255*	Legal Environment	3
BUS 240*	Advertising	3
BUS 230*	Management	3
BUS 235*	Marketing	3
COMM 130	Public Speaking OR	
COMM 135	Interpersonal Communication	3
	Total	18

COMPUTERIZED ACCOUNTING

Course No.	Title	Credits
ACCT 101	Accounting Procedures I	3
ACCT 102*	Accounting Procedures II	3
ACCT 190*	Payroll Accounting	3
CIT 110	Introduction to Computers	3
CIT 220*	Electronic Spreadsheets	3
MATH 104**	Business Mathematics	4
OO 173	Computer Calculators	1
	Total	20

LEGAL INFORMATION

Course No.	Title	Credits
CIT 110	Introduction to Computers	3
ENGL 120**	Introduction to Composition OR	
ENGL 121**	Composition I	3
OO 107	Keyboarding Basics OR	
OO 108*	Adv Keyboarding and Formatting	3
OO 180*	Legal Studies I	4
OO 260*	Machine Transcription	3
OO 265*	WordPerfect OR	
OO 266*	Microsoft Word	3
OO 287*	Legal Transcription	4
	Total	23

MICROCOMPUTER APPLICATIONS

Course No.	Title	Credits
CIT 110	Introduction to Computers	3
CIT 120*	Internet Essentials	2
CIT 166*	Computer Operating Systems	3
CIT 205*	Database Management	3
CIT 220*	Electronic Spreadsheets	3
MATH 103**	Introductory Algebra	4
OO 265*	WordPerfect OR	
OO 266*	Microsoft Word	3
	Total	21

MICROCOMPUTER WORD PROCESSING

Course No.	Title	Credits
CIT 110	Introduction to Computers	3
CIT 120	Internet Essentials	2
ENGL 121**	Composition I	3
OO 107	Keyboarding Basics	3
OO 108*	Advanced Keyboarding and Formatting	3
OO 265*	WordPerfect OR	
OO 266*	Microsoft Word	3
OO 295*	Administrative Office Proc	3
	Total	20

PARAMEDIC

Course No.	Title	Credits
AH 140*	Pharmacology	2
AH 145	Intro to Medical Terms	1
EMS 102	Fundamentals of Adv Care	3
EMS 105	Paramedic I	3
EMS 110	Paramedic I/II Skills Lab	2
EMS 115	Paramedic II	3
EMS 120	Paramedic I/II Clinical	3
EMS 145	ACLS Preparation	1
EMS 146	PALS Preparation	1

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EMS	148	Pre-Hospital Trauma Life Sup	1
EMS	205	Paramedic III	3
EMS	210	Paramedic III/IV Skills Lab	2
EMS	220	Paramedic III/IV Clinical/Field	4
EMS	225	Paramedic IV	3
		Total	32

Note: This professional certification is primarily aimed at firefighters, who do not request or require a degree or certification.

PROFESSIONAL COMMUNICATION

Course	No.	Title	Credits
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3
CIT	110	Introduction to Computers	3
ENGL	121**	Composition I	3
ENGL	124*	Business & Prof Comm OR	3
ENGL	228*	Strategies of Business Comm	3
OO	107	Keyboarding Basics OR	3
OO	108*	Advanced Keyboarding and Formatting	3
OO	265*	WordPerfect OR	3
OO	266*	Microsoft Word	3
		Total	24

~ INDUSTRY STANDARD CERTIFICATIONS

Montana State University – Great Falls College of Technology offers Professional Certification programs and courses that lead to Industry Standard Certification. Students who successfully complete these programs and/or courses are prepared to sit for certification exams. The certification programs are as follows:

COMPTIA NETWORK+

Course	No.	Title	Credits
CIT	126*	Networking Basics	3
CIT	176*	Router & Routing Basics	3
CIT	226*	Switching & Intermediate Routing	3
CIT	276*	WAN Technologies	3

Note: Information provided in the four semesters of Cisco is designed to cover the CompTIA Network+ objectives.

COMPTIA A+

Course	No.	Title	Credits
CIT	272*	PC Troubleshooting/Main	4

CISCO CERTIFIED NETWORKING ASSOCIATE (CCNA)

Course	No.	Title	Credits
CIT	126*	Networking Basics	3+
CIT	176*	Router & Routing Basics	3+
CIT	226*	Switching & Intermediate Routing	3+
CIT	276*	WAN Technologies	3+

Note: If the student completes each of the above Cisco courses with a final exam score of 80% or better, the student is eligible for a Cisco voucher worth 40% off the cost of the Certification exam at a certified Testing Center (cost with voucher is approximately \$60. The voucher discount is available at the discretion of Cisco systems.)

CISCO CERTIFIED NETWORKING PROFESSIONAL (CCNP)

Course	No.	Title	Credits
CIT	278*	Advanced Routing	4
CIT	279*	Remote Access	4
CIT	281*	Multilayer Switching	4
CIT	282*	Network Troubleshooting	4

Successful completion of four examinations is required for the CCNP industry certification. At the completion of each of the above courses the student is prepared to take the corresponding examination.

MICROSOFT MCP

Course	No.	Title	Credits
CIT	211*	Network Operating Systems II OR	2
CIT	166*	Computer Operating Systems	4

MICROSOFT OFFICE SPECIALIST MICROSOFT WORD

Course	No.	Title	Credits
OO	266*	Microsoft Word	3

Note: After successfully completing the course listed above, students are prepared to take the MOS Word Core or Expert industry certification (depending on the student's consideration of readiness) examination at the local certified Testing Center.

MICROSOFT OFFICE SPECIALIST MICROSOFT POWERPOINT

Course	No.	Title	Credits
CIT	140*	Presentation Fundamentals	1

Note: After successfully completing the course listed above, students are prepared to take the MOS PowerPoint industry certification examination at a local certified Testing Center.

MICROSOFT OFFICE SPECIALIST MICROSOFT EXCEL

Course	No.	Title	Credits
CIT	220*	Electronic Spreadsheets	3

Note: After successfully completing the course listed above, students are prepared to take the MOS Excel Core or Expert industry certification (depending on the student's consideration of readiness) examination at a local certified Testing Center.

MICROSOFT OFFICE SPECIALIST MICROSOFT ACCESS

Course	No.	Title	Credits
CIT	205*	Database Management	3

Note: After successfully completing the course listed above, students are prepared to take the MOS Access Core or Expert industry certification (depending on the student's consideration of readiness) examination at a local certified Testing Center.

MICROSOFT CERTIFIED SYSTEM ADMINISTRATOR (MCSA)

Course	No.	Title	Credits
CIT	126*	Networking Basics	3
CIT	166*	Computer Operating Systems	4
CIT	176*	Router & Routing Basics	3
CIT	211*	Network Operating Systems II	2
CIT	272*	PC Troubleshooting/Maintenance	4

The MCSA is a new Microsoft Exam that combines Microsoft industry examinations with CompTIA certification examinations. Please inquire with the Computer Technology faculty for specifics on the certification and for a schedule of semester classes to meet your certification and educational goals. Not all courses are offered every semester.

WOW CERTIFIED WEB DESIGNER ASSOCIATE (CWDSA) WOW CERTIFIED ASSOCIATE WEB MASTER (CAW)

Course	No.	Title	Credits
CIT	229*	Web Page Construction	3
CIT	231*	Web Page Design	3
CIT	250*	Web Page Programming	3
CIT	217*	Computer Graphic Design	4

The CWDSA certification is an industry-standard test to show the student's proficiency in the visual arts and in creating the images and designs that capture and keep visitors' interest. They present aesthetically enticing designs that meet the requirements and preferences of their audience.

Montana State University - Great Falls College of Technology

The CAW certification is an industry-standard test to show the student's proficiency in blending the art of HTML-coding with the visual arts to create pages that are content-rich and visually pleasing. Certified web masters are proficient at page layout, image creation and manipulation, interactivity, content creation, project and business management.

Note: After successfully completing the courses listed above, students are prepared to take either or both of the WOW certification examinations listed (depending on the student's consideration of readiness) at a local certified Testing Center.

DEGREE AND CERTIFICATE PROGRAMS

Through the Center for Extended Studies and the college's Academic Departments, the Division of Outreach and Workforce Development offers Associate Degree and Certificate programs that digress from the traditional academic structure through non-standardized coursework to both the on- and off-campus communities. These programs are frequently offered through cohorts, evening, weekend, online, and accelerated programs to meet the needs of working students and others who require various flexibilities to meet their educational goals. Current programs include:

~ EMS: Fire & Rescue Technology (Associate of Applied Science - AAS)

This degree program combines technical fire and rescue training with general education courses to fulfill Associate of Applied Science Degree requirements. It also incorporates the opportunity to transfer credits toward a four-year degree in Fire Administration. The Fire and Rescue Technology Option is offered as a cooperative endeavor between Montana State University - Great Falls College of Technology and Montana State University Fire Services Training School—Great Falls. For more information see page 63.

~ Creative Arts Enterprises (Certificate of Applied Science)

Creative Arts Enterprise, built upon the TRACE pilot project, is a Montana State University - Great Falls certificate program designed to help artisans develop a broader knowledge of business, while enhancing their skills in their craft. This innovative workforce development program is designed to launch Montana's promising artisans in sustainable arts careers without having to leave the state. It targets students wanting a flexible, short-term educational experience that nurtures the discipline of their art while providing them with the entrepreneurial skills and knowledge necessary to succeed in creative enterprise. For more information see page 48

~ Radiologic Technology Associate of Applied Science Degree Competition Option (AAS)

Students who have successfully completed and documented that they graduated from an accredited Radiologic Technology program, are currently working in the field of radiology, and possess a current Radiologic Technologist State license may apply to the College's Radiologic Technology AAS Degree Completion program and earn a College Degree by taking as little as 17 college credits. For more information see page 70.

116 COURSES

Courses assigned with a 116 number are considered credit-bearing professional and continuing education courses. They are typically offered to provide condensed coursework to meet the needs of working students, professionals in need of skills upgrades, fulfill some of the requirements of Professional Certifications, offer a diversity of electives for Associate of Arts Degree seeking students, and fill certain professional certification needs (e.g. Montana K-12 Teacher Certification). These courses are eligible for financial aid for students using them as electives in degree and certificate programs where authorized. Students should consult their advisor to identify if 116

courses will apply toward their program requirements. 116 courses are transcribed on the student's undergraduate transcript.

116 courses provide participants with the latest in technology, business, health and human development and other topics meeting the current trends and demands of the workplace. These credit-bearing courses (typically 1 credit) are offered each semester on the MSU – Great Falls campus and through the College of Technology in Bozeman.

CONTINUING EDUCATION CENTER

The Center for Continuing Education provides non-credit courses that train and upgrade participants' skills in health, business management, general education, technology fields, and other identified needs of Montana's workforce and business community. These are primarily delivered through non-credit courses with a 199 number.

199 COURSES

Courses assigned a 199 number are considered non-credit professional and continuing education courses. They are typically offered to provide condensed coursework to meet the needs of working students and professionals in need of skills upgrades, fulfill some of the requirements of Professional Certifications, and certain professional certification needs (e.g. OPI Renewal Units for Montana K12 Teacher Certification). These courses are eligible for Continuing Education Units (CEU's) and OPI Renewal Units. They are transcribed on the student's continuing education transcript.

Semester schedules with 199 courses covering a variety of training topics are mailed to those interested. Please call the College at 406-771-4300 or 1-800-446-2698 to request that your name be added to the mailing list. You can also join our mailing list by going to our website at <http://outreach.msugf.edu>.

CONTINUING EDUCATION UNITS (CEU'S)

Courses offered through the Continuing Education Center are eligible for Continuing Education Units (CEU's). These are awarded to the student upon successful completion of the course and are recorded on the student's continuing education transcript. CEU's are awarded based on national accreditation guidelines of 1 CEU = 10 Contact hours. In addition to CEU's, courses offered through the Continuing Education Center are also eligible for Office of Public Instruction (OPI) Renewal Units. These are awarded on a 1 Renewal Unit = 1 Contact hour formula.

Montana State University - Great Falls College of Technology

CUSTOMIZED TRAINING CENTERS

LOCATIONS IN GREAT FALLS AND BOZEMAN

Through the Downtown Training Center in Great Falls and the Bozeman Tech Center in Bozeman, the Customized Training Centers assist businesses, including those located in rural communities, to maximize their ability to make a profit. By developing customized training programs matched to business needs, the centers bring together groups of people for effective exchange of knowledge, and provide specialized, effective training for all areas of business. Examples of training currently being offered include: Customer Service, Telephone Etiquette, Sales Training, Train the Trainer, Supervisory Skills, Records Management, Communication Styles, Time Management, Business Plans, Cash Flow Management, Computer Skills, Marketing on the Internet, E-Commerce, Advertising, Successful Business Writing, Innovation and Creativity, Conflict Management, Technology Applications and Professional Image, among other topics.

Customized Business and Professional Training provides the highest quality training solutions to the greater Great Falls and Bozeman Communities. We invite you to join other great local companies-Great Falls Clinic, Davidson Companies, and 3Rivers Communications to name a few-and take advantage of this powerful training resource.

Customized Training Representatives

Bozeman: 406-522-0830: Great Falls: 406-454-3217

MSU – GREAT FALLS TESTING CENTER

The MSU – Great Falls College of Technology Testing Center is an official Prometric, Pearson VUE, and Certiport testing facility. Prometric, Pearson VUE, and Certiport are the world's leading provider of computer-based testing and assessment services.

The Testing Center offers more than 125 exams in various categories, including information technology certification and professional licensure. These exams include:

- Microsoft Certifications (MCP, MCSA, MCSE, MOS)
- CompTIA Certifications (A+, Network+)
- Cisco Certification (CCDA, CCNA, CCNP)
- Oracle Certification (DBA, OCP)
- Certified Internet Webmaster (Web Developer, site designer)

REGISTERING FOR EXAMS

To learn more about registering for an exam, please call (406) 771-4391 during business hours Monday through Friday. Exams can be scheduled during the hours of 12 noon to 5 pm Monday, 8 am to 5 pm Tuesday through Thursday, and 12 noon to 5 pm on Fridays. Special appointments for exams may be available by contacting the Test Center.

Register in person for Certiport exams (e.g. Microsoft Office Specialist) or online at www.2test.com (Prometric) or www.pearsonvue.com (Pearson VUE).

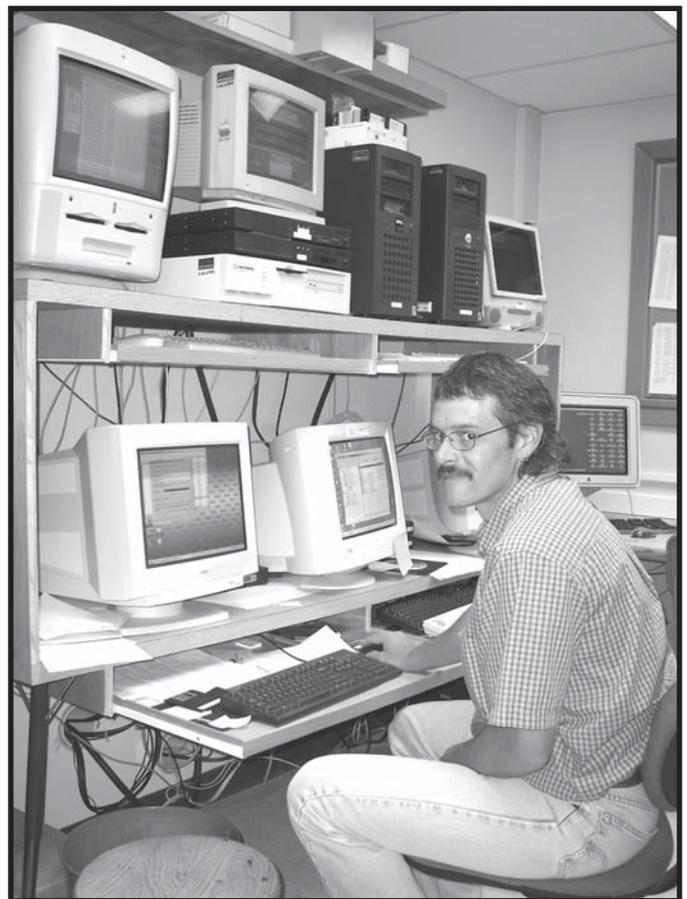
OUR LOCATION

The MSU – Great Falls Test Center is housed on the MSU – Great Falls Campus at 2100 16th Ave South, Great Falls, MT 59405.

IT CERTIFICATION INFORMATION

For more information on various industry certifications, please visit the websites listed below:

- Cisco certifications: www.cisco.com
- CompTIA certifications: www.comptia.org
- Microsoft certifications: www.mcpmag.com
- Microsoft certifications: www.microsoft.com/traincert
- Oracle certifications: www.oracle.com
- World Organization of Webmasters: www.webprofessionals.org/certification/index.html



Montana State University - Great Falls College of Technology

Financial Aid

ELIGIBILITY REQUIREMENTS

All recipients of federal financial aid at Montana State University-Great Falls College of Technology must meet the following general eligibility requirements:

- Have financial need as determined by a need analysis formula provided through information on the Free Application for Federal Student Aid (FAFSA);
- Be a U.S. citizen or an eligible noncitizen;
- Have a high school diploma or GED. Home school students must contact the Office of Financial Aid;
- Be enrolled as a regular student in courses leading to a financial aid eligible certificate or degree program generally at least half time (specialized endorsements and certain one credit seminars and workshops are not eligible for financial aid);
- Maintain Satisfactory Academic Progress in accordance with the policy of the Office of Financial Aid;
- Not owe a refund on a federal grant or be in default on any Title IV loan;
- Register with Selective Service, if required;
- Agree to use any federal student aid received solely for educational purposes;
- Comply with the requirements of the Anti-Drug Abuse Act.

The Office of Financial Aid may not award financial assistance in the form of loans, grants, scholarships, special funds, subsidies compensation for work, or prizes to students on the basis of race, color, national origin, sex, or handicap, except to overcome the effects of past discrimination. The Office of Financial Aid may administer sex restricted financial assistance where the assistance and restriction are established by will, trust, bequest, or any similar legal instrument, if the overall effect of all financial assistance awarded does not discriminate on the basis of sex. Materials and information used to notify students of opportunities for financial assistance may not contain language or examples that would lead applicants to believe the assistance is provided on a discriminatory basis. If the Office of Financial Aid's service area contains a community of national origin minority persons with limited English language skills, such information must be disseminated to that community in its language.

ASSISTANCE IN APPLYING

Assistance is available to prospective students applying for financial aid. In addition, financial aid counseling for new students is an integral part of the admissions and orientation process. Once enrolled, students may receive counseling and assistance as needed. For assistance, please call 406-771-4334 or 1-800-446-2698 (in Montana), or write Office of Financial Aid, Montana State University-Great Falls College of Technology, 2100 16th Avenue South, Great Falls, MT 59405.

PRIORITY DEADLINES

Priority deadlines are set to inform students when they need to apply for financial aid each year. REMEMBER: Every student must re-apply for financial aid each academic year.

New students beginning their attendance in the Fall Semester should apply for financial aid by July 1. New students beginning their attendance in the Spring Semester should apply for financial aid by November 1. All students attending the Summer Semester should apply by March 1.

Although the deadlines for Fall, Spring and Summer are set in July, November, and March, some of the federal and State financial aid programs with limited funding may already be fully expended for the

award year. An applicant should apply by the March 1 priority date to ensure consideration for all federal funding available for the award year.

Students may apply after these deadline dates; however, they may not have their financial aid awarded in time for the beginning of that semester. If a student's aid process is not complete when institutional charges are due, the student must pay his/her institutional charges and be reimbursed with his/her financial aid eligibility once the financial aid process has been completed and aid is received.

APPLICATION PROCESS

Students seeking Federal financial aid (which includes grants and loans) must complete the Free Application for Federal Student Aid (FAFSA) which is available at the Office of Financial Aid, or online at www.fafsa.ed.gov. If the applicant completes the paper form, it must be mailed in the envelope provided. If the applicant submits an electronic FAFSA, a signature page must be mailed or the application must be signed electronically with a PIN number. A pin number from the Department of Education for financial aid purposes may be obtained by going to this website: www.pin.ed.gov. As a result of completing a FAFSA, an applicant will receive a federal Student Aid Report (SAR) in the mail or online. Students should submit the SAR to the Office of Financial Aid as quickly as possible.

Students receiving financial aid must also submit copies of the proper federal income tax forms and any other information requested by the Office of Financial Aid.

ELECTRONIC NOTIFICATION

The Financial Aid Office at Montana State University Great Falls College of Technology may use electronic notification for any official correspondence to financial aid applicants. All applicants should supply a valid email address and check it frequently for financial aid correspondence.

FINANCIAL AID PROGRAMS

The following federal and state programs are available at Montana State University-Great Falls College of Technology. Students apply for each of these through the FAFSA application unless otherwise noted.

FEDERAL ACADEMIC COMPETITIVENESS GRANT (ACG)

A federal ACG grant is a form of gift aid for full time, PELL grant eligible students enrolled in a eligible program of study who have completed a rigorous program of study in high school (as determined by the Department of Education). Eligible students must have graduated from high school after 1/1/05 and must submit a complete high school transcript to the Registrar's Office. The amount of the grant is determined by grade level and available funding.

FEDERAL PELL GRANT

A federal Pell grant is a form of gift aid for students enrolled in an eligible program of study who do not already have a bachelor's degree. The amount of the federal Pell Grant is determined by the Estimated Family Contribution on the federal Student Aid Report, the number of credits in which the student is enrolled and the student's educational budget for the award year. Federal Pell Grant disbursements are made after the drop/add period for each term. A student's enrollment status for federal Pell Grant eligibility is based on credits carried at the end of the drop/add period for the term.

FEDERAL SUPPLEMENTAL EDUCATION OPPORTUNITY GRANTS (FSEOG)

Federal Supplemental Educational Opportunity Grants are a form of gift aid. Student eligibility is determined by completing the FAFSA. Preference for the FSEOG is given to students who have federal Pell Grant eligibility and who are early applicants. Funding is limited and is awarded on a first-come, first-served basis.

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FEDERAL WORK-STUDY

The Federal Work-Study Program offers part-time employment for eligible students. Students seeking eligibility under this program must complete the FAFSA. A student's earnings are limited to the amount awarded through the Office of Financial Aid. Federal Work-Study students are paid every other week according to the State of Montana payroll schedule. Federal Work-Study jobs may be on campus or in an off campus community service organization. Funding is limited and is awarded on a first-come, first-served basis.

GOVERNOR'S POSTSECONDARY SCHOLARSHIP - NEED BASED

Governor's Postsecondary Need Based Scholarships are available to entering freshmen who demonstrate unmet need as determined by the FAFSA, are Montana residents, and are degree seeking. The amount of the award is \$1000 and may be renewable for up to two years. Funding is limited and recipients are selected by the Financial Aid Office based on annual funding levels.

MONTANA BAKER GRANT (MTAP)

The Montana Baker Grant is available to Montana students who have enrolled full time, earned a predetermined amount of income the previous year and who are not receiving a set amount of other gift aid. Grants are between \$100-\$1000 depending on an individual's eligibility. Funding is limited and is awarded on a first-come, first-served basis.

MONTANA HIGHER EDUCATION GRANT (MTHEG)

Montana Higher Education Grants are a federal and state form of gift aid. Students must have financial need and be a Montana resident. Student eligibility is determined by submitting the FAFSA. Students with federal Pell Grant eligibility and who apply early have preference. Funding is limited and is awarded on a first-come, first-served basis.

STATE WORK-STUDY

The state Work-Study Program offers part-time employment for eligible students who are Montana residents. Students seeking eligibility under this program must complete the Free Application for Federal Student Aid (FAFSA). A student's earnings are limited to the amount awarded through the Office of Financial Aid. State Work-Study students are paid every other week according to the State of Montana payroll schedule. State Work-Study positions are all located on campus. Funding is limited and is awarded on a first-come, first-served basis.

FEE WAIVERS

Fee waivers are administered by the Office of Financial Aid. For all students, inquiries should be directed to the Office of Financial Aid. All fee waivers are based on financial need as a criterion whenever possible, except for honor scholarships for National Merit Scholarship semifinalists, high school honor scholarships, and faculty and staff fee waivers. Fee waivers do not require repayment. Fee waivers are state funded and require Montana residency status with the exception of the faculty/staff fee waiver.

HONORABLY DISCHARGED VETERANS' FEE WAIVER

The registration fee and tuition shall be waived for certain honorably discharged persons who served with the United States Armed Forces in specified time periods and are currently residents of the State of Montana according to the Board of Regents residency policy. A provision of this policy states that the fee waiver shall not apply to persons who qualify under federal laws granting educational benefits to veterans. Application forms are available from the Office of Financial Aid or the Financial Aid website at www.msugf.edu/financialaid/feewaivers.htm. Recipients of this fee waiver are subject to satisfactory academic progress requirements. Fee waivers are available for War Orphans and dependents of prisoners of war. Direct inquiries to the Office of Financial Aid.

INDIAN STUDENT FEE WAIVER

This waives the registration fee and tuition each semester and is awarded by the Office of Financial Aid to students who submit documentation that they are at least 1/4 American Indian, complete an affidavit stating that they have been bona fide residents of the State of Montana for at least one year prior to enrollment in the Montana University System, and demonstrate financial need by completing the FAFSA. Applicants for this fee waiver must file a FAFSA, complete their financial aid file, and complete the fee waiver application available in the Office of Financial Aid or online at www.msugf.edu/financialaid/feewaivers.htm. Recipients of this fee waiver are subject to satisfactory academic progress requirements.

MONTANA SENIOR CITIZEN FEE WAIVER

Tuition and registration fees shall be waived for students classified as in-state residents for fee purposes and who are at least 62 years of age at time of registration. To apply, students must submit a copy of their driver's license or state ID card to the Office of Financial Aid, along with the application.

SURVIVING DEPENDENTS OF MONTANA FIREFIGHTERS/PEACE OFFICERS FEE WAIVER

Registration fees and tuition shall be waived for the surviving spouse or child of any Montana firefighter or peace officer killed in the course and scope of employment. This waiver shall not apply to the extent that any person is eligible for educational benefits from any governmental or private benefits program that provides comparable benefits. To apply, please contact the Office of Financial Aid. Recipients of this fee waiver are subject to satisfactory academic progress requirements.

FACULTY AND STAFF FEE WAIVER

All fees, except registration and building fees, shall be waived for a maximum of 6 credits per term for permanent Montana University System employees who are employed at least 3/4-time during the entire period of enrollment. Application forms are available from the Office of Financial Aid, or online at www.msugf.edu/financialaid/statefeewaivers.htm.

DEPENDENT FEE WAIVER

All employees who have been employed at least ¾ time or more for at least five years without a break in service are eligible for a dependent waiver benefit. The employee must remain employed for the entire time during which the tuition waiver is utilized. Eligible jointly employed spouses may utilize the dependent tuition waiver benefit for two children at one time but any one child may not receive more than a 50% tuition waiver under the dependent tuition waiver policy. Applications for the dependent tuition waiver benefit are to be initiated by the employee or the employee's dependent. Employees who do not submit a timely application for a dependent tuition waiver may be denied the dependent tuition waiver benefit.

Employees will be required to sign a statement verifying 1) that they are not utilizing the tuition waiver for themselves, and 2) the child utilizing the tuition waiver is claimed as a dependent for federal tax purposes, is unmarried and has not reached age 25 as of the first day of the semester for which the tuition waiver is granted; or 3) the employee is married to the spouse utilizing the tuition waiver. Documentation that a dependent has been claimed in the tax year the benefit is used may be required for audit purposes or in cases of suspected misuse. False certification of dependent eligibility for the tuition waiver is cause for discharge and the employee shall be required to repay the cost of the tuition waiver.

The dependent tuition waiver benefit is a 50% reduction in the cost of residential tuition. This benefit is not taxable. In no case may registration, course fees or any other mandatory fee be waived. There is

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no limitation on the number of credits that may be taken per semester under the tuition waiver benefit. Contact the Office of Financial Aid for additional information.

SCHOLARSHIPS

INSTITUTIONAL SCHOLARSHIPS

MSU – Great Falls College of Technology has an institutional scholarship application for most institutional scholarships. The deadline for this application is the beginning of February for the next academic year. Contact the Office of Financial Aid for this application.

MONTANA UNIVERSITY SYSTEM HONOR SCHOLARSHIP

Recipients of the Honor Scholarship are selected by the Office of the Commissioner of Higher Education and will receive a waiver of tuition and the registration fee for Fall and Spring semester. Recipients must submit to the financial aid office a copy of their Honor Scholarship notification from the Commissioner's Office upon receipt.

HONOR SCHOLARSHIP FOR NATIONAL MERIT SCHOLARSHIP SEMIFINALISTS

Tuition and the registration fee shall be waived for National Merit Scholarship semifinalists from Montana. This scholarship (fee waiver) will be valid through the first two semesters of enrollment exclusive of any credits earned prior to high school graduation.

SCHOLARSHIP SEARCHES

Graduating seniors should talk with their high school counselors. Many high schools offer good scholarship services for little or no charge. All students should periodically check the financial aid website: www.msugf.edu/finaid/scholarships. The Office of Financial Aid will post scholarship information and deadlines on the Financial Aid website as information becomes available.

There are many FREE scholarship searches available on-line; the Office of Financial Aid recommends searching at these sites: <http://fastweb.com> or www.finaid.org.

FEDERAL FAMILY EDUCATION LOAN PROGRAM (FFELP)

FEDERAL SUBSIDIZED STAFFORD/FEDERAL UNSUBSIDIZED STAFFORD/FEDERAL PLUS

The Free Application for Federal Student Aid (FAFSA) must be completed to determine eligibility for all FFELP loans. The FFELP loans offer assistance from a participating lending institution of the borrower's choice. First-year, first-time borrowers at Montana State University - Great Falls College of Technology will have the first disbursement of their loan delayed for 30 calendar days from the first day of classes.

All borrowers must maintain satisfactory academic progress in accordance with the policy of the Office of Financial Aid and be enrolled at least half-time to qualify for any FFELP loans. Deferments for Peace Corps or volunteer services may be available.

VETERANS' BENEFITS

Students who are Veterans of military services may be eligible for Veterans' Benefits. Application for benefits should be made at least 30 days in advance of the start of the academic term. Other educational benefits are extended to orphans of Veterans and for the vocational rehabilitation of Veterans. Once enrolled, recipients must request that the Office of Financial Aid verify their enrollment with the Department of Veterans Affairs before benefits will begin.

Veterans attending MSU – Great Falls College of Technology must maintain a 2.0 Cumulative GPA. If the student falls below a 2.0 CGPA they will have one semester to raise their GPA to a 2.0. If the student is unable to do this, they will be placed on suspension and will have to sit out a term before they are able to return. Appeals may be granted for

extenuating circumstances.

For information on Veterans' Benefits, contact the Office of Financial Aid at 406-771-4334 or the Veterans Administration at 1-888-GIBILL1.

STATE AND LOCAL SERVICES

Montana Social and Rehabilitative Services Division, Montana Workforce Services, Bureau of Indian Affairs, Project Challenge, and Rural Employment Opportunities offer assistance to students who qualify for their programs. For information regarding eligibility requirements, contact the specific program. The Office of Financial Aid must be notified by the student if any assistance is received from an outside agency.

WITHDRAWALS / CHANGES IN ENROLLMENT

Students receiving financial aid are expected to complete a designated percentage of the credits for which they are funded each academic term. The Office of Financial Aid must be notified by the student of any increase or decrease in number of credits. Students may be suspended from financial aid for not completing the designated percentage of credits.

Those students who are receiving financial aid and completely withdraw from the college may owe the Department of Education a prorated amount of aid received based on class days attended in the term. Students who owe repayment will be ineligible for further federal financial aid as long as a repayment is outstanding.

Students who do not officially withdraw but stop attending classes and receive failing grades will be considered unofficial withdrawals. The institution will determine the last date of attendance. Based on this date, students may owe a repayment of aid received.

RETURN OF TITLE IV FUNDS

This policy applies to students who officially or unofficially withdraw from the college. Refunds are determined according to the following policy:

1. The term "Title IV Funds" refers to the federal financial aid programs authorized under the Higher Education Act of 1965 (as amended) and includes the following programs: subsidized FFELP loans, unsubsidized FFELP loans, FFELP PLUS loans, Federal Pell Grants, federal ACG Grants, and federal SEOG. The state fund that may be affected is the MTAP grant.
2. A student withdrawal date is:
 - The date the student began the institution's withdrawal process or officially notified the institution of intent to withdraw: or
 - The midpoint of the period for a student who leaves without notifying the institution; or
 - The student's last date of attendance at a documented academically related activity.
3. Return of fund calculations:
 - For the purpose of billing and calculating return of funds the summer sessions are part of one summer term.
 - In accordance with federal regulations, when financial aid is involved, return of funds are allocated in the following order: unsubsidized FFELP loans, subsidized FFELP loans, FFELP Plus loans, federal Pell Grants, federal SEOG, other Title IV assistance.
 - Copies of this calculation can be requested from the Office of Financial Aid.

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4. Institutional and student responsibilities with regard to the return of the Title IV funds.

MSU – Great Falls College of Technology’s responsibilities with regard to the return of Title IV funds include:

- Providing each student with the information given in this policy;
- Identifying students who are affected by this policy and completing the Return of Title IV calculation for those students within 45 days of the withdrawal date;
- Returning any Title IV funds that are due to the Title IV programs.

The student’s responsibilities with regard to the return of the Title IV funds include:

- Repaying to the Title IV programs any funds that were disbursed directly to the student and which the student was determined to be ineligible for through the Return of Title IV funds calculation

Examples of this calculation can be obtained from the MSU – Great Falls College of Technology Office of Financial Aid.

TRANSFER STUDENTS

Students who are on financial aid suspension from another institution may be placed on financial aid probation at Montana State University - Great Falls College of Technology. They will have one academic term in which to earn a 2.0 grade point average (GPA) and complete the minimum percentage of credits attempted. Students who are on financial aid probation and do not earn a 2.0 GPA or complete the minimum percentage of credits attempted will be suspended from receiving further financial aid until they meet satisfactory academic progress requirements at the college.

ATTENDANCE

Attendance is mandatory to receive financial aid. Students must attend classes on a regular basis and complete them to continue to receive financial aid. If a student stops attending part or all of their classes, they may have to repay part or all of the financial aid they have received.

SATISFACTORY ACADEMIC PROGRESS REQUIREMENTS

Federal and state financial aid regulations require that all financial aid recipients maintain satisfactory academic progress in their programs of study. Failure to maintain Satisfactory Academic Progress will result in either financial aid probation or suspension. Students on financial aid probation may continue to receive financial aid. Students on financial aid suspension will not receive financial aid. Below is a brief outline of the standards to achieve satisfactory progress for financial aid recipients at Montana State University-Great Falls College of Technology. For a complete copy of the policy contact the Office of Financial Aid.

- Students are required to maintain a minimum 2.0 cumulative grade-point average (C average). Students with less than a 2.0 CGPA, but at least a 1.50 CGPA, at the end of each academic term will be placed on financial aid probation for the next academic term and placed on financial aid suspension at the end of the probation term if the CGPA is not 2.0 or above. If at any time a student’s CGPA is less than a 1.50, and/or the completion ratio is less than 67%, the student will be placed on financial aid suspension;

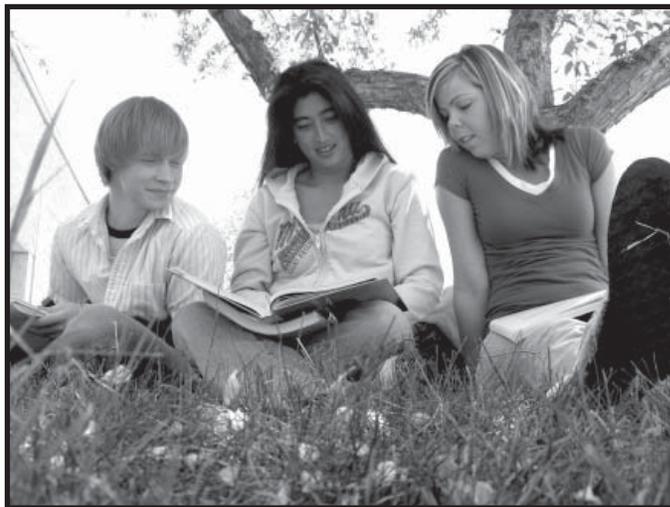
- Students must complete 67 percent (rounded) of the number of attempted credits as of the end of the add/drop period each term. Students with a completion ratio of less than 67 percent at the end of each term will be placed on financial aid suspension.
- Students have a maximum time frame in which to receive financial aid, which is generally 150 percent of the number of required credits specified for each program of study;
- Students who have been placed on financial aid suspension and bring themselves into good standing may be reinstated for the payment period following the semester in which they regained satisfactory progress status. Students must submit a written request for reinstatement;
- Students will receive written notice when they are placed on financial aid probation or suspension; however, it is the student’s responsibility to know if they are maintaining satisfactory academic progress for financial aid recipients

Students who have been placed on financial aid suspension because of failure to meet the satisfactory academic progress requirements may appeal in writing to the Office of Financial Aid for review of circumstances. Forms to appeal are available online at www.msugf.edu/finaid/Forms.htm#sap or in the Office of Financial Aid. Current federal regulations allow only for mitigating circumstances and occurrences beyond the student’s control to constitute an eligible appeal. All appeals must contain documentation to verify the mitigating circumstances listed in the appeal.

Contact the Office of Financial Aid for a complete satisfactory academic progress policy for financial aid recipients.

CHANGES TO FINANCIAL AID POLICIES

Exceptions or amendments to any of the specific provisions regarding financial aid policies or requirements may be made at any time, without publication, due to changes in federal, state, and/or institutional regulations and policies.



Student Information

POLICIES AND PROCEDURES

ACADEMIC INTEGRITY POLICY

As an institution of higher education, Montana State University - Great Falls College of Technology requires its students to adhere to high standards for academic integrity. It is a violation of academic integrity to present the ideas, designs, or work of another person as one's own effort or to permit another person to do so. The College will regard the following acts as violations of academic integrity requiring disciplinary action:

Plagiarism – an assignment—whether written, oral, graphic, or computer-generated which consists wholly or partially of the words, work, or ideas of another individual without giving the original author proper credit.

Copying – Using crib notes, cheat sheets, books, or other material, resource, or electronic device as aids in an examination or any other graded exercise, unless the instructor of the class has given permission to use such materials; collaborating with another student or students on an examination or other graded exercise, without instructor permission; contributing to violations of academic integrity; knowingly assisting another student in an act which violates academic integrity.

Violations of academic integrity will not be tolerated at MSU – Great Falls College of Technology. The consequence for the first such violation is at the discretion of the instructor and may range from a failing grade for the particular assignment/test to an automatic failing grade in the course in which the act of academic dishonesty occurred. Students may be prevented from withdrawing from a course in a case of academic dishonesty. Faculty must report all violations of academic integrity to their respective Department Chair. In the instance of repeated offenses, the Department Chair will recommend disciplinary action ranging from a failing grade for the assignment/course up to and including expulsion from the College. Appeals of Department Chair decisions on academic dishonesty are made to the Associate Dean for Academic Affairs. A student may not represent the College in any official manner and may not hold a student government office if he/she has violated this policy.

Faculty must report all violations of academic integrity in writing to the student involved, the appropriate Department Chair(s), the Assistant Dean for Student Services, and the Associate Dean for Academic Affairs. In cases of repeated offenses, the Associate Dean for Academic Affairs will recommend disciplinary sanctions that may result in expulsion from the College. Students retain their right to due process and may file a complaint through Student Services in response to any academic or disciplinary sanctions.

ACCIDENTS/ILLNESS

If a student incurs an injury or becomes ill while on campus and the student is unconscious, unable to respond, or the injury or illness is perceived to be of a serious nature, Emergency Response Services (911) will be called. Students are responsible for the cost of transport and treatment for accidents or illness. If the student is conscious and able to respond, and the injury or illness is not perceived to be life-threatening, the student will be given the opportunity to refuse Emergency Medical Services. Students will be requested to complete an Incident Report form available from the Information Desk.

CHANGE OF ADDRESS

A current mailing address, permanent address and telephone number should be on file in the Admissions & Records Office. A forwarding address should be provided when a student withdraws or graduates. A change of address form is available at the Information Desk or in the Admissions and Records office.

COMMERCIAL ACTIVITIES/FUNDRAISING

The sale of goods or services and solicitation of funds from any source not affiliated with the campus is prohibited in the building, on campus grounds, and at all campus-sponsored activities. Exceptions to this policy must be granted in writing by the Dean or Dean's designee.

COMPLAINT PROCEDURE

A student who believes that a policy of the college has been violated may make a complaint following the procedures outlined in this section. When possible, a student should attempt to resolve the complaint informally, by bringing it to the attention of the individual(s) directly involved. However, when informal methods fail, the College will assist in the resolution of complaints through the formal procedures outlined on the following pages.

Types of Complaints: The college has established procedures for each of the following types of complaints. The procedures for each type of complaint are provided in this section.

~ Student Equal Opportunity Complaints

The college's policies on equal opportunity and sexual harassment are provided in the catalog and are administered by the college's Assistant Dean of Student Services, 2100 16th Avenue South, Great Falls, MT 59405. (Telephone: 771-4300). If a student believes that his/her right to equal opportunity has been violated, he/she should take the following steps:

1. Discuss the situation with the individual(s) immediately involved. If unable or unwilling to discuss the matter with this individual, discuss it with a counselor or the supervisory staff most closely associated with the individual directly involved (e.g., the teacher of the class if the individual is another student, or the department chair if the individual is a faculty member, etc.).
2. If an acceptable resolution cannot be reached informally, or if such a discussion is not possible, the student may take her/his complaint to the Assistant Dean of Student Services, who will briefly discuss the nature of the complaint with the student and direct the complaint to the appropriate official. Generally, the Assistant Dean of Student Services tries first to facilitate a resolution to the complaint through informal methods. However, this step may be bypassed at the discretion of the investigator or at the request of the complainant.
3. If all informal processes fail to produce a satisfactory resolution, the complainant may choose to submit a formal complaint. To expedite an accurate investigation and a fair resolution of the problem at this level, the complaint should be stated in writing and should be brought to the Assistant Dean of Student Services as quickly as possible. The written complaint should describe the specific act(s) alleged to be in violation of the College's EEO policies, the complainant's attempts, if any, to resolve the grievance informally, the names of all individuals involved in or witness to the alleged act(s), and the precise remedy sought by the student. Complainants may use their own format for written complaints, or they may obtain a Formal Complaint Form from the Assistant Dean of Student Services.
4. All communication with the Assistant Dean of Student Services will be held in confidence to the extent possible; however, the Assistant Dean of Student Services may, in certain cases, assign the investigation of the complaint to another appropriately qualified individual and provide that individual with access to all documents and witnesses, with the understanding that all communication with the investigator will be held in confidence. All reasonable attempts will be made to complete the investigation within 15 working days of the submission of the complaint. However, extensions of this time frame may be necessary in certain cases.

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5. Once an investigation has been authorized, the college is obligated to see it through to completion. Only the Dean of the College and the Assistant Dean of Student Services has the authority to halt an investigation. When the investigation has been completed, the Assistant Dean of Student Services will evaluate the evidence gathered and submit a Report of Findings to the Dean of the College within 10 working days of receipt of the Investigation Report, unless extenuating circumstances require an extension of that deadline.
6. Either party may appeal the Assistant Dean of Student Services findings from the investigation by submitting a written request for review to the Dean of the College. The request for review must be submitted within ten (10) working days after the student is notified of the findings of the Assistant Dean of Student Services. The Dean will receive and review all evidence and render a written decision with recommendations as to resolution within ten (10) working days of receipt of the request for review, unless extenuating circumstances require an extension of this time frame.
7. At any time prior to, during, or following the completion of the internal investigation process, complainants are entitled to contact and/or submit complaints to external civil rights organizations.
3. If a student requests assistance, the Assistant Dean of Student Services Department will assist with any remaining steps of the formal procedure that the student considers.
4. The student will send a copy of the grievance to the instructor/administrator, who will have ten (10) working days to respond after receipt of the grievance.
5. The Department Chair will receive and review all evidence, interview each party, if possible, and render a written decision to the student, instructor, and Assistant Dean of Student Services with recommendations as to resolution within ten (10) working days of receipt of the instructor's response. If the grievance is not concluded within this time, the student may carry it forward to the Associate Dean for Academic Affairs.
6. Associate Dean's Review. Either party may appeal the Department Head's/Director's decision in writing to the Associate Dean for Academic Affairs, with copies to the instructor, student, Department Head/Director, and the Assistant Dean of Student Services. Such appeal will be filed within five (5) working days of receipt of the Department Chair's determination. The Associate Dean will submit a written decision to the student, instructor, Department Chair, and the Assistant Dean of Student Services within ten (10) working days of receipt of the appeal. The decision of the Associate Dean may be appealed to the Dean/CEO of the college.

~ Academic Complaints

Students who disagree with an academic decision made by an instructor or administrator, including the assignment of grades or decisions about program or degree requirements or eligibility, may file an academic complaint. The academic complaint procedures are administered by the Associate Dean for Academic Affairs. These procedures are designed to be used when a specific action or decision of a college instructor or administrator had a specific adverse effect on the academic performance or academic record of a student or students. Complaints about the general quality of the performance of an instructor or other college employee are to be addressed through the personnel evaluation processes in place at the college. The academic action or decision, including the assignment of a grade, will be considered unfair if the decision is made:

- on some basis other than performance in the course and/or compliance with course/college requirements;
- by more exacting or demanding standards than were applied to other students in the same section or circumstances;
- by a substantial departure from the instructor's, department's, or college's announced standards as articulated in the course syllabus, catalog descriptions, policies, and/or other written materials.

A student who wishes to make an academic complaint must follow these steps and may request assistance through the Assistant Dean of Student Services:

1. Informal Meeting. The student should attempt to resolve the matter directly with the instructor or administrator through a personal conference as soon as possible after the academic decision is known.
2. Department Chair/Director Review. If the student and instructor/administrator cannot reach a mutually satisfactory resolution to the problem, the student may file a formal grievance. The grievance must be presented in writing to the instructor's/administrator's Department Chair within ten (10) working days after the student became aware of the academic action/decision. In the case of adjunct faculty, the Director of Instruction should be included. The student must describe the grievance by explaining the specific adverse effect of a specific act(s) or decision of the instructor/administrator, why the student believes the act/decision was unfair, the student's attempts to resolve the grievance informally, and the precise relief sought by the student. The student may attach copies of any relevant documents to the formal grievance.

~ Student Conduct Complaint Procedures

Below is an abbreviated version of MSU—Great Falls College of Technology's Student Conduct Complaint Procedures, including the Student Conduct Code and how to file a complaint. For a complete copy of the procedures, please see the office of the Assistant Dean of Student Services (771-5133) or the web page (www.msugf.edu).

I. Student Conduct Code

Montana State University—Great Falls College of Technology expects all students to conduct themselves as honest, responsible and law-abiding members of the academic community and to respect the rights of other students, members of the faculty and staff, and the public to use the college's facilities and participate in the college's programs. Student conduct that disrupts, invades, or violates the personal, educational, or property rights of others is prohibited and may be subject to disciplinary action, including dismissal and/or referral for prosecution.

II. Jurisdiction of Student Conduct Complaints

Conduct violations which occur on college property or at college-sponsored events are subject to the college's disciplinary jurisdiction. The college may also apply this code to student conduct, regardless of where it occurs, which adversely impacts or affects the overall mission, programs, and functions of the college or the health and safety of members of the college community.

Students who commit offenses against the laws of the city, state or United States are subject to prosecution by those authorities and may be subject to disciplinary action under this code if the offenses are also violations of this code. The college's disciplinary proceedings may precede, follow, or take place simultaneously with criminal proceedings and will not be subject to challenge on the ground that criminal charges involving the same incident have been dismissed or reduced.

The college's Student Conduct Review Board responds to cases involving alleged violations of the Student Conduct Code. The Board is a standing committee presided over by the Assistant Dean for Student Services. Its members are appointed annually by the Dean and include at least two professional staff, three faculty, two classified/support staff, and two students.

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III. Student Conduct Complaint Procedures

If informal attempts to resolve a student conduct complaint fail, any student, faculty, or staff member of the college may file a formal complaint through the Assistant Dean of Student Affairs. The formal complaint must be in writing and must contain at least the following information:

- the name and address (if known) of the student alleged to have violated the Student Conduct Code;
- the date(s) the incident(s) occurred;
- the location where the incident(s) occurred;
- a description of the incident which sets forth sufficient details to establish a possible violation of the Student Conduct Code.

The Assistant Dean of Student Services will complete an initial investigation to determine what, if any, sanctions are warranted. If all parties involved – the Assistant Dean of Student Affairs, the complainant and the student against whom the complaint has been filed – agree on an appropriate course of action, the process is complete. If any of the parties are not in agreement, the process moves into a hearing phase. A Hearing Committee is selected from the Student Conduct Review Board, and the Hearing Procedures delineated in the Student Conduct Complaint Procedures are followed. The decision made by the Hearing Committee may be appealed to the Dean of the College. A final appeal within the Montana University System may be made to the President of MSU—Bozeman.

EMERGENCY REPORTING

Do not hesitate to dial 911 in an emergency situation either from a campus phone or your cell phone. If you phone 911 from a campus phone, you will reach the police emergency dispatcher and the MSU-Great Falls Information Desk is immediately notified of the location of the call. Additional emergency phone numbers are posted in every classroom and meeting area along with emergency procedures for specific events. Concern for the safety of students and employees is of the utmost importance to the leadership of MSU-Great Falls.

EMERGENCY RESPONSE

An Emergency Response Manual giving directions for responding to various types of emergency is posted in every classroom. If you hear and/or see the emergency siren and flashing lights within the building, evacuate the building immediately. Evacuation maps are at the entrance of every classroom and meeting space. Evacuate through the nearest exit and move away from the building. Crisis Team members in bright orange vests will guide you and answer your questions at that point. In the rare event that an off-campus gathering point is required, cross 16th Ave. to the University of Great Falls McLaughlin Center (gym).

FAMILY EDUCATIONAL RIGHTS AND PRIVACY ACT

The Family Educational Rights and Privacy Act of 1974 grants certain rights, privileges, and protections related to students' educational records maintained by the college. Students' educational records (with the exception of directory information) will not be released to third parties outside of the college, except with the written consent of the student. Students have the right to inspect their own educational records, except for those to which students have expressly waived this right (e.g. Career Services placement). Students have the right to request amendment of their records. If they are found to be inaccurate, misleading or otherwise in violation of the student's privacy or other rights the student may request that their records be corrected. Such requests should be made as soon as the student becomes aware of the inaccuracy or any other problem.

Any student may file a complaint with the U.S. Department of Education concerning any alleged failure on the part of the College to comply with the requirements of the Family Educational Rights and Privacy Act.

Directory Information: The Family Educational Rights and Privacy Act permits the release of information designated as directory information to third parties outside the College without the written consent of the student. MSU – Great Falls College of Technology has designated the following items as Directory Information: student name, address, e-mail address, telephone number, major field of study, participation in officially recognized activities, dates of attendance, degrees and awards received, and most recent previous school attended. The College may disclose any of those items without prior written consent.

Currently registered students have the right to request that information designated as directory information be withheld from release by the College. Any student wishing to exercise this right must inform the Registrar in writing no later than the 10th class day of the academic term.

Any questions regarding educational records should be directed to the Registrar. A detailed guide of the Family Educational Rights and Privacy Act may be obtained from the Admissions and Records Office.

MINOR CHILDREN OF STUDENTS

Minor children of students may not be without adult supervision in any part of the building. The housing brochure has a listing of some of the local daycare facilities.

MyMSU Portal is the Internet portal for the four MSU campuses. The portal is a service to students and staff that provides a secure single login to various MSU systems and provides customizable access to information through roles and groups. Roles for MSU-Great Falls include students, faculty and staff. When you log into the MyMSU portal, you will gain centralized access to campus events & announcements, email, calendaring, course information, weather, news, important forms, and much more. The first time that you check your student email account and MyMSU Portal, you will need to log on through Banner Web – My Info . At MSU - Great Falls you will receive a student email account when you register for classes. If you are having problems, the HelpDesk can assist you.

It is recommended that you check your MyMSU Portal email twice weekly to avoid missing important email and announcements. The Portal email address is the College's official means of sending electronic messages to students. This may include information from instructors, college administration, the Financial Aid office and the Business Office. Financial Aid award letters will be sent electronically beginning fall semester 2007. The Business Office is planning to utilize the system for their official notifications within the next year as well. You may want to start or join a group that meets for an outdoor adventure every weekend. Groups are useful for interaction and information sharing for clubs and student projects. The MyMSU portal calendar may be used by students to track class and personal schedules. The MyMSU portal is just being developed.

PORTAL EMAIL AND ANNOUNCEMENTS

MyMSU Portal is the Internet portal for the four MSU campuses. The portal is a service to students and staff that provides a secure single login to various MSU systems and provides customizable access to information through roles and groups. Roles for MSU-Great Falls include students, faculty and staff. When you log into the MyMSU portal, you will gain centralized access to campus events & announcements, email, calendaring, course information, weather, news, important forms, and much more. The first time that you check your student email account and MyMSU Portal, you will need to log on through Banner Web – My Info . At MSU - Great Falls you will receive a student email account when you register for classes. If you are having problems, the HelpDesk can assist you.

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messages to students. This may include information from instructors, college administration, the Financial Aid office and the Business Office. Financial Aid award letters will be sent electronically beginning fall semester 2007. The Business Office is planning to utilize the system for their official notifications within the next year as well. You may want to start or join a group that meets for an outdoor adventure every weekend. Groups are useful for interaction and information sharing for clubs and student projects. The MyMSU portal calendar may be used by students to track class and personal schedules.

POSTED ANNOUNCEMENTS

A student bulletin board is located in the Student Commons. Students must take responsibility for the posting and removal of their announcements. All items must be dated on the front, or they will be removed. Date stamps are provided at the Information Desk in the front office.

PUBLICATION & DISTRIBUTION

All postings must be approved and stamped by the Information Desk Manager, under the supervision of the Executive Director of College Relations and Advancement. Bulletin board postings, index cards, posters and table tents are allowed after approval. Postings without official stamps, as well as material that remains posted beyond the removal date will be removed. When possible, the Information Desk will post printed materials in locations requested. Postings are allowed in pre-approved areas only. For questions, please contact the Information Desk. The Information Desk staff will post, remove and dispose of posters in a timely manner. Avoid taping to building surfaces including painted, brick or stone walls, glass or metal finishes.

SAFETY

Unsafe conditions on the campus should be reported immediately to faculty, staff, or the Information Desk. Because some instructional areas require safety clothing or equipment, students may not be allowed to work in these areas without proper clothing and/or equipment.

SMOKING

Montana State University-Great Falls campus is a smoke-free building. Smoking is not allowed anywhere in the building or within twenty-five (25) feet of the building. Smokers are asked to use receptacles on the South side of the building for disposal of cigarettes in lieu of disposing of them on the Campus grounds.

STUDENT RESPONSIBILITIES

Students attending Montana State University-Great Falls College of Technology have a responsibility to:

- Be informed regarding institutional policies and procedures that guide the educational experience;
- Attend classes regularly and be prepared to contribute productively to the learning environment in classroom activities;
- Treat other students, faculty members, and staff with courtesy and respect;
- Meet with their faculty advisors at least twice each semester to monitor progress and plan the program of study;
- Follow fair, appropriate, and noncollaborative procedures when evaluating courses;
- Maintain academic integrity with regard to proper acknowledgment of authorship of written documentation and other academic endeavors.

TELEPHONES

The college's telephones are used for business purposes. Students' personal calls should be made on the pay telephone provided in the Student Commons at the top of the ramp.

SERVICES

ASSOCIATED STUDENTS

The Associated Students of Montana State University – Great Falls College of Technology is an organization that acts on behalf of the MSU – Great Falls College of Technology student body by participating in a variety of campus planning activities. Some of the activities include: providing input to the college's administrative staff, the Montana Associated Students and to the Montana Board of Regents regarding issues and policies that impact students, planning student and campus activities, and prioritizing how student funds will be expended. Officers are elected at the end of each spring semester and hold office throughout the following year. Members of this organization also sit on various other College committees.

~ Student Emergency Assistance Program

The Student Emergency Assistance Program (SEAP) is sponsored by Associated Students and is dedicated to providing emergency assistance to students or to aid them in contacting other resources in the Great Falls area. SEAP is governed and regulated by ASMSGFCOT. All resources are obtained through donations. Students must go through an application process to receive assistance.

COTtage BOOKSTORE

The MSU – Great Falls COTtage Bookstore is located near the center of the campus. Books and merchandise for the MSU – Great Falls College of Technology, MSU – Northern and the MSU – Bozeman College of Nursing are available at the campus bookstore. Students can purchase or reserve textbooks and general merchandise through the COTtage Bookstore website or by selecting the "view textbooks" button located on the registration page in BannerWeb. The website is: www.thecottagebookstore.com, or students can take advantage of the "Pre-Package Service." Students can take their class schedule to the Bookstore prior to financial aid charging and, the Bookstore will pre-package the books so that they are ready for the first day of classes! Take advantage of this great service!

Intersession / Summer hours:

7:30 am – 5:00 pm Mon. - Fri.

Closed weekends

Spring / Fall Hours:

Monday - Thursday: 7:30 am - 8:00 pm

Friday: 7:30 am – 5:00 pm

Closed weekends

Contact information:

Steven Halsted, Bookstore Manager

shalsted@msugf.edu or bookstore@msugf.edu

Phone: 406-771-4367

CAREER SERVICES

Career Services are provided on campus to all enrolled students and alumni. Career counseling is available to help students explore their personality, interests, values, and skills. In addition, students may receive assistance in locating temporary, full-, and part-time work locally as well as throughout Montana and the United States. Job placement is a team effort involving program faculty, the Career Services office, and the student. Career Services is available in Student Services. Please call 406-771-4414 or 800-446-2698 to make an appointment.

DISABILITY SERVICES FOR STUDENTS

All students attending Montana State University – Great Falls College of Technology are entitled to equal access to academic programs, services, student activities, and campus events. Students with disabilities have a right to reasonable accommodations in order to fully participate in the student experience. Students with disabilities are encouraged to advocate for themselves to the extent possible. Disability Services provides support and assistance in determining what accommodations are best suited to each individual.

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MSU – Great Falls College of Technology uses the definition of disability set forth by Section 504 of the Rehabilitation Act of 1973, which states that a disabled person is anyone who:

- Has a physical or mental impairment which substantially limits one or more major life activities;
- Has a record of such an impairment;
- Is regarded as having such an impairment.

Students needing accommodations must apply for services through Disability Services, located in Student Services, and be determined eligible by meeting all of the following criteria:

- Have a permanent or long-term (≥ 6 mos.) medical or psychological condition which significantly impairs the student's ability to function in an academic setting;
- Provide Disability Services with current documentation of disability from a qualified professional; this documentation will be kept confidential in accordance with the Disability Services Confidentiality Policy;
- Be "otherwise qualified" for the chosen course of study and able to meet the behavioral standards set forth in the college's Student Conduct Code.

Unlike high school, educational accommodations at the postsecondary level are student initiated. Each student who chooses to seek accommodations must meet with the Disability Services Director to determine what accommodations to request based on the needs of the student and the demands of the course. The medical, psychiatric and/or psychological documentation provided by students is kept in separate and confidential files in Disability Services. A complete copy of the Eligibility Criteria and the Confidentiality Policy can be obtained from the director or found online. Depending on the student, available accommodations may include, but are not limited to:

- Extended test time
- Distraction-reduced testing environment
- Various other test accommodations
- Adaptive computer equipment and software
- Notetakers
- Tutors
- Interpreter services
- Extended deadlines
- Ergonomic equipment
- Preferential classroom seating
- Tape recording lectures
- Materials in alternate format

Students with disabilities are encouraged to contact Disability Services upon enrollment and should visit with the director each semester to determine accommodation needs for each class.

Building accessibility includes designated parking, curb cuts, automatic doors at the North, South and East entrances, ramp access to the second floor, accessible restrooms, Braille signage, and ramp access to theatre-style classrooms.

For more information, please contact Disability Services at 771-4311 (voice) or 771-4424 (TTY).

EDUCATIONAL OPPORTUNITY CENTER (EOC)

The Educational Opportunity Center is a federally funded TRIO program of MSU – Northern in coordination with the Montana State University-Great Falls College of Technology. The EOC provides the following services for both students and the community:

- Help to choose a career, program of study, or training program;
- Academic advising to prepare for college;
- Assistance in completing application and other forms to enter

college or training programs;

- Information on grants, student loans, scholarships and other types of financial aid;
- Referrals to support systems that can help students succeed.

The Educational Opportunity Center is located in Student Services. For more information, call the EOC Coordinator at 771-4326 or 1-800-446-2698, ext. 4326.

HEALTH INSURANCE AND HEALTH CARE

Although recommended, health insurance is not provided by Montana State University-Great Falls College of Technology. Brochures for outside agencies who provide this service are available in Student Services.

MSU-Great Falls students may utilize the University of Great Falls / MSU Bozeman College of Nursing Student Health Services located on the UGF campus. The health center offers limited primary care - diagnostic procedures and treatment of common illnesses; preventive health care; minor musculoskeletal injuries; and immunizations. Students may elect to pay a semester fee or a per visit fee.

HOUSING

The College is a commuter campus and does not have residential facilities. A brochure providing housing information for the Great Falls area is available at the Information Desk and in Student Services.

LIBRARY

The Montana State University-Great Falls Campus Library supports instruction and student learning by providing open access to information and knowledge. Access to library holdings is through a web-based catalog and the Library's web site. The library's collection supports all curricular areas; the collection includes books, videos, and periodicals as well as a rich array of electronic resources including full-text periodicals and newspapers, periodical indexes, reference materials, and the catalogs of other libraries. Electronic resources can be accessed 24/7 from off-campus. A knowledgeable staff is available to help patrons with information needs. Library services include reference, individual and group instruction, interlibrary loan, and reserves. The library provides computers for research and study space, including group study rooms. Also housed in the Library is the campus computer lab with 30 computers (20 wired and 10 wireless) and the software to support coursework. For more information, call the library at (406) 771-4398 or visit the library's web site at: <http://library.msugf.edu>.

LOST AND FOUND

Lost and Found items should be reported and taken to the Maintenance Department. The phone number is 771-4369.

MESSAGES

College personnel will not deliver messages to individual students except in the case of emergencies or calls from schools and/or day care providers.

PARKING

The college has north, east, and south parking lots for student use. It is requested that students not park in the designated visitor and handicapped parking area at the east and south side of the building. Students occupying handicapped parking should register their vehicle with Student Services as well as maintain a handicapped parking decal. The roadway around the facility is a fire lane, and no parking is allowed along the roadway.

SNACK BAR AND CAFETERIA

For the convenience of students, the college has a snack bar and cafeteria located in the student commons area.



ARTS & SCIENCES

..... Department



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Programs

Montana University System Core
Associate of Arts
Associate of Science

Arts and Sciences Advisors

Dan Adams
Frederick Bridger
Jana Carter
Colleen Hazen
Grayce Holzheimer
Rebecca Johnson
Jill Keil
Cherie Mckeever
Thomas Oakberg
Roger Pepper
Mark Plante
Larry Vaccaro
Dennis Veleber
Adam Wenz

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Montana State University - Great Falls College of Technology

MONTANA UNIVERSITY SYSTEM CORE

In our world of rapid economic, social, and technological change, students need a strong and broadly-based education. General education helps students achieve the intellectual integration and awareness they need to meet challenges in their personal, social, political, and professional lives. General education courses introduce great ideas and controversies in human thought and experience. A solid general education provides a strong foundation for the life-long learning that makes career goals attainable. The breadth, perspective, and rigor provided by the core curriculum helps students become educated people.

Montana State University-Great Falls College of Technology's General Education Core reflects the Montana University System's General Education Core. As students work on the Montana University System General Education Core, they should attempt to select classes that are also required in their major. That efficient use of coursework could help students complete their degree more quickly, since the classes could be used to satisfy both the requirements of the major and the requirements of the MUS General Education Core. After completion of core requirements students will be able to:

- demonstrate understanding of major findings and ideas in a variety of disciplines;
- demonstrate understanding of methods, skills, tools and systems used in a variety of disciplines, and historical, theoretical, scientific, technological, philosophical, and ethical bases in a variety of disciplines;
- use appropriate technologies to conduct research on and communicate about topics and questions; to access, evaluate and manage information; to prepare and present their work effectively, and to meet academic, personal, and professional needs;
- demonstrate critical analysis of arguments and evaluation of an argument's major assertions, its background assumptions, the evidence used to support its assertions, and its explanatory utility;
- understand and articulate the importance and influence of diversity within and among cultures and societies;
- understand and apply mathematical concepts and models, and
- communicate effectively, through written and oral communication and through other forms as appropriate.

STUDENT LEARNING OUTCOMES FOR MSU-GREAT FALLS COLLEGE OF TECHNOLOGY CORE:

Communication

(English Composition and Oral Communication):

- Demonstrate an understanding of writing as a series of tasks, including finding, evaluating, analyzing, and synthesizing appropriate sources, and as a process that involves composing, editing, and revising.
- Demonstrate critical reading and analytical skills, including understanding an argument's major assertions and assumptions and how to evaluate its supporting evidence.
- Demonstrate research skills, integrate one's own ideas with those of others, and apply the conventions of attribution and citation correctly.
- Use Standard Written English and edit and revise one's own writing for appropriateness.
- Enhance the fluency and range of vocabulary and syntax with which to meet the requirements of different rhetorical situations.
- Develop proficiency in oral discourse.
- Produce and deliver a clear, well organized verbal presentation.
- Interact in a collaborative, synergistic manner within a small-group problem-solving meeting.

- Use appropriate technologies to conduct research on and communicate about emerging issues and to access, evaluate, and manage information to prepare and present one's work effectively.
- Demonstrate understanding of the interconnections of knowledge within and across disciplines.

Mathematics:

- Interpret mathematical modes given verbally, or by formulas, graphs, tables, or schematics, and draw inferences from them.
- Represent mathematical concepts verbally, and where appropriate, symbolically, visually, and numerically.
- Use arithmetic, algebraic, geometric, technological, or statistical methods to solve problems.
- Use mathematical reasoning with appropriate technology to solve problems, test conjectures, judge the validity of arguments, formulate valid arguments, check answers to determining reasonableness, and communicate the reasoning of the results.
- Recognize and use connections within mathematics and between mathematics and other disciplines.

Humanities/Fine Arts:

- Investigate the role and values of art in human life and demonstrate an understanding of the significance of specific art forms to the cultures that create and adopt them.
- Describe specific processes by which works of painting, sculpture, architecture, music, dance, theater, film, multi media, or environmental art are created.
- Demonstrate the dependence of meaning upon cultural and historical context when analyzing works of art.
- Compare and contrast one work of art with another or one medium with another to illuminate both.
- Investigate the variety of human culture and demonstrate an understanding of the ways in which cultures have changed.
- Understand and employ a wide range of humanistic, qualitative, quantitative, theoretical, or philosophical methods for recording and explaining human experience.
- Identify and assess one's own and others' values; identify the underlying premises in one's own and others' arguments.
- Investigate the role and value of literature in human life and demonstrate an understanding of the significance of specific literary works or genres to the cultures that create them and adopt them.

Natural Science:

- Use quantitative information and/or mathematical analysis to obtain sound results and recognize questionable assumptions.
- Demonstrate understanding of the broad principles of science and the ways scientists in a particular discipline conduct research.
- Make observations, understand the fundamental elements of experimental design, generate and analyze data using appropriate quantitative tools, use abstract reasoning to interpret the data and formulae, and test hypotheses with scientific rigor.
- Understand the role that human diversity plays in the practice and history of science.
- Demonstrate proficiency in the collection, interpretation, and presentation of scientific data.

Social Sciences/History:

- Demonstrate knowledge of findings and theories in the social and behavioral sciences.
- Demonstrate an understanding of investigative methods used in the

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social and behavioral sciences.

- Demonstrate critical thinking about arguments in the social and behavioral sciences and evaluate an argument's major assertions, its background assumptions, the evidence used to support its assertions, and its explanatory utility. Demonstrate knowledge of important findings and theories in social and political history.
- Demonstrate an understanding of investigative methods used in social and political history.

Diversity:

- Investigate major issues and scholarly approaches related to diversity.
- Analyze concepts and implications of diversity.
- Demonstrate an understanding of historical, cultural, social, or political conditions and the ways in which they influence the status, treatment, or accomplishments of various groups.
- Articulate how diversity helps shape the role of the individual and the interconnections and relationships within and among groups across societies and cultures

Cultural Heritage of American Indians:

Courses include significant content related to the cultural heritage of American Indians.

MONTANA UNIVERSITY SYSTEM CORE COURSES

A grade of "C-" or above in each course is required to satisfy core requirements.

COMMUNICATION--6 CREDITS

(Need 3 writing & 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I	3
		AND 1 of the following	
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS--3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3
MATH	181**	Calculus I	4
MATH	216**	Basic Statistics	4

HUMANITIES/FINE ARTS--6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE--7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES / HISTORY --6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY--3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS--3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

TOTAL CREDITS – 31

~Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

As students work on the MUS general education core, they should attempt to elect classes that are required in their major. That efficient use of coursework could help students complete their degree more quickly, since the classes could be used to satisfy both the requirements of the major and the requirements of the MUS General Education Core.

Students should consult with the intended receiving institution to determine whether or not additional core courses may be required to satisfy that institution's General Education Core.

Upon completion of the General Education Core, please notify the Registrar's office to have the core indicated on your transcript.

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ASSOCIATE OF ARTS DEGREE

The Associate of Arts (AA) focuses on education across academic disciplines. Focusing on integration of information while increasing a student's employability, the AA focuses on transferability to a baccalaureate program.

To receive the AA degree, the following requirements must be completed: Montana University System Core Requirements (31 semester hours);

- Computer Skills/Usage requirement (3 semester hours);
- 26 credits of Electives; and
- A grade of "C-" or better in all courses applied to the degree and a final cumulative grade point average of at least 2.0.

Courses taken to fulfill one specific requirement, including courses in the elective block, may not be used to fulfill another specific requirement; thus, a course taken to fulfill the Diversity requirement in the Montana University System Core may not be used as an Elective.

Outcomes: Graduates are prepared to:

- Demonstrate the outcomes achievable by completing the Montana University System Core;
- Select and use the appropriate technologies for personal, academic or career tasks;

THINK CRITICALLY IN EVALUATING INFORMATION, SOLVING PROBLEMS AND DECISION-MAKING.

I. MONTANA UNIVERSITY SYSTEM CORE - 31 CREDITS

COMMUNICATION--6 CREDITS

(Need 3 writing & 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I	3
AND 1 of the following			
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS--3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3
MATH	181**	Calculus I	4
MATH	216**	Basic Statistics	4

HUMANITIES/FINE ARTS--6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE--7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/ HISTORY--6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY--3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS--3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. COMPUTER SKILLS/USAGE - 3 CREDITS

Course	No.	Title	Credits
CIT	110	Introduction to Computers	3
CIT	111	Intro to Computers for Tech Majors	3

*or any CIT 3 credit hour course that has CIT 110 as a prerequisite

III. ELECTIVES - 26 CREDITS

Students may choose from any of the following discipline areas to complete the required 26 credits of electives. (No more than 5 credits of courses numbered 116 may be applied toward the elective requirements.)

(ART) Art, (ANTH) Anthropology, (BIO) Biology, (BUS) Business, (CHM) Chemistry, (COLS) College Studies, (CIT) Computer Information Technology, (COMM) Communication, (CAE) Creative Arts Entrepreneurship, (ECON) Economics, (ENGL) English (above ENGL 121), (EDUC) Education, (GEOL) Geology, (HIST) History, (HHD) Health & Human Development, (HUM) Humanities, (DE) Interior Design, (ML) Modern Language, (MATH) Mathematics (above 121), (MUS) Music, (NAS) Native American Studies, (PHIL) Philosophy, (PHYS) Physical Science, (POLS) Political Science, (PSY) Psychology, (SOC) Sociology

TOTAL PROGRAM CREDITS - 60

~Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule

Montana State University - Great Falls College of Technology

ASSOCIATE OF SCIENCE DEGREE

The Associate of Science (AS) Degree focuses on education in specific knowledge areas, most typically in natural sciences. While often transferable, completion of the AS provides employability through transferable, immediately marketable knowledge and skills. The AS degree certifies completion of a student's study in scientific disciplines.

To receive the AS degree, the following requirements must be completed:

- Montana University System Core Requirements (31 semester hours);
- Computer Skills/Usage requirement (3 semester hours);
- 26 credits of Electives; and
- A grade of "C-" or better in all courses applied to the degree and a final cumulative grade point average of at least 2.0.

Courses taken to fulfill one specific requirement, including courses in the elective block, may not be used to fulfill another specific requirement; thus, a course taken to fulfill the Natural Science requirement in the Montana University System Core may not be used as an Elective.

Outcomes: Graduates are prepared to:

- Demonstrate the outcomes achievable by completing the Montana University System Core;
- Select and use the appropriate technologies for personal, academic or career tasks;
- Think critically in evaluating information, solving problems and decision-making;
- Consider the application of natural science theories in today's world.

I. MONTANA UNIVERSITY SYSTEM CORE - 31 SEMESTER HOURS

COMMUNICATION--6 CREDITS

(Need 3 writing & 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I AND 1 of the following	3
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS--3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3
MATH	181**	Calculus I	4
MATH	216**	Basic Statistics	4

HUMANITIES/FINE ARTS--6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE--7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/ HISTORY --6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY--3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Language	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS--3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. COMPUTER SKILLS/USAGE - 3 CREDITS

Course	No.	Title	Credits
CIT	110	Introduction to Computers	3
CIT	111	Intro to Computers for Tech Majors	3

*or any CIT 3 credit hour course that has CIT 110 as a prerequisite

III. ELECTIVES - 26 CREDITS

Students may choose from any of the following discipline areas to complete the required 26 credits of electives (No more than 5 credits of courses numbered 116 may be applied toward the elective requirements.)

<i>ANTH</i>	<i>Anthropology</i>
<i>BIO</i>	<i>Biology</i>
<i>BST</i>	<i>Bioscience Technology</i>
<i>CHM</i>	<i>Chemistry</i>
<i>GEOL</i>	<i>Geology</i>
<i>HUM</i>	<i>Humanities</i>
<i>MATH**</i>	<i>Mathematics (Math 121 or above)</i>
<i>PHIL</i>	<i>Philosophy</i>
<i>PHYS</i>	<i>Physical Science</i>

TOTAL PROGRAM CREDITS - 60

~Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



BUSINESS & TECHNOLOGY

..... Department



..... ● **Associate of Applied Science**

- Accounting
- Aviation
- Business Management/Entrepreneurship
- Design Drafting Technology
- Interior Design
- Medical Transcription
- Microcomputer Support
- Network Support
- Office Technology
- Web Development

..... ● **Certificate of Applied Science**

- Accounting Assistant
- Auto Body Repair & Refinishing
- Fundamentals of Business
- Computer Assistant
- Creative Arts Enterprise
- Fundamentals of Business
- Legal Information
- Medical Transcription
- Network Technology
- Office Support
- Welding

Montana State University - Great Falls College of Technology

ACCOUNTING

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: JON NITSCHKE

Upon completion of the Accounting Degree program students will be prepared for employment in general accounting occupations. They will be prepared to work in public, private or governmental agencies as accounting clerks, accounting technicians, bookkeepers, accounting support personnel or payroll assistants.

Outcomes: Graduates are prepared to:

- Prepare financial records for a business.
- Prepare and interpret financial statements of a business while applying generally accepted accounting principles.
- Understand internal controls necessary in business organizations.
- Perform accounting functions for sole proprietorships, partnerships and corporations.
- Use computerized accounting software.
- Communicate professionally, both orally and in writing.
- Compute payrolls and prepare basic federal and state payroll tax forms and returns.
- Prepare basic income tax returns for individuals and businesses using commercial tax preparation software.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Books/Supplies	<u>1850</u>
TOTAL	\$7844

REQUIRED SKILLS

Note: Complete early in the program

OO	107	Keyboarding Basics or Challenge exam
OO	173	Computer Calculators or challenge exam

FALL SEMESTER

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3†
COMM	135	Interpersonal Communication	3†
CIT	110	Introduction to Computers	3†
ENGL	121**	Composition I	3†
MATH	104**	Business Math	<u>4†</u>
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
ACCT	102*	Accounting Procedures II	3†
ACCT	190*	Payroll Accounting	3†
BUS	106	Introduction to Business	3†
CIT	120*	Internet Essentials	2†
MATH	108**	Algebra for College Students OR	
MATH	130**	Precalculus Algebra	<u>4†</u>
		Subtotal	15

FALL SEMESTER

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3†
ACCT	224*	Computerized Accounting	3†
BUS	255*	Legal Environment	3†
CIT	220*	Electronic Spreadsheets	3†
ENGL	124**	Business & Profession Comm OR	
ENGL	228*	Strategies of Business Comm	<u>3†</u>
		Subtotal	15

SPRING SEMESTER

Course	No.	Title	Credits
ACCT	222*	Managerial Accounting	3†
ACCT	231*	Income Tax Fundamentals	3†
CIT	205*	Database Management	3†
OO	266*	Microsoft Word	3†
OO	220	Preparing Resumes OR	
OO	221	Interviewing for Jobs	1†
		Electives (see below)	<u>3†</u>
		Subtotal	16

SUGGESTED ELECTIVES

Course	No.	Title	Credits
BUS	145	Fundamentals of Investing	1
BUS	249	Global Marketing	3
BUS	230*	Management	3
CIT	140*	Presentation Fundamentals	1
CIT	229*	Web Page Construction	3
CIT	231*	Web Page Design	3
CIT	250*	Web Page Programming	3
CIT	280*	Desktop Publishing	3
MATH	216**	Basic Statistics	4
MATH	217**	Intermediate Statistics	3

TOTAL PROGRAM CREDITS – 62 ~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

ACCOUNTING ASSISTANT

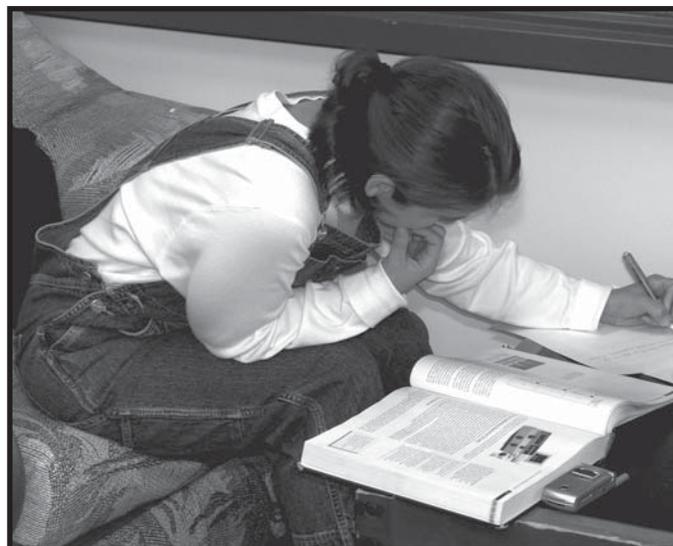
CERTIFICATE OF APPLIED SCIENCE

All credits earned in completion of the certificate may be applied toward the Associate of Applied Science degree in Accounting.

Upon completion of the Accounting Assistant program students will be prepared for entry-level employment in accounts receivable, accounts payable, payroll, and general accounting.

Outcomes: Graduates are prepared to:

- Process daily accounting transactions, journals, and ledgers and handle other entry-level accounting functions.
- Prepare basic financial statements.
- Prepare payrolls for a business.
- Manage cash and accrual accounting procedures.
- Use business computer application software.
- Students will be able to communicate professionally, both in person and in writing.
- Students will be able to solve basic business problems.



Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Books/Supplies	<u>1000</u>
TOTAL	\$5503

FALL SEMESTER

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3†
CIT	110	Introduction to Computers	3†
ENGL	121**	Composition I	3†
MATH	104**	Business Mathematics	<u>4†</u>
		Subtotal	13

SPRING SEMESTER

Course	No.	Title	Credits
ACCT	102*	Accounting Procedures II	3†
ACCT	190*	Payroll Accounting	3†
COMM	135	Interpersonal Communication	3†
OO	173*	Computer Calculators	1†
OO	266*	Microsoft Word	<u>3†</u>
		Subtotal	13

SUMMER SEMESTER

Course	No.	Title	Credits
CIT	220*	Electronic Spreadsheets	3†
		Elective	<u>3†</u>
		Subtotal	6

SUGGESTED ELECTIVES

Course	No.	Title	Credits
AH	185	Basic Medical Terminology	3
CIT	205*	Database Management I	3
OO	107	Keyboarding Basics	3
OO	179	Records Management	3

TOTAL PROGRAM CREDITS – 32 ~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

AUTO BODY REPAIR AND REFINISHING

CERTIFICATE

ADVISOR: CONTACT BUSINESS & TECHNOLOGY DEPARTMENT

NOTE: This program is under review. Please contact Business & Technology Department at 406.771-4391 for more information.

Auto Body Repair and Refinishing offers both variety and challenge. Each damaged vehicle presents a different problem. Repairers must develop appropriate methods for each job using their broad knowledge of automotive construction and repair techniques.

Auto Body students are required to provide their own hand tools, safety glasses and protective clothing. A complete list of the required tools and equipment is available from Auto Body instructors.

The Auto Body and Repair and Refinishing program offers training to students who seek marketable skills in auto body repair, painting, welding, and auto body shop management. Electives are combined with regular course work enabling students to develop business skills.

Outcomes: Graduates are prepared to:

- Apply industry safety standards and use the appropriate personal safety equipment.
- Demonstrate straightening techniques in the repair of sheet metal, soft rubber, fiberglass, and aluminum body panels.
- Master removal of damaged parts and the reassembly of new parts within factory tolerances.
- Employ welding techniques used in structural, cosmetic, and plastic welding for the repairs on uni-body.
- Demonstrate basic knowledge of color formulation and color matching.
- Prepare, mask, and apply various top coats used in complete overall application.
- Gain computer skills to estimate collision damage, retrieve paint formulas, material safety data, and paint mixing ratios.

The Auto Body program receives input from industry experts when developing, modifying or changing courses in the program.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Books/Supplies	650
Tools	1600
Clothing	104
Lab/Material Fees	<u>280</u>
	\$8628

GENERAL EDUCATION REQUIREMENTS

Course	No.	Title	Credits
COMM	135	Interpersonal Communication	3
ENGL	---**	ENGL 118 or higher	3
MATH	---**	MATH 085 or higher	3

FALL SEMESTER

Course	No.	Title	Credits
TB	112	Auto & Paint Shop Safety	1†
TB	130	Basic Auto Construction	2†
TB	134	Correcting Sheet Metal	3†
TB	141	Surface Prep and Undercoats	3†
TB	142	Top Coat Application	<u>3†</u>
		Subtotal	12

SPRING SEMESTER

Course	No.	Title	Credits
TB	136*	Correcting Collision Damage	5†
TB	150*	Paint Removal	3†
TB	153*	Overall Refinishing	3†
TB	154*	Paint Problems	<u>1†</u>
		Subtotal	12

FALL SEMESTER

Course	No.	Title	Credits
TB	220*	Fiberglass & Plastic Repair	3†
TB	243*	Panel Replacement	3†
TB	248*	Spot Repair and Blending	3†
TB	249*	Paint Formulation and Tinting	<u>3†</u>
		Subtotal	12

SPRING SEMESTER

Course	No.	Title	Credits
TB	245*	Production Body Repair	3‡
TB	246*	Total Body Rebuilding & Sectioning	3‡
TB	250*	Production Refinishing	3‡
TB	254*	Specialty Finishes	1‡
TB	255*	Estimating Collision Damage	3‡
		Subtotal	13

SUGGESTED ELECTIVES

Course	No.	3† Title	Credits
BUS	106	Introduction to Business	3
CIT	110	Introduction to Computers	3

TOTAL PROGRAM CREDITS - 59~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

AVIATION

ASSOCIATE OF APPLIED SCIENCE

ADVISOR: RYAN HASKINS

NOTE: PROGRAM OFFERED ONLY AT THE COLLEGE OF TECHNOLOGY IN BOZEMAN

Students completing the AAS in Aviation will have all credentials required to pursue a career as a professional pilot. The program offers in-depth training in all stages of pilot certification: Private Pilot, Instrument Rating, and Commercial Pilot. The program also offers classroom training in Aircraft Systems, Advanced Navigation Systems, Aviation Safety, Flight Instructor/ Aircraft Theory, and Aviation Regulations and Professional Conduct.

Outcomes: Graduates are prepared to:

- Earn a Private Pilot Certificate:
 - Students will complete the Private Pilot FAA knowledge exam
 - Students will complete the Private Pilot FAA practical test
- Demonstrate proficiency in both oral and written communication.
- Demonstrate proficiency in math computation, and will also be proficient in general science.
- Apply all aspects of aviation safety.
- In addition to the competencies gained by obtaining a Private Pilot Certificate, graduate will earn the FAA instrument Rating preparing them in the following
 - Students will complete the FAA Instrument knowledge exam
 - Students will complete the FAA instrument practical test
- In addition to the competencies gained by obtaining a Private Pilot certificate and FAA instrument certificate, graduates will earn a Commercial Pilot Certificate preparing them in the following:
 - Students will complete the FAA Commercial knowledge exam
 - Students will complete the FAA Commercial Pilot practical test
- In addition to the competencies gained by obtaining a Private Pilot certificate, FAA Instrument certificate, FAA Commercial Certificate, graduates will earn a Certified Flight Instructor certificate preparing them in the following:
 - Students will complete the FAA Fundamentals of Instruction knowledge exam.
 - Students will complete the FAA Certified Flight Instructor knowledge exam.
 - Students will complete the FAA Certified Flight Instructor practical test.

Job opportunities range from high-profile occupations as pilots for national carriers to less well-known, but in-demand work as pilots for cargo services, air taxis, media aircraft, corporate jets, or spacecraft. Students who combine the AAS with a Bachelor's degree in a related field will be especially competitive in the entry level job market.

This program articulates with a Bachelor of Science degree in Aviation at Rocky Mountain College in Billings, MT. For details contact Ryan Haskins, Program Director for Aviation Technology, 406-994-6151, rhaskins@msugf.edu, or Dan Hargrove, Director of Aviation at Rocky Mountain College, 406-657-1060, aviation@rocky.edu

Completion of the AAS in Aviation requires that students contract with a flight school recommended by the Aviation MSUGF Advisory Council to complete the flight training leading to their Private pilot, Commercial pilot, and Instrument licenses. Upon submission of these certificates the student will receive credit for the following courses.

AST 142-Private Pilot (50 flight hours)	2 credits
AST 242-Commercial/Instrument I (75 flight hours)	2 credits
AST 252-Commercial/Instrument II (125 flight hours)	2 credits

Students may enter the program having already completed flight training. If they have not completed flight training, the sequencing of courses in this outline is highly recommended.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Flight School	36574
Books/Supplies	1500
	\$44068

FALL SEMESTER

Course	No.	Title	Credits
AST	141	Aviation Fundamentals	3†
AST	142	Private Pilot Flight(50 flight hrs)	2†
AST	143	Basic Air Navigation	3†
CIT	110	Intro to Computers	3†
MATH	150**	Math for Liberal Arts OR any math course in the MUS General Ed Core	3†
		Subtotal	14

SPRING SEMESTER

Course	No.	Title	Credits
AST	171*	Aircraft Systems	3†
AST	241*	Advanced Navigation Systems	3†
AST	242	Commercial/Instrument Flight I (75 Flight Hours)	2†
AST	243*	Instrument/Commercial Theory I	3†
AST	250*	Aviation Operations	3†
CIT	120*	Internet Essentials	2†
		Subtotal	16

FALL SEMESTER

Course	No.	Title	Credits
AST	245*	Instrument/Commercial Theory II	3†
AST	252*	Commercial/Instrument Flight II (125 flight hours)	2†
AST	261	Aviation Safety	3†
COMM	135	Interpersonal Communication	3†
PHYS	130	Fundamentals of Physical Science	4†
		Subtotal	15

SPRING SEMESTER

Course	No.	Title	Credits
AST	260*	Flight Instructor Theory	3†
AST	262*	Advanced Aircraft Theory	3†
AST	263*	Aviation Regulations and Professional Conduct	3†
AST	281*	Certified Flight Instructor	1†
PHYS	110	Survey of Natural Science	4†
ENGL	121**	Composition I	3†
		Subtotal	17

TOTAL PROGRAM CREDITS - 62~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

BUSINESS MANAGEMENT / ENTREPRENEURSHIP

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISORS: **MARILYN BESICH**
TERI DWYER

The Business Management/ Entrepreneurship program of study is designed to prepare students for employment in management positions in small business enterprises or to create and operate their own small business enterprises.

Outcomes: Graduates are prepared to:

- Utilize mathematical concepts and theories to analyze the viability of a business and to use those concepts and theories in the decision making process.
- Develop an understanding of societies and cultures and use that understanding to implement business practices reflecting the diversity of customers and employers.
- Incorporate social science theories and constructs from the fields of psychology and sociology into the application of management theories.
- Analyze the legal requirements and ethical implications of business decisions and how such decisions affect the business, community and society.
- Utilize computer hardware and software to effectively manage information.
- Analyze the feasibility of a business opportunity through development of a business plan.
- Utilize oral, written and listening skills to demonstrate an understanding of business practices and theories and effectively interact with others.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Books/Supplies	1700
	<u>\$7694</u>

REQUIRED SKILLS

OO 107 Keyboarding Basics or Challenge exam

SEMESTER

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3†
BUS	106	Introduction to Business	3†
COMM	135	Interpersonal Communication	3†
CIT	110	Introduction to Computers	3†
ENGL	121**	Composition I	3†
		Subtotal	15

SPRING SEMESTER

Course	No.	Title	Credits
ACCT	102*	Accounting Procedures II	3†
ACCT	190*	Payroll Accounting	3†
BUS	230*	Management	3†
BUS	235*	Marketing	3†
CIT	120*	Internet Essentials	2†
MATH	104**	Business Math	4†
		Subtotal	18

FALL SEMESTER

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3†
BUS	255*	Legal Environment	3†
CIT	220*	Electronic Spreadsheets	3†
MATH	108**	Algebra for College Students OR	
MATH	130**	Precalculus Algebra	4†
		Electives	3†
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
ACCT	222*	Managerial Accounting	3†
BUS	240*	Advertising	3†
BUS	260*	Entrepreneurship	3†
ENGL	228*	Strategies of Bus Comm	3†
OO	220	Preparing Resumes OR	
OO	221	Interviewing for Jobs	1†
		Electives	3
		Subtotal	16

TOTAL PROGRAM CREDITS – 65

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

SUGGESTED ELECTIVES – 6 CREDITS REQUIRED

Course	No.	Title	Credits
ACCT	224*	Computerized Accounting	3
BUS	145	Fundamentals of Investing	1
BUS	249	Global Marketing	3
CIT	140*	Presentation Fundamentals	1
CIT	205*	Database Management I	3
CIT	229*	Web Page Construction	3
CIT	231*	Web Page Design	3
CIT	250*	Web Page Programming	3
CIT	280*	Desktop Publishing	3

Other electives may be selected with advisor's prior approval.

Students who complete this AAS degree and take Math 108 Algebra for College Students (instead of Math 130 Precalculus Algebra) and one additional math course, Math 216 Basic Statistics, will be able to transfer this degree as the first two years of Bachelor of Science degrees in Management, Health Care Management, or Human Resource Management through Park University.

THE INFORMATION ON ALL TRANSFER PROGRAMS IS SUBJECT TO CHANGE. STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU



Montana State University - Great Falls College of Technology

FUNDAMENTALS OF BUSINESS

CERTIFICATE OF APPLIED SCIENCE



ADVISOR: MARILYN BESICH
TERI DWYER

The Fundamentals of Business program is designed for persons seeking employment in entry-level business positions assisting small business enterprises.

Outcomes: Graduates are prepared to:

- Maintain accounting records;
- Meet the public;
- Manage office functions;
- Market the business.

The Fundamentals of Business program also offers individuals needing technical business assistance courses to upgrade knowledge and skills.

Estimated Program Cost:

Tuition and Fees	\$2982
Application Fee	30
Books/Supplies	<u>1000</u>
	\$4012



FIRST SEMESTER

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3†
BUS	106	Introduction to Business	3†
COMM	135	Interpersonal Communication	3†
CIT	110	Introduction to Computers	3†
ENGL	121**	Composition I	3†
MATH	104**	Business Mathematics	4†
		Subtotal	19



SECOND SEMESTER

Course	No.	Title	Credits
ACCT	102*	Accounting Procedures II	3†
BUS	230*	Management	3†
BUS	235*	Marketing	3†
OO	107	Keyboarding Basics	3†
OO	173*	Computer Calculators	1†
		Subtotal	13

TOTAL PROGRAM CREDITS – 32~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

COMPUTER INFORMATION TECHNOLOGY MICROCOMPUTER SUPPORT

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: JEFF BROWN

Upon completion of the Microcomputer Support Degree, students will be able to maintain personal computers, repair and troubleshoot common hardware problems, and use and assist end-users in using common software applications.

Outcomes: Graduates are prepared to:

- Create, manage, and modify databases as preparation for the examination to attain the Microsoft Office Specialist – Access certification.
- Create, manage, and modify electronic spreadsheets as preparation for the examination to attain the Microsoft Office Specialist – Excel certification.
- Create, manage, and modify word processing documents as preparation for the examination to attain the Microsoft Office Specialist – Word certification.
- Create, modify, and troubleshoot computer programs using Visual Basic to develop computer programming skills.
- Create effective web pages that include links, graphics, sound, tables, forms, and style sheets using common editors.
- Implement, administer, and troubleshoot computer systems that incorporate Microsoft Windows XP Professional as preparation for the examination to attain the Microsoft Certified Systems Engineer 70-270 certification.
- Troubleshoot and repair microcomputers as preparation for the examination to attain the CompTIA A+ certification.
- Train and support microcomputer end-users to include developing and delivering training modules and developing strategies for providing on-going technical support.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Lab Fees	240
Books/Supplies	<u>1650</u>
	\$7844

REQUIRED SKILL:

OO 107 Keyboarding Basics or Challenge exam

FALL SEMESTER

Course	No.	Title	Credits
BUS	106	Introduction to Business	3†
CIT	111	Intro to Comp for Tech Majors	3†
CIT	120	Internet Essentials	2†
ENGL	121**	Composition I	3†
MATH	104**	Business Mathematics	4†
		Subtotal	15

SPRING SEMESTER

Course	No.	Title	Credits
CIT	205*	Database Management	3†
COMM	135	Interpersonal Communication	3†
ENGL	122*	Composition II OR	
ENGL	124**	Business & Prof Comm OR	
ENGL	228*	Strategies of Business Comm	3†
OO	266*	Microsoft Word	3†
MATH	108**	Algebra for College Students OR	
MATH	130**	Precalculus Algebra OR	
MATH	150**	Math for Liberal Arts OR	
MATH	181**	Calculus	<u>3/4†</u>
		Subtotal	15/16

FALL SEMESTER

Course	No.	Title	Credits
CIT	160*	Introduction to Programming	3†
CIT	166*	Computer Operating Systems	4†
CIT	220*	Electronic Spreadsheets	3†
CIT	229*	Web Page Construction	3†
		Technical Electives	<u>3†</u>
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
CIT	272*	PC Troubleshooting and Maint	4†
CIT	275*	Computer End-User Support	3†
		Technical Electives	<u>7†</u>
		Subtotal	14

TECHNICAL ELECTIVES

Course	No.	Title	Credits
CIT		Any CIT course with Advisor approval	
DRFT	156	Introduction to CAD	3†
OO	220	Preparing Resumes	1†
OO	221	Interviewing for Jobs	1†

TOTAL PROGRAM CREDITS – 60~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Students who complete this AAS degree and take either Math 108 Algebra for College Students or Math 181 Calculus for their math requirement and confine their elective choices to those with the prefix CIT will be able to transfer this degree as the first two years of a Bachelor of Science degree in Management/Computer Info Systems through Park University.

THE INFORMATION ON ALL TRANSFER PROGRAMS IS SUBJECT TO CHANGE. STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU



Montana State University - Great Falls College of Technology

COMPUTER INFORMATION TECHNOLOGY NETWORK SUPPORT

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: BRUCE GOTTWIG

The Computer Technology Program prepares individuals to assume a role in computer support with skills and responsibilities in user support, hardware and software troubleshooting, and basic system maintenance.

The Network Support Degree prepares students for a career in supporting Local Area Networks (LAN) and Wide Area Networks (WAN) with a focus on the skills required to understand and manage the operation of a small and large computer network.

Upon completion of the Network Support Degree, students will be able to successfully design, implement, manage, and maintain effective network infrastructures for both home and corporate clients as an entry level network technician / system administrator.

Outcomes: Graduates are prepared to:

- Utilize TCP/IP applications to prove their understanding of networking protocols used to control modern networking infrastructures.
- Master the concepts of the theoretical OSI networking model.
- Create, maintain, and troubleshoot both wired and wireless network infrastructures and infrastructure devices.
- Employ and master the skills needed to create and maintain server based networks using both Microsoft Windows and Open source Linux server systems.
- Develop and implement a logical troubleshooting and maintenance system for Personal Computing systems.
- Prepare for networking support industry standard certifications such as: CCNA, CCNP, MCSA or MCSE, and CompTIA Network+.

Estimated Program Cost:

Tuition and Fees	\$7455
Application Fee	30
Lab Fees	150
Books/Supplies	<u>1650</u>

SUMMER SEMESTER

Course	No.	Title	Credits
CIT	111	Intro to Comp for Tech Majors	3†
CIT	125	Fund of Voice and Data Cabling	3†
CIT	166*	Computer Operating Systems	4†
		Subtotal	10

~ CIT 111 may be taken Fall semester year one.

CIT 125 and 166 can be taken either semester year one.

FALL SEMESTER

Course	No.	Title	Credits
CIT	126*	Networking Fundamentals	3†
CIT	176*	Routers and Routing Basics	3†
CIT	210*	Network Operating Systems I	2†
CIT	211*	Network Operating Systems II	2†
CIT	272*	PC Troubleshooting & Main	4†
		Subtotal	14

SPRING SEMESTER

Course	No.	Title	Credits
CIT	120*	Internet Essentials	2†
CIT	212*	Network Operating Systems III	2†
CIT	213*	Network Operating Systems IV	2†
CIT	226*	Switching Basics & Inter Routing	3†
CIT	276*	Intro to WAN Technologies	3†
CIT	283*	Fund of Wireless LAN	3†
		Subtotal	15

FALL SEMESTER

Course	No.	Title	Credits
CIT	215*	Network Operating Systems V	2†
CIT	216*	Network Operating Systems VI	2†
CIT	278*	Advanced Routing	4†
CIT	279*	Remote Access	4†
MATH	108**	Algebra for College Students OR	
MATH	130**	Precalculus Algebra OR	
MATH	150**	Math for Liberal Arts OR	
MATH	181**	Calculus	3/4†
		Subtotal	15-16

SPRING SEMESTER

Course	No.	Title	Credits
CIT	275*	Computer End-User Support	3†
CIT	281*	Multilayer Switching	4†
CIT	282*	Network Troubleshooting	4†
CIT	287*	IP Telephony	3†
ENGL	121**	Composition I	3†
		Subtotal	17

TOTAL PROGRAM CREDITS – 71/72~

~Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

TECHNICAL ELECTIVES

Course	No.	Title	Credits
CIT	215*	Network Operating Systems V	2†
CIT	216*	Network Operating Systems VI	2†
CIT	206*	Database Management II	3†
CIT	208*	Fundamentals of UNIX/LINUX	4†
CIT	255*	Fund of Network Security I	3†
CIT	256*	Fund of Network Security II	3†
CIT	283*	Fundamentals of Wireless LAN	3†
CIT	287*	IP Telephony	3†
CIT	295*	Current Topics in Network Operating Systems	VAR†

Montana State University - Great Falls College of Technology

NETWORK TECHNOLOGY

CERTIFICATE

ADVISOR: BRUCE GOTTWIG

NOTE: This program is under review. Please contact program advisor, Bruce Gottwig, at 406.268.3719 or bgottwig@msugf.edu, for more information.

Outcomes: Graduates are prepared to:

- For operation of networking hardware and software;
- In the basic knowledge of designing networks;
- For certification as a CCNA (Cisco Certified Networking Associate);
- For certification as a MSCE (Microsoft Certified System Engineer);
- To develop essential business and computer skills.

PREREQUISITE COURSES

Course	No.	Title	Credits
CIT	111	Intro to Comp for Tech Majors	3†
CIT	125	Fund of Voice and Data Cabling	3†
CIT	166*	Computer Operating Systems	4†
		Subtotal	10

REQUIRED COURSES

Course	No.	Title	Credits
CIT	126*	Networking Basics	3†
CIT	176*	Router and Routing Basics	3†
CIT	210*	Network Operating Systems I	2†
CIT	211*	Network Operating Systems II	2†
CIT	212*	Network Operating Systems III	2†
CIT	213*	Network Operating Systems IV	2†
CIT	226*	Switching Basics & Inter Routing	3†
CIT	272*	PC Troubleshooting & Maint	4†
CIT	276*	Intro to WAN Technologies	3†
		Subtotal	24

TOTAL PROGRAM CREDITS – 34~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

COMPUTER INFORMATION TECHNOLOGY WEB DEVELOPMENT

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: TIM PAUL

The Computer Technology Program prepares individuals to assume a role in computer support with skills and responsibilities in user support, hardware and software troubleshooting, and basic system maintenance.

Outcomes: Graduates are prepared to:

- Write, control and troubleshoot HTML, XHTML and CSS in order to create effective and current Web pages using applications such as NotePad, ImageReady and Dreamweaver.
- Investigate and implement current languages and utilities to assess their effectiveness in the development of Web pages and sites.
- Employ and master graphical editing and animation techniques in such applications as PhotoShop and FireWorks.
- Seek out, contact and interview prospective clients in order to develop Web sites for others.
- Research and study effective Web sites in order to discover techniques and style that may act as models for their own work.
- Students will collaborate in Web development groups in various roles, such as Web Designer, Web Developer and Web Master.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Lab Fees	150
Books/Supplies	<u>1650</u>
	\$7794

REQUIRED SKILL:

OO 107 Keyboarding Basics or Challenge exam

FALL SEMESTER

Course	No.	Title	Credits
BUS	106	Introduction to Business	3†
COMM	135	Interpersonal Communication	3†
CIT	111	Intro to Comp for Tech Majors	3†
ENGL	121**	Composition I	3†
MATH	104**	Business Mathematics	4†
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
CIT	120	Internet Essentials	2†
CIT	205*	Database Management	3†
CIT	272*	PC Troubleshooting & Main	4†
MATH	108**	Algebra for College Students	3†
		Subtotal	16

FALL SEMESTER

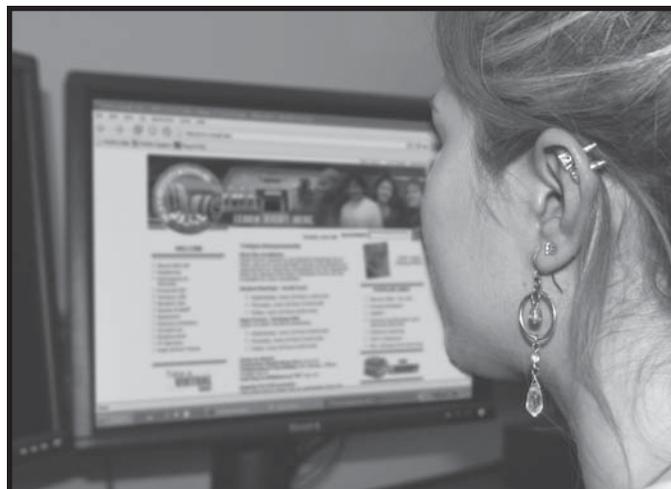
Course	No.	Title	Credits
CIT	126*	Networking Basics	3†
CIT	160*	Introduction to Programming	3†
CIT	166*	Computer Operating Systems	4†
CIT	229*	Web Page Construction	3†
CIT	231*	Web Page Design	3†
ENGL	122*	Composition II	3†
		Subtotal	19

SPRING SEMESTER

Course	No.	Title	Credits
CIT	206*	Database Management II	3†
CIT	217*	Computer Graphic Design	4†
CIT	250*	Web Page Programming	3†
CIT	275*	Computer End-User Support	3†
CIT	280*	Desktop Publishing	3†
		Subtotal	16

TOTAL PROGRAM CREDITS – 63~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

COMPUTER ASSISTANT

CERTIFICATE OF APPLIED SCIENCE

ADVISOR: JEFF BROWN

The Computer Assistant program prepares individuals for operation of software programs and a basic knowledge of managing data and files. Coursework is designed to provide a solid foundation for microcomputer operation and develop essential business and computer skills. The course of study will prepare students to:

Outcomes: Graduates are prepared to:

- Create, manage, and modify databases and attain the Microsoft Office Specialist – Access certification
- Create, manage, and modify electronic spreadsheets and attain the Microsoft Office Specialist – Excel certification
- Create, manage, and modify word processing documents and attain the Microsoft Office Specialist – Word certification
- Create effective web pages that include links, graphics, sound, tables, forms, and style sheets using common editors
- Troubleshoot and repair microcomputers and attain the CompTIA A+ certification

FIRST SEMESTER

Course	No.	Title	Credits
CIT	110	Introduction to Computers	OR
CIT	111	Intro to Comp for Tech Majors	3†
CIT	120	Internet Essentials	2†
COMM	135	Interpersonal Communication	3†
ENGL	121**	Composition I	3†
MATH	108**	Algebra for College Students	4†
		Subtotal	15

SECOND SEMESTER

Course	No.	Title	Credits
CIT	205*	Database Management	3†
CIT	272*	PC Troubleshooting & Main	4†
CIT	220*	Electronic Spreadsheets	3†
CIT	229*	Web Page Construction	3†
OO	266*	Microsoft Word	3†
		Subtotal	16

TOTAL PROGRAM CREDITS – 31~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

CREATIVE ARTS ENTERPRISE

CERTIFICATE OF APPLIED SCIENCE

NOTE: This program is under review. Please contact the Business and Technology department, at 406.771.4391 for more information.

Creative Arts Enterprise, built upon the TRACE pilot project, is a Montana State University - Great Falls certificate program designed to help artisans develop a broader knowledge of business, while enhancing their skills in their craft. This innovative workforce development program is designed to launch Montana's promising artisans in sustainable arts careers without having to leave the state. It targets students wanting a flexible, short-term educational experience that nurtures the discipline of their art while providing them with the entrepreneurial skills and knowledge necessary to succeed in creative enterprise.

In keeping with Montana's pioneer "can do" heritage, Creative Arts Enterprise is based on the idea that sustainable economic solutions for the state will develop through nurturing and developing its creative and entrepreneurial spirit. The program provides opportunities both to the first-time college student and the adult returning to the classroom to develop additional skills or a new career. In short, the program opens the doors for students to become part of the "rise of the creative class." Participation in the program helps students to establish themselves in a sustainable career doing what they love and developing their skills through practice and peer input.

Outcomes: Graduates are prepared to:

- Develop a business plan for the creative arts business that they plan to launch.
- Utilize the budgetary and financial tools necessary for building their creative arts enterprise.
- Develop a marketing plan for their creative arts business.
- Create promotional aids for marketing their work.
- Package, price, and promote their artistic work.
- Use new technology to promote their work and reach new markets.
- Understand the cultural and physical forces that give form to and inspire their craft.
- Communicate in oral and written mode the "story" behind their craft.
- Develop a product line that reflects a heightened degree of professionalism in their craft.
- Build a professional network in their creative field.

Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Books/Supplies	<u>1500</u>
	\$6003

FOUNDATION CORE (13 CREDITS):

Through the foundation core, students in the Creative Arts Enterprise program develop basic skills necessary for success - the ability to express their ideas and describe their art in writing, handle their business through business-related math skills, communicate effectively in both interpersonal and formal settings, and learn how to use the World Wide Web in their business.

Required courses:

CAE	140	Communication for Marketing	3
CAE	101	Introduction to Artrepreneurship	3
ENGL	124**	Business and Professional Comm OR	
ENGL	228*	Stategies of Business Communication	3
MATH	104**	Business Math	4

APPLIED ART STRAND (8 CREDITS):

The Applied Art strand helps students become more disciplined in their art, developing their ability to create and execute increasingly sophisticated pieces in their chosen craft. Students will work in their own studios, in addition to working with mentors in their field. They will learn about preparing work for show, sale or shipment, all in preparation for moving into national venues. The focus will be on becoming "show ready."

Required courses:

CAE	110	Making It I - Studio Experience	3
CAE	120	Making It II - Studio Experience	3
CAE	201	Capstone Project	2

ENTREPRENEURSHIP STRAND (7 CREDITS):

In this sequence of courses, students learn how to develop and sustain a successful creative enterprise. Product development, pricing, promoting, and reaching customers are covered. In addition students build a business plan for a creative enterprise and learn how to use technology in the "art of sales."

Required courses:

CAE	235	Arts Marketing	3
CAE	250	Creative Entrepreneurship	2
CAE	112	Creative Technology	2

HERITAGE STRAND (3 CREDITS):

This strand will provide students with an appreciation of the culture, history, and the resources of Montana, providing them with a source both for inspiration in their art and a basis for branding their creations in a larger market.

Required courses:

HUM	246	Montana Ways	3
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POTENTIAL SCHEDULE

FALL SEMESTER

Course	No.	Title	Credits
CAE	101	Introduction to Artrepreneurship	3
CAE	110	Making It I Studio Experience	3
HUM	246	Montana Ways	3
MATH	104**	Business Math	4
		Subtotal	13

SPRING SEMESTER

Course	No.	Title	Credits
CAE	112	Creative Technology	2
CAE	120	Making It II Studio Experience	3
CAE	235	Arts Marketing	3
CAE	140	Communication for Marketing	3
		Subtotal	11

SUMMER SEMESTER

Course	No.	Title	Credits
CAE	201	Capstone Project	2
CAE	250	Creative Entrepreneurship	2
ENGL	124**	Business and Professional Comm OR	
ENGL	228*	Strategies of Business Comm	3
		Subtotal	7

TOTAL PROGRAM CREDITS - 31~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

DESIGN DRAFTING TECHNOLOGY

ASSOCIATE OF APPLIED SCIENCE

ADVISOR: KIRK MATTINGLY

In the Design Drafting Technology program students acquire the skills necessary for entry-level drafting jobs in the design/ drafting industry.

Outcomes: Graduates are prepared to:

- Create detail and assembly drawings to ANSI standards on the drawing board.
- Create detail and assembly drawings to ANSI standards using the latest versions; of AutoCAD and Mechanical Desktop.
- Create two-dimensional layouts from three-dimensional solid models using AutoCAD and Mechanical Desktop.
- Create a complete set of residential plans using AutoCAD.
- Create a site plan including topography using Land Development Desktop.
- Create thematic maps from GIS data.
- Solve graphical problems using the principles of descriptive geometry.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Books/Supplies	<u>1400</u>
	\$7394

REQUIRED COURSES:

FALL SEMESTER

Course	No.	Title	Credits
CET	173	Arch Construction & Materials	3
COMM	135	Interpersonal Communication	3
CIT	110	Intro to Computers	3
DRFT	131	Technical Graphics I	4
MATH	130**	Precalculus Algebra	<u>4</u>
		Subtotal	17

SPRING SEMESTER

Course	No.	Title	Credits
DRFT	132*	Descriptive Geometry	3
DRFT	156	Introduction to CAD	3
DRFT	242	Blueprint Reading & Materials	3
EET	110	Electronics Survey	3
MATH	131**	Precalculus Trigonometry	<u>3</u>
		Subtotal	15

FALL SEMESTER

Course	No.	Title	Credits
DRFT	201*	Residential Drafting	3
DRFT	256*	3D CAD	3
ENGL	121**	Composition I	3
MFGT	205	Manufacturing Processes	3
PHYS	130	Fund of Physical Science	<u>4</u>
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
CIT	205*	Database Management I	3
DRFT	205*	Machine Drafting	3
DRFT	244*	Topographical Mapping & GIS Applications	3
DRFT	246	Managing the Construction Proc	3
DRFT	---	Drafting Electives	<u>3</u>
		Total	15

TOTAL PROGRAM CREDITS – 63~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

INTERIOR DESIGN

ASSOCIATE OF APPLIED SCIENCE

ADVISOR: JULIE MYERS

This program is offered both at MSU - Great Falls and the College of Technology in Bozeman

The Interior Design program has been developed to prepare students with a wide variety of skills and competencies for entry into various areas of the design field, ranging from residential to commercial design. MSU- Great Falls is a National Kitchen and Bath Association (NKBA) Endorsed School. The College of Technology in Bozeman follows the same curricula as Great Falls, but is not a NKBA endorsed program. Students in the Great Falls program may choose to complete 70 additional internship hours to earn a certification in the National Kitchen and Bath Association.

Outcomes: Graduates are prepared to:

- Understand of the theory and history of design and apply design principles and elements to their projects.
- Communicate in the language of interior design using listening, verbal, and written skills to interact with clients.
- Communicate graphically according to current architectural and NKBA standards using both hand-drafting and AutoCAD techniques.
- Demonstrate research abilities and critical thinking in space planning, selection of finish materials and application of codes for residential and commercial projects.
- Increase their body of knowledge in a wide variety of areas including construction and finish materials, color and lighting technologies, NKBA guidelines, residential and commercial codes, sustainability and professional practice.
- Employ creative skills to create presentations of their projects using hand- and AutoCAD drafting and rendering and professional sample boards and finish schedules.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Lab Fee	10
Books/Supplies	<u>1400</u>
	\$7414

REQUIRED SKILLS

OO 107 Keyboarding Basics or Challenge exam

FALL SEMESTER

Course	No.	Title	Credits
DE	161	Introduction to Design	3†
DE	162	Interior Design Graphics	3†
DE	164	Historic Interiors	3†
DE	166	Textiles & Interior Finishes	3†
CET	173	Architectural Construction and Materials	3†
CIT	110	Introduction to Computers	3
		Subtotal	18

SPRING SEMESTER

Course	No.	Title	Credits
DE	163*	Presentation Drawing	3†
DE	165*	Contemporary Interiors	3†
DE	168*	Space Planning	3†
DE	264*	Light, Color, Lighting Systems	3†
DRFT	156	Introduction to CAD	3†
ENGL	121**	English Composition I	3
		Subtotal	18

FALL SEMESTER

Course	No.	Title	Credits
COMM	135	Interpersonal Communication	3
DE	261*	Field Study	3†
DE	262*	Studio I	4†
DE	267*	Architectural CAD	3†
DE	270*	Kitchen and Bath I	3†
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
DE	263*	Studio II	4†
DE	265*	Professional Practices	3†
MATH	104**	Business Mathematics	4
		Electives	6
		Subtotal	17

TOTAL PROGRAM CREDITS - 69~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

SUGGESTED ELECTIVES (6 CREDITS REQUIRED)

Course	No.	Title	Credits
DE	271*	Kitchen and Bath II	3
ACCT	101*	Accounting Procedures 1	3
ART	101	Intro to Visual Arts	3
ART	140	Drawing I	3
BUS	106	Introduction to Business	3
BUS	220*	Sales	3
ENGL	124*	Business & Professional Comm	3
CIT	280	Desktop Publishing	3
DRFT	200*	Architectural Desktop	3
DRFT	256*	3-D CAD	3
PSY	101	General Psychology	3
SOC	111	Introduction to Sociology	3



Montana State University - Great Falls College of Technology

MEDICAL TRANSCRIPTION

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: DEBORAH NEWTON

This program is offered completely on-line.

Medical Transcriptionists are part of the healthcare team, working primarily with medical documents and reports. Upon completion of the program, students have the skills and knowledge necessary to perform as entry-level transcriptionists.

Outcomes: Graduates are prepared to:

- communicate effectively in both oral and written communication;
- use the appropriate software and hardware for applications in the medical office;
- manage the information needed for successful operation of the business;
- apply interpersonal relations concepts and techniques to personal and professional situations;
- understand and apply mathematical concepts and models;
- solve business problems by applying business principles, communication standards, and health management skills.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Lab Fees	90
Books/Supplies	<u>1550</u>
	\$7634

A grade of "C" or above must be achieved on all courses to advance in the program.

REQUIRED SKILL:

OO 107 Keyboarding Basics or Challenge exam
Health Science Orientation - online completion required

FALL SEMESTER

Course	No.	Title	Credits
AH	185	Basic Medical Terminology	3
CIT	110	Introduction to Computers	3
ENGL	121**	Composition I	3
MATH	103**	Introduction to Algebra OR	
MATH	104**	Business Mathematics	4
		Subtotal	13

SPRING SEMESTER

Course	No.	Title	Credits
AH	194	Basic Pharmaceuticals	1
BIO	127	Anatomy & Physiology I for non-clinical majors	4
ENGL	124**	Business & Prof Comm	3
HI	156*	Legal & Regulatory Aspects of Healthcare	3
PSY	101	General Psychology OR	
SOC	111	Intro to Sociology	3
		Subtotal	14

FALL SEMESTER

Course	No.	Title	Credits
BIO	128*	Anatomy & Physiology II for non-clinical majors	4
HI	132*	Health Data Content and Structure	3
OO	111*	Fund of Health Insurance	4
OO	255*	Medical Transcription I	3
OO	266*	Microsoft Word	3
		Subtotal	17

SPRING SEMESTER

Course	No.	Title	Credits
AH	115	Health Care Personnel and Supervision	2
AH	201*	Medical Science	3
CIT	120	Internet Essentials	2
OO	220	Preparing Resumes OR	
OO	221	Interviewing for Jobs	1
OO	256*	Medical Transcription II	3
		Electives	5
		Subtotal	16

TOTAL PROGRAM CREDITS - 60~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

SUGGESTED ELECTIVES

Course	No.	Title	Credits
AH	125	Fund of Forensic Science	2
BUS	299	Transcription Internship	VAR
HI	237*	CPT Coding	3
PHIL	238	Medical Ethics	3



Montana State University - Great Falls College of Technology

MEDICAL TRANSCRIPTION

CERTIFICATE OF APPLIED SCIENCE DEGREE

ADVISOR: DEBORAH NEWTON

This program is offered completely on-line.

Medical Transcriptionists are part of the healthcare team, working primarily with medical documents and reports. Upon completion of the program, students have the skills and knowledge necessary to perform as entry-level transcriptionists.

Outcomes: Graduates are prepared to:

- communicate effectively in both oral and written communication;
- use the appropriate software and hardware for applications in the medical office;
- manage the information needed for successful operation of the business;
- apply interpersonal relations concepts and techniques to personal and professional situations;
- understand and apply mathematical concepts and models;
- solve business problems by applying business principles, communication standards, and health management skills.

A grade of "C" or above must be achieved in all courses to advance in the program.

Estimated Program Cost:

Tuition and Fees	\$2982
Application Fee	30
Books/Supplies	<u>1100</u>
	\$4112

REQUIRED SKILL:

OO 107 Keyboarding Basics or Challenge exam
Health Science Orientation - online completion required

Transition to the Associate's Degree:

The Medical Transcription certificate program is designed to train entry-level Medical Transcriptionists. The curriculum can be completed online so that students across the state can take advantage of this opportunity. However, the Medical Transcription profession is complex, and students should recognize the need for continuing education, even as they begin their careers. The two-year associate degree in Medical Transcription provides that opportunity.

All courses from the certificate program transfer into the two-year program. Students who continue into the two-year associate degree program in Medical Transcription must take an additional semester of Anatomy and Physiology to increase their understanding of human body structures and functions. In addition, students in the two-year program have the opportunity to increase computer skills, understand the entire medical record, and expand English skills - all essential to their continued success as Medical Transcriptionists. Students should discuss their long-term goals with the Program Director to determine the best course of study. The AAS degree can also be completed online.

FALL SEMESTER

Course	No.	Title	Credits
AH	185	Basic Medical Terminology	3
BIO	127	Anatomy and Physiology for non-clinical majors	4
CIT	110	Introduction to Computers	3
MATH	103**	Introduction to Algebra OR	
MATH	104**	Business Mathematics	4
PSY	101	General Psychology	3
		Subtotal	17

SPRING SEMESTER

Course	No.	Title	Credits
AH	201*	Medical Science	3
ENGL	121**	English Composition	3
HI	156*	Legal & Reg Aspects of HC	3
OO	255*	Med Transcription I	3
OO	266*	Microsoft Word	3
		Subtotal	15

SUMMER SEMESTER

Course	No.	Title	Credits
OO	256*	Med Transcription II	3

TOTAL CREDITS – 35~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

SUGGESTED ELECTIVES

Course	No.	Title	Credits
BUS	299	Transcription Internship	VAR
HI	132*	Health Data Content and Structure	3
OO	265*	WordPerfect	3
PHIL	238	Medical Ethics	3



Montana State University - Great Falls College of Technology

OFFICE TECHNOLOGY

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISORS: DONNA EAKMAN
DEBORAH NEWTON

The Office Administration and Technology program is designed to prepare students with the technical skills and knowledge necessary for careers in a variety of business and office settings. The program emphasizes in-depth training in a wide variety of office skills, including computer technology, oral and written communication skills, transcription, records management, keyboarding and document formatting. Students may choose to specialize in executive, legal, or medical specialty areas.

Outcomes: Graduates are prepared to:

- communicate effectively in both oral and written communication;
- use the appropriate software and hardware for applications in the business office;
- manage the information needed for successful operation of the business;
- apply interpersonal relations concepts and techniques to personal and professional situations;
- understand and apply mathematical concepts and models;
- solve business problems by applying business principles, communication standards, and office management skills.

Estimated Program Cost:

Tuition and Fees	\$7455
Application Fee	30
Books/Supplies	<u>1550</u>
	\$9035

REQUIRED COURSES:

OO 107 Keyboarding Basics or Challenge Exam

FALL SEMESTER

Course	No.	Title	Credits
CIT	110	Introduction to Computers	3†
ENGL	121**	Composition I	3†
MATH	104**	Business Mathematics	4†
OO	179	Records Management	3†

Executive or Legal Specialty:

OO 180 Legal Studies I 3†

OR

Medical Specialty:

AH 185 Basic Medical Terminology 3†
Subtotal 16

SPRING SEMESTER

Course	No.	Title	Credits
BUS	106	Intro to Business	3†
OO	108*	Advanced Keyboarding	3†
OO	260*	Machine Transcription	3†
OO	266*	Microsoft Word	3†

Executive Specialty:

CIT 205* Database Management I 3†

OR

Legal Specialty:

OO 181* Legal Studies II 4†

OR

Medical Specialty:

BIO 127 Anatomy & Physiology I for non-clinical majors 4†

Subtotal

15-16

SUMMER SEMESTER

Course	No.	Title	Credits
<i>Medical Specialty:</i>			
OO	111*	Fund of Health Insurance	4†

FALL SEMESTER

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3†
CIT	120*	Internet Essentials	2†
CIT	140*	Presentation Fundamentals	1†
COMM	135	Interpersonal Communication	3†
ENGL	124**	Business & Professional Comm	3†

Executive or Legal Specialty:

BUS 255* Legal Environment 3†

OR

Medical Specialty:

HI 237* CPT Coding 3
Subtotal 15

SPRING SEMESTER

Course	No.	Title	Credits
CIT	220*	Electronic Spreadsheets	3†
OO	173*	Computer Calculators	1†
OO	220	Resumes	1†
OO	221	Interviewing for Jobs	1†
OO	295*	Admin Office Procedures	3†

Executive Specialty:

OO 265* WordPerfect 3†
CIT 280* Desktop Publishing 3†

OR

Legal Specialty:

OO 265* WordPerfect 3†
OO 287* Legal Transcription 4†

OR

Medical Specialty:

AH 201* Medical Science 3†
OO 255* Med Transcription I 3†
Subtotal 15-16

TOTAL CREDITS:

EXECUTIVE SPECIALTY - 61~

LEGAL SPECIALTY - 61~

MEDICAL SPECIALTY - 66~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

OFFICE SUPPORT

CERTIFICATE OF APPLIED SCIENCE

**ADVISOR: DONNA EAKMAN
DEBORAH NEWTON**

The one-year certificate program in Office Support prepares students for entry level positions in a variety of office setting. The program emphasizes skills in oral and written communications, word processing, ten-key, records management, keyboarding and document formatting. Students may emphasize areas in general office skills, the legal office, or the medical office by selecting appropriate elective courses. All courses transfer into the AAS degree in Office Administration and Technology.

Outcomes: Graduates are prepared to:

- communicate effectively in both oral and written communication;
- use the appropriate software and hardware for applications in the business office;
- manage the information needed for successful operation of the business;
- apply interpersonal relations concepts and techniques to personal and professional situations;
- understand and apply mathematical concepts and models;
- solve business problems by applying business principles, communication standards, and office management skills.

Estimated Program Cost:

Tuition and Fees	\$2982
Application Fee	30
Books/Supplies	<u>900</u>
	\$3912

REQUIRED SKILLS

OO 107 Keyboarding Basics or Challenge exam

FALL SEMESTER

Course	No.	Title	Credits
CIT	110	Introduction to Computers	3†
ENGL	124**	Business & Professional Comm	3†
MATH	104**	Business Math	4†
OO	108*	Advanced Keyboarding	3†
OO	179	Records Management	3†
		Elective	<u>3†</u>
		Subtotal	19

SPRING SEMESTER

Course	No.	Title	Credits
COMM	135	Interpersonal Communication	3†
OO	173*	Computer Calculators	1†
OO	220	Resumes	1†
OO	221	Interviewing for Jobs	1†
OO	265*	WordPerfect OR	
OO	266*	Microsoft Word	3†
OO	295*	Admin Office Procedures	3†
		Elective	<u>3†</u>
		Subtotal	12

ELECTIVES –

Select two from the following (consult advisor)

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3†
AH	185	Basic Medical Terminology	3†
OO	111*	Fund of Health Insurance	4†
OO	180	Legal Studies	3†
OO	260*	Machine Transcription	3†

TOTAL PROGRAM CREDITS – 34-35~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

WELDING TECHNOLOGY

CERTIFICATE OF APPLIED SCIENCE

TOTAL PROGRAM CREDITS – 30~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

NOTE: This program is offered ONLY at the College of Technology in Bozeman.

Upon completion of this program, students are AWS qualified welders in one or more welding processes and are eligible to apply to be listed in the AWS National Registry of Welders.

Outcomes: Graduates are prepared to:

- Make satisfactory welds in all positions using the following welding types:
 - Shielded Metal Arc Welding (SMAC)
 - Gas Metal Arc Welding (GMAW)
 - Flux Cored Arc Welding (FCAW)
 - Gas Tungsten Arc Welding (GTAW)
- Make satisfactory cuts with the following processes:
 - Oxygen Fuel Cutting (OFC)
 - Plasma Arc Cutting (PAC)
 - Air Carbon Arc Cutting (ACC)
- Interpret welding blueprints and welding symbols.
- Perform pipe layouts.
- Utilize basic welding metallurgy

Estimated Program Cost:

Tuition and Fees	\$2982
Application Fee	30
Tools/clothing	varies
Lab Fees	200
Books/Supplies	<u>600</u>
	\$3812

FALL SEMESTER

Course	No.	Title	Credits
CNST	109	Blueprint Reading	2
ENGL	118**	Intro to Critical Reading and Writing	4
MATH	100**	Math for the Trades	3
WELD	101	Welding Theory I	1
WELD	102	Welding Practical I	3
WELD	110	Applied Metallurgy	2
		Subtotal	15

SPRING SEMESTER

Course	No.	Title	Credits
COMM	135	Interpersonal Communication	3
WELD	103*	Welding Theory II	1
WELD	104*	Welding Practical II	3
WELD	117*	Fabrication Basics	3
WELD	119*	Intro to Structural Welding	3
WELD	126*	Welding Qualification Prep	2
		Subtotal	15





HEALTH SCIENCES

..... Department



.....
Associate of Applied Science

- Dental Hygiene
- EMT Paramedic
- Fire & Rescue Technology
- Health Information Technology
- Medical Assistant
- Physical Therapist Assistant
- Radiologic Technology
- Respiratory Care

Certificate of Applied Science

- Dental Assistant
- EMT Paramedic
- Health Information Coding Specialist
- Medical Billing Specialist
- Practical Nurse
- Surgical Technology

Montana State University - Great Falls College of Technology

DENTAL ASSISTANT

CERTIFICATE OF APPLIED SCIENCE

ADVISOR: CARMEN PERRY
ROBIN WILLIAMS

Dental Assistants are important members of the dental health care team and primarily help to increase the efficiency and productivity of the dental practice by assisting the dentist in delivering patient care. Other employment opportunities and/or responsibilities include dental health education, performing expanded duty dental care on patients, business practice, or working with dental insurance or dental supply companies. Because dentists employ two or three dental assistants, employment opportunities are excellent.

The Dental Assistant program will:

1. Maintain an instructional curriculum that meets the accreditation standards of the American Dental Association Commission on Dental Accreditation.
2. Deliver relevant learning experiences and curriculum sequencing to assure graduates achieve adequate knowledge and skill to enable them to be employed in the field as Certified Dental Assistants.

Outcomes: Graduates are prepared to:

- Sit for the national certification examination administered by the Dental Assisting National Board.
- Enter a dental practice setting and display professionalism and confidentiality (including adherence to HIPAA standards).
- Perform entry level skill and competence in assigned chairside dental assistant duties and responsibilities (including expanded duty functions as defined by the Montana Board of Dentistry).
- Perform entry level expanded duty function as defined by the Montana Board of Dentistry including oral radiography.
- Utilize dental-specific in the operations of the dental practice
- Articulate dental language appropriately in business, clinical and educational situations.
- Apply OSHA infection control standards during all aspects of dental care and practice.

The MSU – Great Falls Dental Assistant program is a one-year (11 month) limited enrollment certificate program and accepts up to 18 students each year. Interested students must complete an application to the program (separate from the institution application) for acceptance. These students must have already successfully (C- or better) completed Math 085, Pre-algebra, and English 118, Intro to Critical reading/writing (or their equivalent) OR are currently at the competency level for the program-required math and English courses. Students are advised to contact Student Services or a program advisor for further program information specific to admission requirements.

Following acceptance to the program, students complete three semesters concluding with a summer semester when the students are enrolled in clinical practice. All sequential Dental Assistant program course work must be completed with a "C-" or better to continue in and/or graduate from the program. All required Dental Assistant program coursework must be successfully (C- or better) completed prior to enrollment in DA 190 – Clinical Practice and Seminar, with the exception of Interpersonal Communications or General Psychology. Students will be required to purchase uniform attire and provide own transportation (and lodging, if applicable) to and from clinical site assignments.

Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Uniforms	200
Lab Fees	270
Books/Supplies	1000
	\$5973

The Dental Assistant program sequence is as follows: (The student, however, may complete any or all of the general education coursework (non-DA) prior to entry to the Dental Assistant program, ie: Math 103 or higher, Engl 119 or higher, and/or COMM 135 or PSY 101)

FALL SEMESTER

Course	No.	Title	Credits
DA	115	Head, Neck & Oral Anatomy	4
DA	118	Dental Office Management	2
DA	120	Oral Radiology/Radiography I	3
DA	123	Chairside Theory and Practice I	4
ENGL	119**	Intro to College Writing or higher	3-4
		Subtotal	16-17

SPRING SEMESTER

Course	No.	Title	Credits
DA	121*	Oral Radiology/Radiography II	2
DA	124*	Chairside Theory and Practice II	4
DA	150*	Dental Sciences/Preventive Dentistry	4
DA	165*	Dental Specialties	3
MATH	---**	MATH 103 or higher	3-4
		Subtotal	16-17

SUMMER TERM

Course	No.	Title	Credits
COMM	135	Interpersonal Communication OR	
PSY	101	General Psychology	3
DA	190*	Clinical Practice and Seminar	7
		Subtotal	10

TOTAL PROGRAM CREDITS – 42-44~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

DENTAL HYGIENE

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISORS: **KIM WOLOSZYN**
GAIL STAPLES
DR. BONNIE LEDERMAN

The Dental Hygienist is a licensed professional member of the healthcare team who integrates the roles of educator, consumer advocate, practitioner, manager and researcher to support total health through the promotion of oral health and wellness. The focus of dental hygiene is on preventing and treating oral disease.

Upon receipt of the Associate of Applied Science Degree, successful completion of the National Dental Hygiene Board Examination is required. The graduate will also need to obtain a license for the state he/she wishes to practice in by successfully completing a regional practical examination (WREB). The dental hygienist must practice in accordance with the requirements of the individual state practice acts and abide by requirements to maintain licensure.

Outcomes: Graduates are prepared to:

- Formulate comprehensive oral hygiene care plans that are patient centered and based on current scientific evidence.
- Employ professional judgment and critical thinking to identify, assess, analyze and creatively address situations in a safe and ethical manner.
- Demonstrate effective interpersonal skills through verbal and written communication.
- Demonstrate leadership skills and provide service to the community through health promotion activities and education.
- Apply the concepts of oral health prevention and promotion to improve overall wellness.
- Provide safe and competent dental care to individuals of any age.
- Demonstrate appropriate cultural, legal, ethical and professional values at all times.
- Collaborate with other healthcare professionals.
- Practice within the standards established by the profession and identify parameters of accountability.

Estimated Program Cost:

Tuition and Fees	\$8946
Application Fee	30
Lab Fees	320
Books/Supplies	<u>2350</u>
	\$11646

The MSU-Great Falls College of Technology's Dental Hygiene Program is a limited enrollment program, accepting 14 students each year. Interested students are urged to contact the Admissions Office and the Health Sciences Department for student advising specific to admission requirements and criteria for program acceptance.

PREREQUISITE COURSES

Course	No.	Title	Credits
BIO	213	Anatomy & Physiology I/Lab	4
BIO	214*	Anatomy & Physiology II/Lab	4
BIO	280*	Microbiology	4
ENGL	121**	Composition I	3
MATH	130**	Precalculus Algebra OR	
MATH	150**	Math for Liberal Arts OR	
MATH	161**	Algebra w/ Science Applications	3-4
CHM	111*	Inorganic Chemistry/Lab OR	
CHM	131&132	Gen Chemistry I & II with Labs	<u>4-8</u>
			22/27

All prerequisite coursework and the dental hygiene application must be completed before May 31st of the year prior to entry.

PROGRAM COURSE REQUIREMENTS

FALL SEMESTER

Course	No.	Title	Credits
DH	101	Intro to Dental Hyg/Preclinic	2
DH	102	Intro to Dental Hyg/Preclinic Lab	2
DH	111	Infect Control & Disease Prev	2
DH	118	Oral Anat for Hygienist	3
DH	122	Oral Radiology /Lab	3
		Subtotal	12

SPRING SEMESTER

Course	No.	Title	Credits
AH	140*	Pharmacology	2
DH	150	Clinical Dent Hyg Theory I	2
DH	151	Clinical Dent Hyg Practice I	4
DH	160	Periodontology I	3
DH	165	Oral Embryology & Histology	2
DH	123*	Oral Radiology Interpretation	1
DH	240	Local Anesthesia/ Nitrous Oxide Theory & Lab	<u>2</u>
		Subtotal	16

SUMMER SEMESTER

Course	No.	Title	Credits
COMM	130	Public Speaking OR	
COMM	135	Interpersonal Comm	3
DH	201	Periodontology II	2
DH	210	Clinical Dent Hyg Theory II	2
DH	211	Clinical Dent Hyg Practice II	<u>4</u>
		Subtotal	11

FALL SEMESTER

Course	No.	Title	Credits
DH	220*	Dental Nutrition	3
DH	130	Dental Materials	2
DH	215	General/Oral Pathology	3
DH	241	Gerontology & Special Needs Patients	2
DH	250	Clinical Dent Hyg Theory III	1
DH	251	Clinical Dent Hyg Practice III	5
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
DH	230	Community Dental Health and Education	2
DH	235	Professional Issues & Ethics in Dental Practice	2
DH	280	Clinical Dent Hyg Theory IV	1
DH	281	Clinical Dent Hyg Practice IV	5
PSY	101	General Psychology OR	
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
		Subtotal	16

TOTAL PROGRAM CREDITS – 93 - 98~

~ Many students need preliminary math, English and biology courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

A grade of "C" or above must be achieved in all courses to advance in the program and to graduate.

Students will be required to purchase dental instruments, supplies, uniforms and may also be required to provide transportation to clinical sites and lodging costs depending on the clinical sites selected.

Montana State University - Great Falls College of Technology

EMERGENCY SERVICES EMERGENCY MEDICAL TECHNICIAN PARAMEDIC (EMT-P) ASSOCIATE OF APPLIED SCIENCE

ADVISOR: LARRY MYERS

Emergency Medical Services (EMS) personnel play a crucial role in providing appropriate care and transportation in both emergency and non-emergency settings. MSU-Great Falls offers a one semester EMT-Basic course which, if completed successfully, prepares the student to sit for the National Registry Certification Examination to gain licensure. The College offers the EMT-Paramedic program, which is the A.A.S. degree: students must hold current licensure as EMT-B or EMT-I. All programs provide students with skills and knowledge needed to perform as entry-level practitioners at their respective level.

Upon completion of the EMS Basic, students will be prepared to begin a successful career in emergency care and transportation in emergency and non-emergency settings. Students are prepared to sit for the National Registry Certification Examination to gain licensure.

Outcomes: Graduates are prepared to:

- Provide appropriate care and transportation in both emergency and non-emergency settings.
- Effectively communicate with other medical personnel in oral, written or electronic form.
- Follow guidelines in maintaining confidentiality of patient information.
- Demonstrate correct patient assessment and appropriate intervention and care in medical emergencies including auto accidents, heart attacks, stroke, poisoning, childbirth, substance abuse and others.
- Demonstrate proficiency in emergency medical skills such as CPR, airway control, oxygenation, wound care, splinting, and cervical spine immobilization.
- Safely and correctly use medical equipment and technologies in patient treatment.
- Sit for the National Registry Certification Examination for EMT-Basic.

Upon completion of the EMT-Paramedic AAS degree program, students will be prepared to begin a successful career in emergency care and transportation in emergency and non-emergency settings.

Outcomes: Graduates are prepared to:

- Demonstrate proficiency in utilizing pharmacological interventions as needed for appropriate patient care.
- Practice advanced cardiac life support including 12-lead interpretation and pharmacology, pediatric advanced life support and pre-hospital trauma life support.
-

ADMISSION REQUIREMENTS

- 18 years of age prior to entering national certification process.
- Completion of BIO 213.
- Current certification in CPR according to the standards of the AHA Healthcare Provider or its equivalent.
- Proof of immunization against measles and rubella, diphtheria/tetanus, and a negative tuberculin test or approved treatment.
- Hepatitis B immunization series is strongly recommended. TB test required prior to clinical experience.
- Current National Registry Certification at the EMT-Basic AND/OR EMT-Intermediate Level and 1 year related experience prior to sitting for the National Registry EMT-Paramedic Certification Examination.
- Program policies and a clinical contract will be signed by the student prior to clinical rotations.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Lab Fees	765
Books/Supplies	<u>1400</u>
	\$8159

EMS SUGGESTED COURSE OF STUDY - TRACK A

FALL SEMESTER

Course	No.	Title	Credits
AH	145	Intro to Med Terms	1
BIO	213	Anatomy & Physiology I/Lab	4
ENGL	119**	Introduction to College Writing	4
EMS	137	EMT - Basic	6
MATH	161**	Algebra w/ Science Applications	3
		Total	18

SPRING SEMESTER

Course	No.	Title	Credits
AH	140	Pharmacology	2
BIO	214*	Anatomy & Physiology II/Lab	4
COMM	135	Interpersonal Communication	3
		Electives	7
		Total	16

FALL SEMESTER

Course	No.	Title	Credits
EMS	102*	Fundamentals of Adv Care	3
EMS	105*	Paramedic I	3
EMS	110*	Paramedic I/II Skills Lab	2
EMS	115*	Paramedic II	3
EMS	120*	Paramedic I/II Clinical	3
EMS	145*	ACLS Preparation	1
		Total	15

SPRING SEMESTER

Course	No.	Title	Credits
EMS	146	PALS Preparation	1
EMS	148	Pre-Hospital Trauma Life Sup	1
EMS	205*	Paramedic III	3
EMS	210*	Paramedic III/IV Skills Lab	2
EMS	220*	Paramedic III/IV Clinical/Field	4
EMS	225*	Paramedic IV	3
		Total	14

Paramedic Field Internship Phase II, III, IV - 285+ hours

Montana State University - Great Falls College of Technology

TOTAL PROGRAM CREDITS – 63~

~ Many students need preliminary math, English, and biology courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

SUGGESTED ELECTIVES

Course	No.	Title	Credits
AH	101	Healthcare Delivery in the US	2
AH	108*	Disease Concepts	2
AH	150	Fitness for Life	2
BIO	107	Fundamentals of Human Biology	4
CIT	110	Introduction to Computers	3
BIO	280*	Microbiology	4
BUS	106	Intro to Business	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	112*	Organic and Biochemistry/Lab	4
HI	156*	Legal & Regulatory Aspects of Healthcare	3
PHIL	238	Medical Ethics	3
PHYS	130	Fund of Physical Science	4
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
<i>Below taken as a unit in one semester</i>			
EMS	140	Intermediate I	4
EMS	155	Intermediate II	3
EMS	217	Intermediate III	4
EMS	222	Intermediate I Clinical	1
EMS	227	Intermediate II Clinical	2

SPRING SEMESTER

Course	No.	Title	Credits
AH	140	Pharmacology	2
EMS	146	PALS Preparation	1
EMS	148	Pre-Hospital Trauma Life Sup	1
EMS	205*	Paramedic III	3
EMS	210*	Paramedic III/IV Skills Lab	2
EMS	220*	Paramedic III/IV Clinical/Field	4
EMS	225*	Paramedic IV	3
Total			16

Paramedic Field Internship Phase II, III, IV - 285+ hours

TOTAL PROGRAM CREDITS – 70~

~ Many students need preliminary math, English, and biology courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



EMS SUGGESTED COURSE OF STUDY - TRACK B

FALL SEMESTER

Course	No.	Title	Credits
AH	145	Intro to Med Terms	1
BIO	213	Anatomy & Physiology I/Lab	4
ENGL	119**	Introduction to College Writing	4
EMS	137	EMT - Basic	6
MATH	161**	Algebra w/ Science Applications	3
Total			18

SPRING SEMESTER

Course	No.	Title	Credits
BIO	214*	Anatomy & Physiology II/Lab	4
EMS	140*	Intermediate I	4
EMS	155*	Intermediate II	3
EMS	217*	Intermediate III	4
EMS	222*	Intermediate I Clinical	1
EMS	227*	Intermediate II Clinical	2
Total			18

FALL SEMESTER

Course	No.	Title	Credits
COMM	135	Interpersonal Communication	3
EMS	102*	Fundamentals of Adv Care	3
EMS	105*	Paramedic I	3
EMS	110*	Paramedic I/II Skills Lab	2
EMS	115*	Paramedic II	3
EMS	120*	Paramedic I/II Clinical	3
EMS	145*	ACLS Preparation	1
Total			18

Montana State University - Great Falls College of Technology

EMERGENCY SERVICES EMT PARAMEDIC CERTIFICATE

ADVISOR: LARRY MYERS

NOTE: This program is under review. Please contact program advisor, Larry Myers at 406.771.4370 or lmyers@msugf.edu, for more information.

GENERAL EDUCATION REQUIREMENTS

Course	No.	Title	Credits
BIO	213	Anatomy & Physiology I/Lab	4
BIO	214*	Anatomy & Physiology II/Lab	4
COMM	135	Interpersonal Communication	3
ENGL	119**	Introduction to College Writing	4
MATH	161**	Algebra w/ Science Applications	3
		Total	18

EMS TECHNICAL CORE

Course	No.	Title	Credits
AH	140	Pharmacology	2
AH	145	Intro to Med Terms	1
EMS	102*	Fundamentals of Adv Care	3
EMS	105*	Paramedic I	3
EMS	110*	Paramedic I/II Skills Lab	2
EMS	115*	Paramedic II	3
EMS	120*	Paramedic I/II Clinical	3
EMS	137	EMT - Basic	6
EMS	145*	ACLS Preparation	1
EMS	146	PALS Preparation	1
EMS	148	Pre-Hospital Trauma Life Sup	1
EMS	205*	Paramedic III	3
EMS	210*	Paramedic III/IV Skills Lab	2
EMS	220*	Paramedic III/IV Clinical/Field	4
EMS	225*	Paramedic IV	3
		Total	38

Paramedic Field Internship Phase II, III, IV - 285+ hours

TOTAL PROGRAM CREDITS - 56~

~ Many students need preliminary math, English and biology courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

EMERGENCY SERVICES FIRE AND RESCUE TECHNOLOGY ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: JOHN CULBERTSON

Today's firefighters not only respond to fire and medical emergencies but also participate in disaster response planning, hazardous material spill mitigation, enforcement of fire codes and standards, as well as delivery of safety, fire, and accident prevention programs. The work of the contemporary firefighter is multi-functional and requires a high level of expertise in relevant technical areas as well as proficiencies in written and oral communications, leadership, planning, and the ability to deal with a broad range of individuals and situations.

This degree program combines technical fire and rescue training with general education courses to fulfill Associate of Applied Science Degree requirements. It also incorporates the opportunity to transfer credits toward a four-year degree in Fire Science/Administration.

Outcomes: Graduates are prepared to:

- Demonstrate the skills required at the Fire Fighter 1 & 2, Hazmat Technician, Officer 1 and EMT Basic levels of competency (this results in five professional certifications).
- Recognize and respond effectively to fire code and fire life safety issues.
- Use appropriate methods for fire suppression and extinguishment in a variety of settings.
- Detect arson.
- Provide basic emergency medical services.
- Assume supervisory responsibilities for a fire crew.
- Communicate effectively both orally and in writing.

The Fire and Rescue Technology Option is offered as a cooperative endeavor between Montana State University - Great Falls College of Technology and Montana State University Fire Services Training School—Great Falls.

The availability of on-line classes through MSU-Great Falls COT will allow firefighters to complete general education degree requirements without having to relocate to Great Falls.

Required technical courses are offered at locations throughout the state, mostly on weekends. Please visit the Fire Services Training School's website at www.montana.edu/wwwfire for the latest schedule of technical courses and costs.

Program applicants should forward their requests for transfer of credit for general and technical education to the Registrar's Office at the College. Requests for transfer of credit should include official copies of transcripts. Technical credits that are not on a technical transcript need to send documents to the Registrar's Office at the College so the requests for transfer of technical credits can be reviewed.

Only the credits taken from MSU – Great Falls COT are eligible for Financial Aid. FRS prefix classes are not eligible.

Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Lab Fees	180
Fire Training School	up to 6000
Books/Supplies	1050
	\$11733

GENERAL EDUCATION REQUIREMENTS

Course	No.	Title	Credits
COMM	135	Interpersonal Communication	3
ENGL	124**	Business & Professional Comm	3
MATH	---**	103 or higher	3-4
PHYS	130	Fund of Physical Science	4
PSY	101	General Psychology	3
		Subtotal	16-17

TECHNICAL EDUCATION REQUIREMENTS

Course	No.	Title	Credits
EMS	137	EMT Basic	6
FRS	101	Firefighter I	5
FRS	102*	Firefighter II	5
FRS	112*	Fire Inspection & Investigation	3
FRS	241	Fire Department Internship	3
FRS	245*	Fire Service Training & Safety Education	2
FRS	250*	Building Construction	2
FRS	265*	Incident Management & Safety	3
FRS	270*	Tactical Operations and Company Management	5
FRS	285*	Hazardous Materials	5
		Subtotal	39

TECHNICAL ELECTIVES – 6 CREDITS REQUIRED

Course	No.	Title	Credits
CIT	110	Introduction to Computers	3
FRS	107	Aircraft Fire & Rescue	3
FRS	291	Hydraulics & Water Supplies	3
FRS	290	Wildland Fire Protection	3

S-215: Fire Operations in the Urban Interface
S-290: Intermediate Fire Behavior.....
S-390: Fire Suppression Tactics

TOTAL PROGRAM CREDITS – 62-63~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

HEALTH INFORMATION TECHNOLOGY

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: CONTACT THE HEALTH SCIENCES DEPARTMENT

The Health Information Technology program is designed to prepare individuals to organize and evaluate medical records for completeness and accuracy.

Upon completion of the AAS degree in Health Information Technology, students will be prepared to begin a successful career as a health information technologist. Students are prepared to sit for the National Registered Health Information Technologist exam.

Outcomes: Graduates are prepared to:

- Use computer applications and software in maintaining health information in medical records.
- Research and rely on knowledge in medical terminology, anatomy and physiology, pharmacology and disease processes.
- Identify and apply accurate diagnostic and procedural codes for reimbursement.
- Exhibit professional communication skills in oral, written and electronic formats.
- Maintain confidentiality of health information and adhere to regulations pertaining to privacy laws and guidelines.
- Interact professionally in the healthcare environment with healthcare providers, patients/clients and the public.

The Health Information Technology program is accredited by the Commission on the Accreditation for Health Informatics and Information Management (CAHIIM). A grade of "C" or above must be achieved in all courses to advance in the program and to graduate. Students may enter the program upon completion of all prerequisite coursework and advisement meeting with the HIT program director (in person or via phone). The HIT program is offered completely online and students are placed in the two required clinical internships in a geographical location close to their home.

A grade of "C" or above must be achieved in all courses to advance in the program and to graduate.

Estimated Program Cost:

Tuition and Fees	\$7455
Application Fee	30
Lab Fees	70
Books/Supplies	<u>1700</u>
	\$9255

NOTE: Curriculum is based on a full time schedule.

REQUIRED SKILL

CIT 110 Introduction to Computers or transfer equivalent, or *Challenge exam*

FALL SEMESTER

Course	No.	Title	Credits
AH	101	Healthcare Delivery in the US	2
AH	185	Basic Medical Terminology	3
BIO	127	Anatomy & Physiology I for non-clinical majors	4
MATH	161**	College Algebra w/ Science Apps OR	
MATH	216**	Basic Statistics	3-4
COMM	135	Interpersonal Comm OR	
PSY	101	General Psychology OR	
SOC	111	Introduction to Sociology	3
		Subtotal	15-16

SPRING SEMESTER

Course	No.	Title	Credits
AH	115	Healthcare Personnel & Supervision	2
AH	194*	Basic Pharmaceuticals	1
AH	201*	Medical Science	3
BIO	128*	Anatomy & Physiology II for non-clinical majors	4
HI	156*	Legal and Regulatory Aspects of Healthcare	3
ENGL	124**	Business and Professional Comm	3
		Subtotal	16

SUMMER SEMESTER

Course	No.	Title	Credits
HI	132	Health Data Content and Structure	3
HI	210*	Statistical Health Informatics	3
HI	240	Clinical Quality Assessment	3
		Subtotal	9

FALL SEMESTER

Course	No.	Title	Credits
CIT	205*	Database Management	3
HI	225*	Health Information Management	3
HI	245*	Professional Practice I	2
HI	295*	Overview of Health Informatics	4
OO	111*	Fundamentals of Health Insurance	4
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
HI	236*	ICD Coding	3
HI	237*	CPT Coding	3
HI	256*	Intermediate ICD Coding	3
HI	290*	Professional Practice II	2
HI	292*	Topics in HIT	3
		Subtotal	14

TOTAL PROGRAM CREDITS – 69 - 70~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

HEALTH INFORMATION CODING SPECIALIST

CERTIFICATE OF APPLIED SCIENCE

ADVISOR: CONTACT THE HEALTH SCIENCES DEPARTMENT

This program is offered completely on-line.

Health information coding is the transformation of verbal descriptions of diseases, injuries and procedures into alphanumeric designations.

Upon completion of the Certificate in Health Information Coding Specialist, students will be prepared to begin a successful career as a health information coding specialist. Students are prepared to sit for the National Certified Coding Associate Exam.

Outcomes: Graduates are prepared to:

- Analyze health records and assign appropriate codes according to national and international guidelines.
- Research and rely on knowledge in correct medical terminology, anatomy and physiology and disease processes to determine the correct codes and sequences.
- Use computer applications and software specific to the coding environment.
- Maintain confidentiality of health information and adhere to regulations pertaining to privacy laws and guidelines.
- Professionally interact in the healthcare environment with healthcare providers, patient/clients and the public.

The Health Information Coding Specialist Certificate program is approved through AHIMA and the Assembly on Education. Students must complete all prerequisite coursework and meet for advisement with the HIT program director (in person or via phone) before acceptance into the program.

A grade of "C" or above must be achieved in all courses to advance in the program.

Requirements for admission into the Health Information Coding Certificate program:

1. Completion of all prerequisite coursework.
2. Formal interview with the Health Information Technology program director (either by phone or in person).

Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Lab Fees	70
Books/Supplies	<u>1700</u>
	\$6273

NOTE: Curriculum is based on a full time schedule.

REQUIRED SKILL

CIT 110 Introduction to Computers or transfer equivalent, or Challenge exam

FALL SEMESTER - HEALTH CARE CORE

Course	No.	Title	Credits
AH	101	Healthcare Delivery in the US	2
AH	185	Basic Medical Terminology	3
AH	194	Basic Pharmaceutical	1
BIO	127	Anatomy & Physiology I for non-clinical majors	4
MATH	---**	103 or Higher	4
COMM	135	Interpersonal Comm OR	
PSY	101	General Psychology OR	
SOC	111	Introduction to Sociology	3
		Subtotal	17

SPRING SEMESTER

Course	No.	Title	Credits
AH	201*	Medical Science	3
ENGL	124**	Business and Professional Comm	3
HI	132*	Health Data Content & Structure	3
HI	236*	ICD Coding	3
HI	237*	CPT Coding	3
		Subtotal	15

SUMMER SEMESTER

Course	No.	Title	Credits
OO	111*	Fund of Health Insurance	4
HI	150*	Professional Practice - Coding	2
HI	256*	Intermediate ICD Coding	3
HI	257*	Intermediate CPT Coding	3
		Subtotal	12

TOTAL PROGRAM CREDITS – 44~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

MEDICAL BILLING SPECIALIST

CERTIFICATE OF APPLIED SCIENCE

ADVISOR: DEBORAH NEWTON

This program is offered completely on-line.

The Medical Billing Specialist works in a variety of settings including medical management organizations, physician offices, hospitals, clinics, group practices, billing companies and education. Students in this Certificate program are trained as entry-level billing specialists. The Medical Billing Specialist Program prepares students with the knowledge and technical skills necessary to perform the duties of a medical billing specialist in a variety of health care settings.

Outcomes: Graduates are prepared to:

- Communicate effectively in both oral and written communication.
- Use the appropriate software and hardware for applications in the business office.
- Manage the information needed for successful operation of the business.
- Apply interpersonal relations concepts and techniques to personal and professional situations.
- Understand and apply mathematical concepts and models.
- Solve billing problems by applying business principles, communication standards, and office management skills.

A grade of "C" or above must be achieved in all courses to advance in the program.

Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Lab Fees	35
Books/Supplies	<u>1700</u>
	\$6238

REQUIRED SKILL

OO 107 Keyboarding Basics or Challenge Exam
 CIT 110 Introduction to Computers or Challenge Exam
 Health Science Orientation will be required

FALL SEMESTER

Course	No.	Title	Credits
AH	185	Basic Medical Terminology	3
BIO	127	Anatomy and Physiology I for non-clinical major	4
ENGL	121**	Composition I	3
HI	132*	Health Data Content and Structure	3
OO	111*	Fund of Health Insurance	4
		Subtotal	17

SPRING SEMESTER

Course	No.	Title	Credits
AH	201*	Medical Science	3
HI	156*	Legal & Regulatory Aspects of Healthcare	3
HI	236*	ICD Coding	3
MATH	---**	103 or Higher	4
OO	112*	Adv Health Insurance Tech	3
PSY	101	General Psychology OR	
SOC	111	Introduction to Sociology	3
		Subtotal	19

SUMMER SEMESTER

Course	No.	Title	Credits
HI	237*	CPT Coding	3
OO	290*	Insurance Internship	3
		Subtotal	6

TOTAL PROGRAM CREDITS – 42~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

MEDICAL ASSISTANT

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: SUSAN COOPER

NOTE: The Medical Assistant Program is in moratorium. Students will not be accepted into the program for the 2007-2008 academic year.

Medical assistants are the only allied health professionals specifically trained to work in ambulatory settings, such as physicians' offices, clinics and group practices. These multiskilled personnel can perform administrative and clinical procedures. Graduates from the program are prepared to:

- Perform administrative duties in the clinical office such as answering telephones, updating and filing medical records, filling out insurance forms, handling correspondence, scheduling appointments, arranging for hospital admission or laboratory services and handling billing.
- Perform clinical duties such as taking medical histories and recording vital signs, explaining treatment procedures to patients, preparing patients for examination, assisting the physician during the examination and participating in patient education.
- Collect and prepare laboratory specimens or perform basic laboratory tests, dispose of contaminated supplies, sterilize medical instruments, draw blood, prepare patients for x-rays, take electrocardiograms, remove sutures and change dressings.
- Sit for the certification examination for medical assistants administered by the American Association of Medical Assistants.

REQUIRED SKILL

OO107 Keyboarding Basics or Challenge Exam

PREREQUISITE COURSES

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3
AH	185	Basic Medical Terminology	3
COMM	135	Interpersonal Communication	3
CIT	110	Introduction to Computers	3
MATH	161**	Algebra w/ Science Applications	4
		Subtotal	16

REQUIRED COURSES

Course	No.	Title	Credits
AH	140*	Pharmacology	2
AH	201*	Medical Science	3
BIO	213	Anatomy & Physiology I/Lab	4
BIO	214*	Anatomy & Physiology II/Lab	4
ENGL	121**	Composition I	3
ENGL	124*	Business & Professional Comm	3
HI	132*	Health Information Processes	3
HI	236*	ICD Coding	3
HI	237*	CPT Coding	3
MO	138*	Clinical Procedures I	3
MO	238*	Clinical Procedures II	3
MO	241*	Clinical Review	1
MO	242*	Externship	4
OO	111*	Fund of Health Insurance	4
OO	250*	Comps in Medical/Dental Off	1
OO	255*	Medical Transcription I	3
OO	265*	WordPerfect OR	
OO	266*	Microsoft Word	3
PSY	101	General Psychology	3
		Subtotal	53
		Prerequisites	16

TOTAL PROGRAM CREDITS – 69~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

SUGGESTED ELECTIVES

Course	No.	Title	Credits
BUS	230*	Management	3
HI	156	Legal and Regulatory Aspects of Healthcare	3
OO	220	Interviewing for Jobs	1
OO	221	Resumes	1
PHIL	238	Medical Ethics	3



Montana State University - Great Falls College of Technology

PHYSICAL THERAPIST ASSISTANT

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: ANDREA JOHNSON

NOTE: The Physical Therapist Assistant program will be starting fall semester 2007 with a 16 student enrollment limit. There can be up to four alternates for the program. There are 29 credits worth of pre-requisite courses that may take one year or longer to complete. All pre-requisite coursework must be complete with a grade of "C" or higher. A grade of "C" or "pass" is required for all coursework within the PTA program after formal acceptance. The PTA program begins fall semester of each year and will end the following fall; taking one full year. This time includes built-in clinical experiences which may or may not be in the Great Falls area.

Upon completion of the PTA program, the graduate is prepared to take the national board examination for physical therapist assistants provided by the Federation of State Boards of Physical Therapy and must receive a passing score in order to become a licensed PTA. Licensure is required to practice as a physical therapist assistant in Montana and is overseen by the State of Montana Board of Physical Therapy Examiners.

The Physical Therapist Assistant program is designed to graduate entry-level physical therapist assistants who are knowledgeable, competent, self-assured, adaptable, and service-oriented patient/client care providers performing their duties within the ethical and legal guidelines of the physical therapy profession as entry-level physical therapist assistants having successfully passed the National Physical Therapist Assistant Examination. Graduates from the program are prepared to work in a variety of healthcare setting including acute care, outpatient, rehabilitation, and extended care facilities.

Outcomes: Graduates are prepared to:

- Instruct patients in correct and safe ambulation.
- Perform therapeutic exercise.
- Use physical agents safely and appropriately.
- Rehabilitate patients in functional activities.
- Document patient progress in both paper and electronic formats.
- Interact professionally with other healthcare team members.

Montana State University - Great Falls College of Technology's Physical Therapist Assistant program is working toward restoring active accreditation by the Commission on Accreditation in Physical Therapy Education. The PTA program has been in a state of moratorium since 2003.

PRE-PHYSICAL THERAPIST ASSISTANT REQUIREMENTS

A background in basic sciences and proficiency in computer skills are essential to success in the Physical Therapist Assistant Program. Prior to Fall admission into the PTA program and as proof of meeting the application requirements for admission, the student must:

- Complete high school (ore college equivalent) Biology, Physics, and Chemistry, or college equivalent;
- Complete 40 hours of observation at physical therapy clinics/facilities;
- Write and submit a short reflective paper detailing their experiences at clinical observations (criteria for this paper is provided to the student);
- Show proof of computer literacy (high school or college courses, or challenge exam);
- Provide three letters of reference.

Estimated Program Cost:

Tuition and Fees	\$5964
Application Fee	30
Lab Fees	340
Books/Supplies	2000
	\$8334

PREREQUISITE COURSES

Course	No.	Title	Credits
AH	108*	Disease Concepts	2†
AH	145	Introduction to Medical Terminology	1†
BIO	213	Anatomy & Phys I Lecture/Lab	4†
BIO	214*	Anatomy & Phys II Lecture/Lab	4†
COMM	135	Interpersonal Communication	3†
ENGL	121**	Composition I	3†
MATH	161**	Algebra w/ Science Applications	3†
PSY	101	General Psychology	3†
PSY	109	Lifespan Development	3†
SOC	111	Introduction to Sociology	3†
		Subtotal	29

REQUIREMENTS AFTER FORMAL ACCEPTANCE

FALL SEMESTER

Course	No.	Title	Credits
PTA	100	Intro to Physical Therapy	3†
PTA	101*	Physical Therapist Assisting I/Lab	4†
PTA	110*	Issues in Physical Therapist Assisting	2†
PTA	205*	Motion & Human Body's Response/Lab	4†
PTA	210*	Clinical Experience I	3†
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
PTA	201*	Physical Therapist Assisting II/Lab	4†
PTA	208*	Introduction to Neuroscience	3†
PTA	211*	Physical Therapist Assisting III/Lab	4†
PTA	215*	Introduction to Orthopedics/Lab	3†
PTA	220*	Clinical Experience II (6-week)	4†
		Subtotal	18

SUMMER SEMESTER

Course	No.	Title	Credits
PTA	225*	Seminar & Project in PTA	3†
PTA	230*	Clinical Experience III (8-week)	5†
		Subtotal	8

TOTAL PROGRAM CREDITS – 71~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

PRACTICAL NURSE

CERTIFICATE OF APPLIED SCIENCE

ADVISORS: **CHERYLL ALT**
PATTI KERCHER
CINDY SCHULTZ

NOTE: This program is under review. Please contact program advisor, Cheryll Alt at 406.771.4362 or calt@msugf.edu, for more information.

The Practical Nurse program prepares individuals to function as entry-level practical nurses with the ability to give safe, effective nursing care. The Practical Nurse program at Montana State University - Great Falls College of Technology is currently approved by the Montana State Board of Nursing.

Upon completion of the Certificate in Practical Nursing, students will be prepared to begin a successful career as a practical nurse. Students are prepared to sit for the national licensure examination for practical nursing.

Outcomes: Graduates are prepared to:

- Practice nursing skills effectively.
- Communicate professionally with all medical and supportive staff.
- Use technology in patient care.
- Work in a variety of health care settings such as hospitals, ambulatory care, physician's offices, home healthcare, dialysis, assisted living facilities and other geriatric environments.

The Practical Nurse program is a limited enrollment program. Interested students must apply for entry into the program by contacting the advisor for an application packet. The length of the program is three consecutive semesters. Accepted students will be required to provide proof of Health Care Provider CPR certification, negative Tuberculosis test, and provide a physician's authorization before the beginning of the fall semester. Computer skills are highly recommended.

The Hepatitis B immunization series is strongly recommended before entrance into the program. A student may be denied access to clinical rotations without an adequate Hepatitis B titer. Students having religious or personal conflicts against receiving Hepatitis B vaccine must sign a release form.

Estimated Program Cost:

Tuition and Fees	\$7455
Application Fee	30
Insurance	24
Lab Fees	230
Books	2250
Uniforms	<u>225</u>
	\$10214

PREREQUISITE COURSEWORK

The following courses must be completed or be in progress prior to admission into the Practical Nurse Program. All prerequisite course work must be completed with a minimum grade of "C-" in each course and a minimum cumulative GPA in prerequisite course work of 2.0. Grades in prerequisite courses are a major factor in ranking applications for program acceptance.

FIRST SEMESTER

Course	No.	Title	Credits
BIO	213	Anatomy & Physiology I/Lab	4
CHM	111*	Inorganic Chemistry/ Lab	4
MATH	161**	Algebra w/ Science Applications	3
NURS	100	Introduction to Nursing	<u>1</u>
		Subtotal	12

SECOND SEMESTER

Course	No.	Title	Credits
AH	219*	Nutrition & Diet Therapy	2
BIO	214*	Anatomy & Physiology II/Lab	4
ENGL	121**	Composition I	3
PSY	101	General Psychology	<u>3</u>
		Subtotal	12

Science courses must be completed within five (5) years of application to the program and other courses must be completed within 15 years of applying to the Practical Nurse Program.

PROGRAM COURSE REQUIREMENTS AFTER FORMAL ACCEPTANCE

The courses listed below are required in the program of study for the Certificate of Applied Science in Practical Nursing. The courses are offered at MSU Great Falls College of Technology in the following sequence:

FALL SEMESTER

Course	No.	Title	Credits
NURS	140*	Pharmacology	3
NURS	150*	Fundamentals of Nursing	7
NURS	250*	Gerontology	<u>2</u>
		Subtotal	12

SPRING SEMESTER

Course	No.	Title	Credits
NURS	260*	Adult Nursing	7
NURS	270*	Maternal Child Nursing	3
NURS	280*	Mental Health Nursing	<u>2</u>
		Subtotal	12

SUMMER TERM

Course	No.	Title	Credits
NURS	290*	Nursing Leadership	<u>2</u>
		Subtotal	2

SUGGESTED ELECTIVES

Course	No.	Title	Credits
AH	120*	IV Therapy	1

* This class is a highly recommended addition to the standard nursing curriculum. It will provide you with IV certification which many employers value or require for employment.

Once enrolled in nursing courses, a minimum of a grade of "C-" in all courses is required to continue in the program. In the clinical setting, students must achieve a grade of 75% in all rotations of each clinical experience.

TOTAL PROGRAM CREDITS - 51~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

RADIOLOGIC TECHNOLOGY

ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISORS: GREG PAULASKIS
TOM LISTON

Radiologic Technologists also referred to as Radiographers, work in a professional environment at a hospital, private office or clinic. Radiologic Technologists are trained to perform radiologic examinations in accordance with radiation safety standards for themselves, clinical staff and their patients. Skill sets include; patient care, positioning, operating X-ray equipment, film quality assessment, technical factors, and interacting with the general public, ancillary workers, healthcare workers, and physicians.

The Radiologic Technology student learns how to accurately demonstrate body structures by determining proper exposure factors, manipulating medical imaging equipment, evaluating the radiographic image quality; and providing for patient protection, safety, and comfort during radiographic procedures. Some technologists choose to specialize in computed tomography, magnetic resonance imaging, mammography, ultrasound, nuclear medicine, positron emission tomography or radiation therapy. Some of these modalities require additional certification. The student will be introduced to these specialty areas. Radiologic Technology is an expanding field in the area of medical diagnosis and treatment. Imaging methods and procedures are updated and implemented on a regular basis.

The Radiologic Technology Program is a two-year program designed to prepare individuals with the knowledge, skills and professional attitude necessary for successful employment as a Radiologic Technologist.

Outcomes: Graduates are prepared to:

- Employ professional judgment, problem solving, and critical thinking to identify, assess, and analyze the situation providing quality patient care in a safe and ethical manner.
- Demonstrate effective interpersonal skills through verbal and written communication.
- Practice within the standards established by the profession.
- Demonstrate appropriate cultural, legal, ethical and professional values.
- Practice as a qualified registered technologist in any type of patient care facility.

Accreditation for the Radiologic Technology Program is presently been acquired through Northwest Association Commission on Colleges. This regional accrediting agency is the organization that accredits MSU Great Falls CoT.

After completion of the program the graduate is eligible to take a nationally recognized certification examination administered by the American Registry of Radiologic Technologist (ARRT).

In seeking admission into the program, the student is required to complete the requirements of the Radiologic Technology Program Student Information and Application Packet. The Packet can be printed from the Program website.

Students in the Radiologic Technology Program must earn a "C" or better in ALL classes in the two-year program. Any grade less than a "C" in any class will result in the student having to retake that class. Computer skills, Medical Terminology, Physics, and Chemistry are highly recommended.

Estimated Program Cost:

Tuition and Fees	\$8946
Application Fee	30
Insurance	75
Books/Supplies	1500
	\$10551

DEGREE COMPLETION OPTION

Students who have successfully completed and documented that they graduated from an accredited Radiologic Technology program and possess a current Radiologic Technologist State license may apply to the College's Radiologic Technology AAS Degree Completion program and earn a College Degree by taking all of the prerequisite courses listed below along with COMM 135, Interpersonal Communication. For more information contact Admissions or the Program Director of the Radiologic Technology Program.

NOTE: Applicants must complete the following courses with a minimum grade of "C" in each course prior to formal acceptance into the program.

PREREQUISITE COURSES

Course	No.	Title	Credits
BIO	213	Anatomy & Physiology I/Lab	4
BIO	214*	Anatomy & Physiology II/Lab	4
ENGL	121**	Composition I	3
MATH	161**	Algebra w/ Science Applications	3
		Subtotal	14

The courses below are to be taken in the order that they are listed. Admission into the Radiologic Technology program is mandatory to qualify to take the courses below.

FALL SEMESTER

Course	No.	Title	Credits
RAD	105	Intro to Radiologic Technology	2
RAD	110	Radiographic Procedures I	2
RAD	115	Radiographic Principles I	3
RAD	120	Radiobiology/Radiation Protection	3
RAD	140	Clinical Education I	6
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
RAD	111*	Radiographic Procedures II	3
RAD	116*	Radiographic Principles II	3
RAD	130	Patient Care in Radiology	2
RAD	141*	Clinical Education II	6
		Subtotal	14

SUMMER SEMESTER

Course	No.	Title	Credits
RAD	240*	Radiologic Internship	3
		Subtotal	3

FALL SEMESTER

Course	No.	Title	Credits
RAD	210*	Radiographic Procedures III	4
RAD	220*	Radiographic Principles III	2
RAD	241*	Clinical Education III	6
		Subtotal	12

SPRING SEMESTER

Course	No.	Title	Credits
COMM	135	Interpersonal Communications	3
RAD	215*	Radiographic Procedures IV	2
RAD	242*	Clinical Education IV	6
RAD	270	Registry Review	2
		Subtotal	13

TOTAL PROGRAM CREDITS - 72~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

RESPIRATORY CARE ASSOCIATE OF APPLIED SCIENCE DEGREE

ADVISOR: LEONARD BATES

Respiratory Care is a healthcare specialty that offers a set of unique challenges in prevention, treatment, management, and rehabilitation of people with lung problems. Respiratory Care involves a wide variety of life saving, life supporting situations, working alongside physicians, nurses, and others on the healthcare team, and treating patients ranging in age from newborns to senior citizens.

The work of respiratory care practitioners involves the administration of treatments using sophisticated medical equipment and technology to patients with lung disorders such as asthma, emphysema, pneumonia, and bronchitis. The respiratory care practitioner also works as a member of the critical care team, in laboratories, in rehabilitation, and in home care. Excellent judgment, assessment, and communications skills are essential for the respiratory care practitioner, as are the ability to solve problems and think creatively.

The curriculum is designed to develop critical thinking and analytical skills including collection and organization of data as well as the ability to develop logical actions based on data analysis. The program combines classroom, laboratory, and clinical courses taught at the College and hospitals.

The Respiratory Care Program is a two-year program designed to prepare individuals with the knowledge, skills and professional attitude necessary for successful employment as Respiratory Therapists. Upon completion of the AAS degree in Respiratory Technology, students will be prepared to begin a successful career as advanced-level respiratory therapists. Students are prepared to sit for the National Board for Respiratory Care (NBRD) Entry Level Exam, NBRC Written Advanced Practitioner Exam, and the NBRC Clinical Simulation Exam.

Outcomes: Graduates are prepared to:

- Perform oxygen therapy.
- Perform inhaled medication administration.
- Perform ventilator management.
- Perform cardiopulmonary diagnostic tests.
- Perform other interventions as required in the treatment of patients with lung disorders and diseases.

Graduates are eligible to take the National Board for Respiratory Care Entry Level Examination and the Advanced Practitioner Examination. The Respiratory Care Program is accredited by the Commission on Accreditation of Allied Health Education Programs through the Committee on Accreditation of Respiratory Care Programs.

A grade of "C" or above must be earned in all required courses to continue in and complete the program. CPR is a prerequisite for entrance into the first clinical experience.

All students must sign a clinical contract defining their professional responsibility and behavior. All students are required to complete two to four weeks of clinic outside of Great Falls during the summer semester.

Estimated Program Cost:

Tuition and Fees	\$8946
Application Fee	30
Books/Supplies	1500
Uniforms	63
Lab Fees	<u>545</u>
	\$11084

PRE-RESPIRATORY CARE REQUIRED COURSES

Background in related instruction and basic science is essential to prepare applicants to succeed in the Respiratory Care Program.

All applicants must have completed high school chemistry with a grade of "B" or higher, computer applications courses with a "C" or higher, or have equivalent college courses with a grade of "C" or higher.

Applicants must complete the following courses with a minimum grade of "C" in each course prior to formal acceptance into the program.

PREREQUISITE COURSES

Course	No.	Title	Credits
BIO	213	Anatomy & Physiology I/Lab	4
ENGL	121**	Composition I	3
MATH	161**	Algebra w/ Science Applications	3
#		Human Relations – one course	3
		Subtotal	13

Students may select from COMM 135 Interpersonal Comm, PSY 101 General Psychology, or PSY 109 Lifespan Development.

The courses below are to be taken in the order that they are listed. Admission into the Respiratory Care program and completion of the previous semester are required.

PROGRAM COURSE REQUIREMENTS AFTER FORMAL ACCEPTANCE

FALL SEMESTER

Course	No.	Title	Credits
AH	140*	Pharmacology	2
BIO	214*	Anatomy & Physiology II/Lab	4
RC	150	Respiratory Care	3
RC	155	Respiratory Physiology	3
RC	170	Resp Tech & Procedures I	5
		Subtotal	17

SPRING SEMESTER

Course	No.	Title	Credits
RC	140*	Resp Care Clinic I (2 days/wk)	5
RC	171*	Resp Techn & Procedures II	5
RC	180	Ventilator Management	2
RC	255*	Pulmonary Assessment	3
RC	275	Pulmonary Disease	2
		Subtotal	17

SUMMER SEMESTER

Course	No.	Title	Credits
RC	141*	Resp Care Clinic II (4 days/wk 8 wks)	5
RC	260	Neonatal Respiratory Care	3
		Total	8

FALL SEMESTER

Course	No.	Title	Credits
AH	120*	IV Therapy	1
EMS	145*	ACLS Preparation	1
RC	240	Resp Care Clinic III (2 days/wk)	6
RC	245	Resp Care Clinical Seminar I	1
RC	250	Hemodynamic Monitoring	3
RC	265*	Resp Care in Alternative Sites	1
RC	273	Pulmonary Function Testing	1
		Subtotal	14

SPRING SEMESTER

Course	No.	Title	Credits
BIO	280*	Microbiology	4
EMS	146	PALS Preparation	1
RC	241	Resp Care Clinic IV (3 days/wk)	6
RC	246	Resp Care Clinical Seminar II	1
RC	280	Supervisory Management	2
		Subtotal	14

TOTAL PROGRAM CREDITS - 83~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

SURGICAL TECHNOLOGY

CERTIFICATE

ADVISOR: SANDRA ONDLER

NOTE: This program is under review. Please contact the program advisor, at 406.771.4355 or sondler@msugf.edu for more information.

Surgical Technologists, (ST) often referred to as a “scrub tech or operating room tech” are integral members of the operating room team.

Upon completion of the Surgical Technology Certificate, students will be prepared to begin a successful career as a surgical technician often referred to as a scrub tech or operating room tech. Students are prepared to sit for the National Program Assessment Examination (PAE) and for the national examination to become a Certified Surgical Technologist (CST).

Outcomes: Graduates are prepared to:

- Work with surgeons, anesthesiologists, nurses and other health professionals in providing direct or indirect patient care while demonstrating positive work ethic, professionalism and appropriate interpersonal skills in the surgical setting.
- Practice professional, value directed actions based on didactic and clinical knowledge, ethical principles and legal standards as a member of the surgical team.
- Organize surgical instrumentation, supplies and equipment in an efficient manner while utilizing principles of aseptic technique for physical preparation and maintenance of the surgical environment.
- Perform under pressure in stressful and emergency surgical situations.
- Demonstrate understanding of biomedical sciences and technology as it applies to the patient focused events that occur in the operating room.

Surgical Technologists usually work within the operating room itself which may offer specialization in specific fields such as orthopedics, plastics, ENT, ophthalmic or cardiovascular; they may qualify for work within various medical fields also such as dental assistants, veterinary assistants, procurement technicians and instrument processing technicians without much more education than on the job training. As medical technology advances so does the opportunities for the working surgical technician.

The curriculum is designed as a hybrid class of face to face and online instruction to provide theoretical foundations of operating room techniques. The surgical technology lecture classes are offered strictly online: this requires strong organizational skills and self discipline. The student will learn skills in a competency-based clinical lab and apply learned skills in the clinical facilities. Within the operating room, the student will observe, then participate in a supervised position, then advance to a high level of independence by the completion of the final internship.

The surgical technology program at Montana State University – Great Falls College of Technology has a limited number of students per year due to clinical space and various other factors. This requires the student to complete a conditional application one semester prior to the semester they plan to begin the program. Students should call for an appointment to obtain this application from the program director.

Estimated Program Cost:

Tuition and Fees	\$4473
Application Fee	30
Lab Fees	560
Books/Supplies	<u>1500</u>
	\$6563

This program is nationally accredited through the CAAHEP and the Association of Surgical Technologists.

CAAHEP
1361 Park St
Clearwater, FL 33756
www.caahep.org
phone: 727.210.2350
fax: 727.210.2354

REQUIRED SKILL

CIT	110	Introduction to Computers OR	Challenge Exam
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PREREQUISITE COURSES

Course	No.	Title	Credits
AH	108*	Disease Concepts	2
AH	145	Intro to Med Terminology	1
AH	194	Basic Pharmaceutical	1
BIO	107	Fund of Human Biology /Lab	4
COMM	135	Interpersonal Communication	3
ENGL	119**	Introduction to Writing OR	
ENGL	121**	Composition I	3-4
MATH	103**	Introductory Algebra	4
		Subtotal	18-19

FALL SEMESTER

Course	No.	Title	Credits
SURG	102	Safe Pt Care & Op Room Tech	5
SURG	104*	Surgical Technology Lab	7
SURG	105	Surgical Procedures I	4
		Subtotal	16

SPRING SEMESTER

Course	No.	Title	Credits
SURG	106*	Surgical Procedures II	5
SURG	192*	Clinical Experience I	4
SURG	193*	Clinical Experience II	5
SURG	194*	Internship	5
		Subtotal	19

TOTAL PROGRAM CREDITS – 51-52~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



GREAT FALLS HIGHER EDUCATION Center



• • • • • • • • • • **Business**

MSU Bozeman
Park University
UM - Western

Business Technology

MSU - Northern
Park University

Computer Information Systems

MSU - Northern

Criminal Justice Administration

Park University

Environmental Science

UM - Western

Finance Management

Park University

Health Care Management

Park University

Human Resource Management

Park University

Management

Park University

Management/ Computer Information Systems

Park University

BSN Nursing

MSU Bozeman

Social Psychology

Park University

Montana State University - Great Falls College of Technology

Great Falls Higher Education Center

The campus of Montana State University-Great Falls College of Technology serves as the site for the Montana University System Higher Education Center in Great Falls. The Higher Education Center coordinates courses and programs to be delivered in Great Falls by Montana's four-year campuses. Degree programs and courses offered through the Higher Education Center are primarily designed for area residents who are interested in enrolling in a graduate or four-year degree program not currently available in Great Falls.

Recent examples include an MBA offered by the University of Montana and Bachelor degrees offered by MSU-Bozeman and MSU-Northern. Further information about the Higher Education Center in Great Falls can be requested from Montana State University-Great Falls College of Technology Main Office or by calling the College at 406-761-4300 or 1-800-446-2698 or online at <http://hec.msugf.edu>.

Higher Education Options



BUSINESS

MSU Bozeman
Park University
UM – Western

BUSINESS TECHNOLOGY

MSU – Northern
Park University

COMPUTER INFORMATION SYSTEMS

MSU – Northern

CRIMINAL JUSTICE ADMINISTRATION

Park University

ENVIRONMENTAL SCIENCE

UM – Western

FINANCE MANAGEMENT

Park University

HEALTH CARE MANAGEMENT

Park University

HUMAN RESOURCES MANAGEMENT

Park University

MANAGEMENT

Park University

MANAGEMENT/COMPUTER INFORMATION SYSTEMS

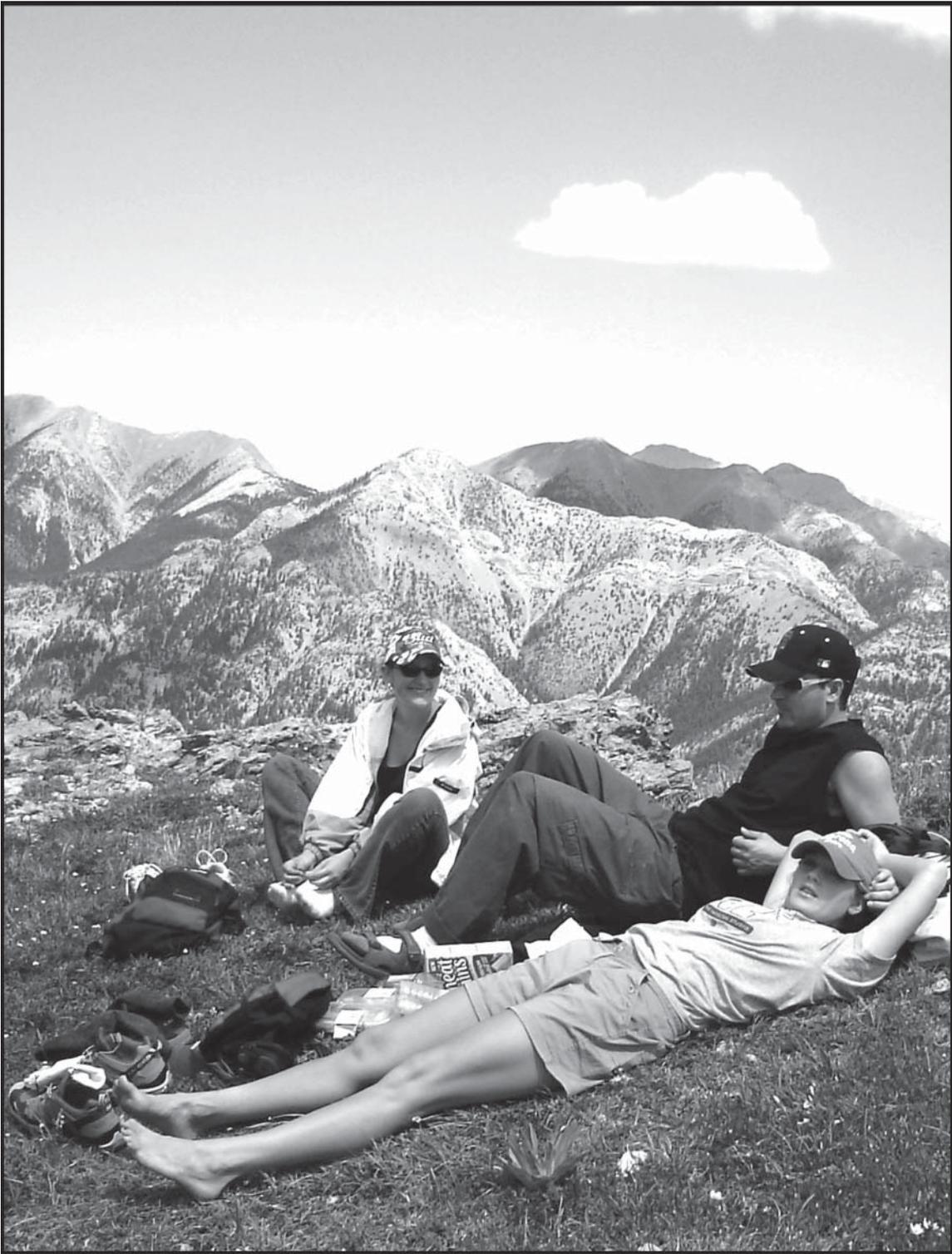
Park University

BSN NURSING

MSU Bozeman

SOCIAL PSYCHOLOGY

Park University



Montana State University - Great Falls College of Technology

THIS PROGRAM OF STUDY IS DESIGNED FOR STUDENTS PLANNING TO APPLY TO THE MSU BOZEMAN – COLLEGE OF BUSINESS

The College of Business of MSU-Bozeman has a basic curriculum required for the freshman and sophomore years in Accounting, Finance, Management, and Marketing. Completion of this track will allow students to be eligible for formal admission to the MSU-Bozeman College of Admissions. Students intending to apply for admission to the MSU-Bozeman of Business must complete all A.S. degree requirements, have a "C" or better in all Business courses, and have a 2.25 minimum cumulative GPA.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT THE MSU-BOZEMAN'S COLLEGE OF BUSINESS.
BUSINESS@MONTANA.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval

ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 31 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing & 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I AND 1 of the following	3
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS – 3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3

HUMANITIES – 3 CREDITS

Course	No.	Title	Credits
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3

FINE ARTS – 3 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/ HISTORY – 6 CREDITS

Course	No.	Title	Credits
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. BUSINESS COURSE REQUIREMENTS – 31 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3†
ACCT	222*	Managerial Accounting	3†
BUS	106	Introduction to Business	3†
CIT	110	Introduction to Computers	3†
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3†
ENGL	124**	Business & Professional Comm	3†
ENGL	127*	Technical Report Writing	VAR†
MATH	181**	Calculus I	4†
MATH	216**	Basic Statistics	4†
MATH	217*	Intermediate Statistics	3†

Note: Students may not use any of the Business Course Requirements to fulfill requirements in the Montana University System Core.

TOTAL CREDITS – 62

~Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

THIS PROGRAM OF STUDY IS DESIGNED FOR STUDENTS PLANNING TO APPLY TO THE PARK UNIVERSITY – BUSINESS PROGRAM

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Business program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval

ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking AND	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	201	Economics II (Micro)	3
PSY	109	Lifespan Development	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. BUSINESS COURSES – 28 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	255*	Legal Environment	3
CIT	110	Introduction to Computers	3
ECON	102	Economics I (Macro)	3
ENGL	228*	Strategies of Business Comm	3
MATH	181**	Calculus I	4
MATH	217*	Intermediate Statistics	3

TOTAL CREDITS – 60

*Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
UM WESTERN – BUSINESS
PROGRAM**

Students may begin pursuit of a baccalaureate degree from UM-Western by following the articulated plan of study below. By completing the plan of study, students can move directly into UM-Western's Business program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT DENISE HOLLAND AT UM-WESTERN FOR
POTENTIAL CHANGES: 406-683-7203, d_holland umwestern.edu

PROGRAM COURSE REQUIREMENTS:

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing & 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I AND	3
COMM	130	Public Speaking	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	216**	Basic Statistics	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEO	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. BUSINESS COURSES – 27 CREDITS

Course	No.	Title	Credits
ACCT	101	Accounting Procedures I	3
ACCT	102*	Accounting Procedures II	3
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	255*	Legal Environment	3
CIT	110	Introduction to Computers	3
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3

TOTAL CREDITS – 59~

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
MSU NORTHERN – BUSINESS TECHNOLOGY
PROGRAM**

The Department of Business, MSU-Northern has recommended the following criteria and basic curriculum for the freshman and sophomore years of its Business Technology major with emphasis in Accounting/Finance or Marketing and Small Business Management for transfer:

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT KEVIN CARLSON AT MSU-NORTHERN FOR
POTENTIAL CHANGES: 406-771-4429, KCARLSON@MSUN.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval
ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 31 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I	3
		AND 1 of the following	
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS – 3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3
MATH	181**	Calculus I	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOG	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCE/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. BUSINESS COURSE REQUIREMENTS – 31 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3†
ACCT	222*	Managerial Accounting	3†
BUS	106	Introduction to Business	3†
BUS	230*	Management	3†
BUS	255*	Legal Environment	3†
CIT	110	Introduction to Computers	3†
ECON	201	Economics II (Micro)	3†
ENGL	124**	Business & Professional Comm	3†
MATH	216**	Basic Statistics	4†
MATH	217**	Intermediate Statistics	3†

Note: Students may not use any of the Business Course Requirements to fulfill requirements in the Montana University System Core.

TOTAL CREDITS – 62

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

THIS PROGRAM OF STUDY IS DESIGNED FOR STUDENTS PLANNING TO APPLY TO THE PARK UNIVERSITY – BUSINESS TECHNOLOGY PROGRAM

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Business Technology program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval
ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking AND	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	201	Economics II (Micro)	3
PSY	109	Lifespan Development	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. BUSINESS TECHNOLOGY COURSES – 28 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	230*	Management	3
BUS	255*	Legal Environment	3
CIT	110	Introduction to Computers	3
ENGL	124**	Business & Professional Comm	3
MATH	216**	Basic Statistics	4
MATH	217*	Intermediate Statistics	3

TOTAL CREDITS - 60~

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
MSU NORTHERN – COMPUTER INFORMATION SYSTEMS
PROGRAM**

The Department of Computer Information Systems, MSU-Northern has recommended the following curriculum for transfer to a Bachelor of Arts degree in Computer Information Systems.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT MSU-NORTHERN IN GREAT FALLS FOR POTENTIAL CHANGES: 406-771-4428.

I. MONTANA UNIVERSITY SYSTEM CORE – 31 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I AND 1 of the following	3
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS – 3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3
MATH	181**	Calculus I	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOG	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3

HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. COMPUTER INFORMATION SYSTEMS CORE REQUIREMENTS (15 CREDITS)

Course	No.	Title	Credits
CIT	111	Intro to Computers for Tech Majors	3†
CIT	160*	Introduction to Programming	3†
CIT	205*	Database Management	3†
CIT	220*	Electronic Spreadsheets	3†
CIT	229*	Web Page Construction	3†
ENGL	122*	Composition II	3†

III. COMPUTER INFORMATION SYSTEMS ELECTIVES (14 CREDITS)

Students may choose from the following courses to complete their elective requirements for the Associate of Science degree:

Course	No.	Title	Credits
CIT	120	Internet Essentials	2†
CIT	126*	Networking Fundamentals	4†
CIT	166*	Computer Operating Systems	4†
CIT	176*	Intro to Router Technology	4†
CIT	206*	Database Management II	3†
CIT	210*	Network Operating Systems I	2†
CIT	211*	Network Operating Systems II	2†
CIT	226*	Switching Basics and Intermediate Routing	4†
CIT	231*	Web Page Design	3†
CIT	272*	PC Troubleshooting & Maint.	4†
CIT	275*	Computer End-User Support	3†
CIT	276*	WAN Technologies	4†
OO	266*	Microsoft Word	3†

TOTAL CREDITS – 60

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

THIS PROGRAM OF STUDY IS DESIGNED FOR STUDENTS PLANNING TO APPLY TO THE PARK UNIVERSITY – CRIMINAL JUSTICE ADMINISTRATION PROGRAM

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Criminal Justice Administration program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
SOC	115	Survey of Criminal Justice	3
PSY	101	General Psychology	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. CRIMINAL JUSTICE ADMINISTRATION COURSES – 28 CREDITS

Course	No.	Title	Credits
BUS	230*	Management	3
BUS	235*	Marketing	3
CIT	110	Introduction to Computers	3
ENGL	122*	Composition II	3
MATH	216**	Basic Statistics	4
PSY	109	Lifespan Development	3
		Electives	9

ELECTIVE CHOICES – 9 CREDITS

Course	No.	Title	Credits
ACCT	231*	Income Tax Concepts	3
BUS	240*	Advertising	3
CIT	205*	Database Management	3
CIT	255*	Fund of Network Security	3
ENGL	217	Creative Writing	3

TOTAL CREDITS – 60~

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
UM WESTERN – ENVIRONMENTAL SCIENCE
PROGRAM**

ADVISOR: MARK PLANTE

Students may begin pursuit of a baccalaureate degree in Environmental Science from the University of Montana - Western by following the articulated plan of study given below. Students can move directly into University of Montana - Western's Environmental Science program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE. STUDENTS SHOULD CONTACT ROB THOMAS AT UM-WESTERN FOR POTENTIAL CHANGES: 406-683-7615, r_thomas umwestern.edu

GENERAL REQUIREMENTS:

In addition to completing the program of study given below, to earn the Associate of Science degree with Environmental Science concentration and be able to transfer directly into University of Montana - Western's Environmental science program, the student must achieve a cumulative GPA of 2.0 or above and a grade of "C-" or better in each of the courses required for this program.

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I	3
		AND 1 of the following	
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS – 3 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4
MATH	131**	Precalculus Trigonometry	3
MATH	150**	Math for Liberal Arts	3
MATH	161**	College Algebra w/ Science App	3

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. ENVIRONMENTAL SCIENCE CORE – 20 CREDITS

Course	No.	Title	Credits
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
MATH	181**	Calculus I	4
MATH	216**	Basic Statistics	4
PHIL	201	History & Philosophy of Science	4

III. ENVIRONMENTAL SCIENCE CONCENTRATION – 8-12 CREDITS

CONCENTRATION IN BIOLOGY (12 CREDITS REQUIRED)

Course	No.	Title	Credits
BIO	151*	Molecular and Cellular Biology/Lab	4
BIO	152	Organismal Biology/Lab	4
BIO	280*	Microbiology	4
OR			

CONCENTRATION IN WILDLIFE BIOLOGY (8 CREDITS)

Course	No.	Title	Credits
BIO	151*	Molecular and Cellular Biology/Lab	4
BIO	152	Organismal Biology/Lab	4
OR			

CONCENTRATION IN APPLIED MATHEMATICS (8 CREDITS)

Course	No.	Title	Credits
MATH	182*	Calculus II	4
MATH	260*	Linear Algebra	4
OR			

CONCENTRATION IN ELECTIVES (9 CREDITS)

Course	No.	Title	Credits
ENGL	220	Introduction to Nature Literature	3
GEOL	101	Introduction to Geology	4
HHD	151	Outdoor Winter Rec & Safety	1
HHD	152	Outdoor Summer Rec & Safety	1

TOTAL CREDITS – 59 TO 63~

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.

Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
PARK UNIVERSITY – FINANCE MANAGEMENT
PROGRAM**

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student move directly into Park University's Finance Management program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL
CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval
ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking AND Composition I	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
PSY	109	Lifespan Development	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
MUS	214	World Music	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. FINANCE MANAGEMENT COURSES – 28 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	235*	Marketing	3
CIT	110	Introduction to Computers	3
ENGL	122*	Composition II	3
MATH	216**	Basic Statistics	4
NAS	201N	Montana's American Indians	3
POLS	206	US Government	3

TOTAL CREDITS - 60~

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
PARK UNIVERSITY – HEALTH CARE MANAGEMENT
PROGRAM**

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Health Care Management program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval
ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking AND	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
PSY	109	Lifespan Development	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. HEALTH CARE MANAGEMENT COURSES – 28 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	235*	Marketing	3
CIT	110	Introduction to Computers	3
ENGL	122*	Composition II	3
MATH	216**	Basic Statistics	4
NAS	201N	Montana's American Indians	3
POLS	206	US Government	3

TOTAL CREDITS – 60~

~ Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
PARK UNIVERSITY – HUMAN RESOURCES MANAGEMENT
PROGRAM**

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Human Resource Management program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval
ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	135	Interpersonal Communication AND Composition I	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. HUMAN RESOURCE MANAGEMENT COURSES – 28 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	235*	Marketing	3
CIT	110	Introduction to Computers	3
ENGL	122*	Composition II	3
MATH	216*	Basic Statistics	4
NAS	201N	Montana's American Indians	3
POLS	206	US Government	3

TOTAL CREDITS - 60~

~Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
PARK UNIVERSITY – MANAGEMENT
PROGRAM**

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Management program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

REQUIRED SKILLS:

Completion of:

ACCT 101 Acct Procedures I or instructor approval
ACCT 102* Acct Procedures II or instructor approval

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking AND	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
PSY	109	Lifespan Development	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. MANAGEMENT COURSES – 28 CREDITS

Course	No.	Title	Credits
ACCT	221*	Financial Accounting	3
ACCT	222*	Managerial Accounting	3
BUS	106	Introduction to Business	3
BUS	235*	Marketing	3
CIT	110	Introduction to Computers	3
ENGL	122*	Composition II	3
MATH	216**	Basic Statistics	4
NAS	201N	Montana's American Indians	3
POLS	206	US Government	3

TOTAL CREDITS - 60~

~Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

THIS PROGRAM OF STUDY IS DESIGNED FOR STUDENTS PLANNING TO APPLY TO THE PARK UNIVERSITY – MGT/COMPUTER INFORMATION SYSTEMS PROGRAM

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Management/Computer Information Systems program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE. STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking	3
		AND	
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. MANAGEMENT/COMPUTER INFORMATION SYSTEMS COURSES (15 CREDITS)

Course	No.	Title	Credits
CIT	111	Introduction to Computers for Tech	3
CIT	160*	Introduction to Programming	3
CIT	205*	Database Management	3
CIT	220*	Electronic Spreadsheets	3
CIT	229*	Web Page Construction	3
		Electives (see below)	6
		CIS Electives (see below)	8

ELECTIVES – 6 CREDITS

Course	No.	Title	Credits
BUS	230*	Management	3
BUS	235*	Marketing	3

COMPUTER INFORMATION SYSTEMS ELECTIVES (8 CREDITS)

Course	No.	Title	Credits
CIT	120*	Internet Essentials	2
CIT	126*	Networking Fundamentals	3
CIT	166*	Computer Operating Systems	4
CIT	176*	Introduction to Router Tech	4
CIT	206*	Database Management	3
CIT	210*	Network Operating Systems I	2
CIT	211*	Network Operating Systems II	2
CIT	226*	Switching Basic/Interm Rout	4
CIT	231*	Web Page Design	3
CIT	272*	PC Troubleshooting & Maint	4
CIT	275*	Computer End-User Support	3
CIT	276*	WAN Technologies	4
OO	266*	Microsoft Word	3

TOTAL CREDITS - 61~

~Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

**THIS PROGRAM OF STUDY IS DESIGNED
FOR STUDENTS PLANNING TO APPLY TO THE
MSU BOZEMAN – BSN NURSING
PROGRAM**

This program of study is designed for students planning to apply to the MSU Bozeman BSN Nursing program. Students must earn a grade of 'C' or better in each of the courses with no more than one repeat per course. Students must apply to Montana State University-Bozeman's College of Nursing and go through the placement process. Students apply prior to the end of their freshman year. The deadline for applications is April 30th of each year. Please be advised that not all courses in the Associate of Science Degree are required for entrance into the MSU - Bozeman Nursing program. MSU Bozeman required courses are designated by the following symbol (●).

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT: MSU-Bozeman College of Nursing, Great Falls Campus at 771-4451 or the main campus at 406-994-3783.

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS ●

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I AND 1 of the following	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS – 4 CREDITS ●

Course	No.	Title	Credits
MATH	216**	Basic Statistics	4

HUMANITIES – 3 CREDITS ●

Course	No.	Title	Credits
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3

FINE ARTS – 3 CREDITS ●

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS ●

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	205	Personal Nutrition ●	3
	AND		
CHM	111*	Inorganic Chemistry/Lab ●	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS ●

Course	No.	Title	Credits
PSY	101	General Psychology ●	3
PSY	109	Lifespan Development ●	3

DIVERSITY – 3 CREDITS ●

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. ADDITIONAL REQUIRED COURSES – 19 CREDITS

Those specific to the MSU - Bozeman's Nursing degree are listed below.

Course	No.	Title	Credits
BIO	213	Anatomy & Physiology I/Lab ●	4
BIO	214*	Anatomy & Physiology II/Lab ●	4
BIO	280*	Microbiology & Comm Diseases ●	4
CHM	112*	Organic and Biochemistry/Lab ●	4
SOC	111	Introduction to Sociology ●	3

A student must complete CHM 111 prior to, or concurrently with, Anatomy & Physiology I.

If you are interested in completing an Associate of Science with MSU – Great Falls College of Technology, please contact your program advisor to determine the additional courses needed.

~Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.



Montana State University - Great Falls College of Technology

THIS PROGRAM OF STUDY IS DESIGNED FOR STUDENTS PLANNING TO APPLY TO THE PARK UNIVERSITY – SOCIAL PSYCHOLOGY PROGRAM

Students may begin pursuit of a baccalaureate degree from Park University by following the articulated plan of study below. By completing the plan of study, a student will move directly into Park University's Social Psychology program.

THE INFORMATION ON ALL TRANSFER OPTIONS IS SUBJECT TO CHANGE.
STUDENTS SHOULD CONTACT BETTY DEEB AT PARK UNIVERSITY FOR POTENTIAL
CHANGES: 406-761-7540, BETTY.DEEB@PARK.EDU

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDIT

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
COMM	130	Public Speaking AND	3
ENGL	121**	Composition I	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	130**	Precalculus Algebra	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
PSY	101	General Psychology	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. SOCIAL PSYCHOLOGY COURSES (25 CREDITS)

Course	No.	Title	Credits
CIT	110	Introduction to Computers	3
ENGL	122*	Composition II	3
MATH	216**	Basic Statistics	4
POLS	206	US Government	3
PSY	109	Lifespan Development	3
NAS	201N	Montana's American Indians	3
SOC	111	Introduction to Sociology	3
BUS	230*	Management OR	3
BUS	235*	Marketing	3

TOTAL CREDITS - 57~

~Many students need preliminary math and English courses before enrolling in the program requirements. Students should review their math and English placement before planning out their full program schedule.

TRANSFER CURRICULA



• • • • • Montana State University – Great Falls College of Technology has developed the following curricula in cooperation with the other institutions in this section to assist students in planning a two-year course of study. These programs emphasize particular academic or occupational areas and are recommended to students planning careers and/or further college work in those areas.

Where MSU-Great Falls College of Technology has a formal transfer agreement with another institution, the language “**articulated plan of study**” will appear in the introductory remarks to that plan. The selection of programs is not limited to those listed. Students seeking emphasis in other academic areas are invited to see an academic advisor to explore other options. • • • • •

Montana State University - Great Falls College of Technology

ASSOCIATE OF SCIENCE DEGREE WITH BIOTECHNOLOGY CONCENTRATION TRANSFER TO MSU BOZEMAN – BIOTECHNOLOGY CONCENTRATION

The Associate of Science in Biotechnology Concentration is designed for students interested in a baccalaureate degree in Biotechnology at Montana State University. Students should follow the articulated plan of study given below. The student's education is focused on the basic science necessary for the Biotechnology degree offered through the MSU-Bozeman campus. After completing the AS degree, the student will be on track for transfer to MSU-Bozeman for completion of a baccalaureate degree in Biotechnology. A degree in Biotechnology opens doors for the successful candidate to pursue a career in areas such as industry, research, and development.

THE INFORMATION ON ALL TRANSFER PROGRAMS IS SUBJECT TO CHANGE. STUDENTS SHOULD CONTACT ANDREAS FISHER AT MSU FOR POTENTIAL CHANGES: FISCHER@MONTANA.EDU, 406-994-5908

PROGRAM COURSE REQUIREMENTS:

I. MONTANA UNIVERSITY SYSTEM CORE – 32 CREDITS

COMMUNICATION – 6 CREDITS

(Need 3 writing and 3 verbal credits)

Course	No.	Title	Credits
ENGL	121**	Composition I AND 1 of the following	3
COLS	101	First Year Seminar	3
COMM	130	Public Speaking	3
COMM	135	Interpersonal Communication	3

MATHEMATICS – 4 CREDITS

Course	No.	Title	Credits
MATH	216**	Basic Statistics	4

HUMANITIES/FINE ARTS – 6 CREDITS

Course	No.	Title	Credits
ART	101	Intro to Visual Arts	3
ART	114	Art Fundamentals	3
ART	140	Drawing I	3
DE	161	Introduction to Design	3
ENGL	114	Intro to Literature	3
ENGL	210*	World Literature I	3
ENGL	211*	World Literature II	3
ENGL	217	Creative Writing	3
HUM	242	Gender & Equality	3
MUS	102	Fundamentals of Music	3
MUS	210	Music Appreciation	3
MUS	212	American Music	3
MUS	214	World Music	3
PHIL	101	Introduction to Philosophy	3
PHIL	232	Basic Ethics	3
THEA	101	Intro to Theater/Performing Arts	3

NATURAL SCIENCE – 7 CREDITS

(Must include 1 lab course)

Course	No.	Title	Credits
BIO	103	Introduction to Biology/Lab	4
BIO	107	Fund of Human Biology/Lab	4
BIO	205	Personal Nutrition	3
CHM	111*	Inorganic Chemistry/Lab	4
GEOL	101	Introduction to Geology	4
PHYS	110	Survey of Natural Sciences	4
PHYS	130	Fund Physical Science Lab	4

SOCIAL SCIENCES/HISTORY – 6 CREDITS

Course	No.	Title	Credits
ECON	102	Economics I (Macro)	3
ECON	201	Economics II (Micro)	3
HIST	103N	U.S. History I	3
HIST	104N	U.S. History II	3
HIST	106	History of Western Civ I	3
HIST	107	History of Western Civ II	3
HIST	210N	Montana History	3
PSY	101	General Psychology	3
PSY	109	Lifespan Development	3
SOC	111	Introduction to Sociology	3
SOC	115	Survey of Criminal Justice	3
POLS	206	U.S. Government	3

DIVERSITY – 3 CREDITS

Course	No.	Title	Credits
ANT	101	Intro to Anthropology	3
BUS	249	Global Marketing	3
ENGL	214N	Literature of the West	3
HUM	244	American Cultural Values	3
ML	121	Intro to American Sign Lang	3
NAS	201N	Montana's American Indians	3
NAS	215N	Native American Religious Trad	3

CULTURAL HERITAGE OF AMERICAN INDIANS – 3 CREDITS

Courses with an "N" behind the course title will fulfill the Cultural Heritage of American Indians requirement as well as a designated core area requirement.

II. CONCENTRATION IN BIOTECHNOLOGY – 29 CREDITS

Course	No.	Title	Credits
BIO	151*	Molecular & Cellular Biology	4
BIO	152	Organism Biology	4
BST	101	Introduction to Biotechnology	3
CHM	131*	General Chemistry I	4
CHM	132*	General Chemistry II	4
CIT	110	Introduction to Computers	3
MATH	181**	Calculus I	4
		Electives	3

Students may choose from ANTH, BIO, CHM, GEOL, HUM, MATH (Math 121 or above), PHIL or PHYS to complete the required 3 credits of electives.

TOTAL PROGRAM CREDITS – 61~

~ Many students need preliminary math and English courses before enrolling in the program requirements. These courses may increase the total number of program credits. Students should review their math and English placement before planning out their full program schedule.



COURSE DESCRIPTIONS



Montana State University - Great Falls College of Technology

ACCOUNTING

ACCT 101 ACCOUNTING PROCEDURES I

Credits: 3 (F,S)
Content of the course covers the complete accounting cycle including creating source documents, journalizing transactions, posting to ledgers, preparing worksheets and basic financial statements including the income statement and balance sheet, end-of-period closing activities, payroll and special journals for both service and merchandising businesses. Emphasis is on manual accounting systems.

ACCT 102 ACCOUNTING PROCEDURES II

Credits: 3 (F,S)
Prerequisites: ACCT 101, CIT 110, MATH 104 or concurrent enrollment

This course is a continuation of Accounting Procedures I. Additional topics covered include notes payable and notes receivable, valuation of receivables and uncollectible accounts, valuation of inventories, plant assets and depreciation, partnership accounting, corporate organization, capital stock, worksheets, taxes, dividends, and corporate bonds, statement of cash flows and comparative financial statements. Emphasis is on manual accounting systems.

ACCT 190 PAYROLL ACCOUNTING

Credits: 3 (F,S)
Prerequisites or Co requisites: ACCT 101, CIT 110, MATH 104

Students will become knowledgeable in the payroll records required to comply with various federal and state laws affecting payroll. The Federal Fair Labor Standards Act and the Montana Wage/Hour laws are studied. Students will develop skills in actual payroll preparation. Activities include computing gross salaries, social security, federal and state income tax deductions, journalizing payroll transactions, posting to ledgers and preparation of federal and state payroll tax returns, and reports.

ACCT 221 FINANCIAL ACCOUNTING

Credits: 3 (F,S)
Prerequisites: ACCT 102, MATH 108

This course is an introduction to financial accounting principles. Specific topics studied include generally accepted accounting principles and concepts, the accounting cycle, financial statement preparation, internal controls, cash, short-term investments, receivables, inventory, plant and intangible assets, current and long-term liabilities including present value concepts, corporations and stockholders equity, the statement of cash flows, and financial statement analysis.

ACCT 222 MANAGERIAL ACCOUNTING

Credits: 3 (F,S)
Prerequisite: ACCT 221

This course is an introduction to managerial accounting principles concerned with providing information to managers for use in planning and controlling operations and in decision making. Specific topics studied include manufacturing cost concepts for job and process cost accounting, service department cost allocation, cost-volume-profit analysis, master and flexible budgeting, standard costs and variance analysis, capital budgeting and relevant costs.

ACCT 224 COMPUTERIZED ACCOUNTING

Credits: 3 (F, S)
Prerequisites: ACCT 190, ACCT 221 or concurrent enrollment

Students will complete a variety of accounting projects using microcomputer accounting software.

ACCT 230 IRS VOLUNTEER INCOME TAX ASSISTANCE (VITA)

Credits: 2 (S)
Each student will successfully complete an IRS course on the preparation and electronic filing of both federal and state tax returns using computer software. In addition, each student will be required to work a minimum of 4 hours each week at the IRS VITA site at the Great Falls College of Technology preparing tax returns and performing other administrative tax duties from the beginning of February through the end of tax season on April 15th.

ACCT 231 INCOME TAX FUNDAMENTALS

Credits: 3 (S)
Prerequisites: ACCT 190, ACCT 221

This course introduces students to the basic income taxation principles, concepts, and procedures of individuals, proprietorships, partnerships, and corporations.

ALLIED HEALTH

AH 101 HEALTHCARE DELIVERY IN THE U.S.

Credits: 2 (F)
This introductory course acquaints students with an overall view of the healthcare system. Topics include organization, financing, and delivery of healthcare through various types of facilities, agencies, health organizations, and hospitals. Medical ethics, professional behavior, and patient rights are also covered.

AH 103 FUNDAMENTALS OF HEALTH OCCUPATIONS

Credits: 2 (F, S, SU based on sufficient demand)
Students are introduced to the variety of professions in the healthcare industry and explore basic health care concepts and skills.

AH 108 DISEASE CONCEPTS

Credits: 2 (F, S, SU)
Prerequisites: BIO 107 or BIO 127

This course is designed to provide students in the Health Sciences field with foundational knowledge of the general mechanisms of disease, and the clinical manifestations of disease commonly seen in the health care environment. Disease processes specific to each body system are studied, and treatment interventions and prognosis discussed.

AH 110 EXPLORING COMPLEMENTARY AND ALTERNATIVE MEDICINES

Credits: 2 (F, S, SU)
This course examines the vast selection of therapeutic interventions known as alternative or complementary medicines being presented to today's consumers.

AH 115 HEALTH CARE PERSONNEL AND SUPERVISION

Credits: 2 (S)
Legal requirements, theories, and techniques for supervision at the first- and mid-management level are the topics of this course. Supervision processes, including communicating, organizing, directing, motivating, controlling, and evaluating are assessed for application in healthcare organizations through the use of case studies.

Montana State University - Great Falls College of Technology

AH 116 FIRST AID & CPR

Credits: 1 (F, S, SU based on sufficient demand)
This course is designed so students can receive their Healthcare Provider CPR card. The students will be exposed to adult, child and infant CPR techniques and basic first aid procedures until advanced life support arrives.

AH 120 INTRAVENOUS THERAPY

Credits: 1 (SU)
Prerequisites: Students must be enrolled the last semester of the Practical Nurse program, or be enrolled in the second year of the Respiratory Care program, or obtain instructor approval.

Intravenous Therapy covers IV therapy principles including anatomy of the arm and hand with particular attention to the veins, IV equipment, IV solution flow rates calculation, infection control, potential complications and IV documentation. Each student will perform IV starts on a mannequin arm, and when proficient, initiate IVs on people.

AH 125 FUNDAMENTALS OF FORENSIC SCIENCE

Credits: 2 (SU, Based on Sufficient Demand)
In Fundamentals of Forensic Science, students will examine the philosophical, rational and practical framework that supports a case investigation. The unifying principles of forensic science to the pure sciences will be examined, and students will be introduced to the unique ways in which a forensic scientist must think. Topics will include the experimental method and some of the ways in which a forensic analysis can be confounded. The various forensic science occupations will also be explored.

AH 140 PHARMACOLOGY

Credits: 2 (F,S)
Prerequisite: Successful completion of prerequisite courses for specific programs, or instructor approval.

This course reflects the ever-changing science of pharmacology and responsibilities in administering pharmacological agents. The purpose of this course is to promote safe and effective drug therapy by providing essential information that accurately reflects current practice in drug therapy and facilitating the comprehension and application of knowledge related to drug therapy. Application requires the knowledge about the drug and the patient receiving it. General principles of drug administration, terminology, drug regulation, standard references and legal responsibilities are included as well as major drug classifications and therapeutic implications.

AH 145 INTRODUCTION TO MEDICAL TERMINOLOGY

Credits: 1 (F,S, SU)
This course promotes knowledge of the elements of medical terminology for professional and personal development. Exercises in each unit will stress definitions, spelling, and pronunciation of medical words. The course is designed to build an understanding of the logical method used to form medical terms, including word analysis and word building.

AH 150 FITNESS FOR LIFE

Credits: 2 (F,S)
This course is designed to educate, support, and motivate individuals toward a life-long commitment to physical fitness including nutrition for health and weight management; establishing physical fitness goals; and planning for physical strength improvement and/or maintenance. Exercise laboratory experience allows students to apply physical fitness principles.

AH 185 BASIC MEDICAL TERMINOLOGY

Credits: 3 (F, S, SU)
The goals of this course are to promote knowledge of the elements of medical terminology for professional and personal development, the ability to spell and pronounce medical terms, an understanding of medical abbreviations, and an appreciation of the logical method found in medical terminology. This includes word analysis and word building. Knowledge of terms relating to body structures, positions, directions, divisions and planes will be required. An awareness of current health events is encouraged, as is knowledge of basic scientific and specialty areas in healthcare practice.

AH 194 BASIC PHARMACEUTICALS

Credits: 1 (F, S, SU)
This course provides basic knowledge of the most commonly prescribed pharmaceuticals needed to analyze health care information for various health science support functions. Emphasis is on classification, indications, therapeutic effects, side effects, interactions, and contraindications of new, current, and newly introduced applications of existing medications.

AH 201 MEDICAL SCIENCE

Credits: 3 (F, S)
Prerequisites: AH 185, BIO 127 or BIO 213

This course provides basic knowledge of the most common diseases, anomalies, treatments, and procedures needed to analyze healthcare documentation for various health science support functions including abstracting, coding, transcription, auditing, and reimbursement. Drug classification, diagnostic tests, pathology, laboratory, radiology, nuclear medicine, and ultrasound procedures are also included.

AH 219 NUTRITION AND DIET THERAPY FOR NURSES

Credits: 2 (S)
Prerequisites: BIO 213 or CHM 111

An introduction to basic normal and clinical nutrition. The fundamentals of nutrition and the special nutritional needs throughout the various stages of life will be addressed. The appropriate uses of diet therapy in restoring and maintaining health will also be covered. This class is offered for nursing and pre-nursing students only.

AH 221 HUMAN NUTRITION

Credits: 3 (F,S)
Prerequisite: BIO 213 or CHM 111

This course provides a basic understanding of human nutrition as related to the optimal nutrition, health and well being of the individual and family. This class is offered for students going into a health care field.

ANTHROPOLOGY

ANT 101 INTRODUCTION TO ANTHROPOLOGY

Credits: 3 (F based on sufficient demand)
This course provides an introductory survey of the basic theory and practice of the four classic fields of anthropology: physical anthropology, archaeology, linguistics, and cultural anthropology. The focus of the course is on the evolution of the human species, theories of early culture, reconstruction of the past through archaeological analysis, and structure and usage of language and its relationship to culture. The student will become familiar with the basic concepts of anthropology, its sub-disciplines, methods used to study and understand other cultures, and the general theories of cultures.

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ART

ART 101 INTRODUCTION TO VISUAL ARTS

Credits: 3 (F, S, SU)
This slide lecture course will introduce the students to forms of creative expression within visual arts, encouraging the students to more actively explore art verbally and in written form. The course material will focus on various issues of aesthetic expression rather than the historical development of the arts.

ART 114 ART FUNDAMENTALS

Credits: 3 Studio Course (S)
This course is an exploration of visual concepts through studio projects supplemented by lecture, discussion, and writing assignments. Art fundamentals will be investigated through drawing, color theory, and 3-dimensional processes.

ART 140 DRAWING I

Credits: 3 Studio Course (F, S)
This course introduces the fundamentals of drawing with consideration for line, form, space and perspective in rendering from three-dimensional shapes, still life, landscape or the human form utilizing a variety of drawing materials. Emphasis will be placed on learning to see and render basic shapes, line quality, value, light and shadow, texture, mass, perspective and composition. Students will be encouraged to apply these skills to develop a personal style of drawing.

AVIATION SCIENCE TECHNOLOGY

AST 121 PRIVATE PILOT TO INSTRUMENT PILOT BRIDGE~

THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 2 (F)
Students must be co-enrolled in both AST-141 and AST-143

A reintroduction to basic flight principles and air navigation procedures. Course includes flight aerodynamics, aircraft systems, performance, weight and balance, flight physiology, Federal Aviation Regulations, weather, navigation, and cross country flight planning.

AST 141 AVIATION FUNDAMENTALS ~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (F)
Students must be co-enrolled in both AST-141 and AST-143

Introduction to basic flight principles. Course includes the principles of flight (basic aerodynamics), aircraft systems, performance, weight and balance, aviation physiology, federal air regulations, and flight publications.

AST 142 PRIVATE PILOT FLIGHT ~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 2 (F)
Students must enroll in this course while pursuing a private pilot's license from a flight school of the student's choice. Course credits will be awarded upon receipt of a copy of the student's private pilot certificate proof of 50 hours of flight time and a solo endorsement.

AST 143 BASIC AIR NAVIGATION ~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (F)
Students must be co-enrolled in both AST-141 and AST-143

An introduction to air navigation procedures. Course includes basic meteorology, interpreting weather data pilotage and dead reckoning navigation, radio navigation, and cross country flight planning.

AST 171 AIRCRAFT SYSTEMS FOR PILOTS~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (S)
Prerequisites: AST 141, or consent of instructor

Introduction to basic aircraft systems found on modern single and multi-engine reciprocating aircraft. Topics will include piston engines, electrical systems, hydraulic and pneumatic systems, radios and instruments, propellers, pressurization, maintenance requirements and documentation, and trouble shooting from the cockpit. In this course you will be introduced to the systems commonly found in the training aircraft you are now flying.

AST 241 ADVANCED NAVIGATION SYSTEMS~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (S)
Prerequisites: AST 143, or consent of faculty

Advanced navigation systems includes HSI, RMI, Loran, Doppler, VOR, NDB and GPS. Will include navigation theory, in-flight emergencies, electronic instrumentation, and advanced flight computing problems. Extensive use of in-class computer flight simulation will be exercised. Provides the radio navigation skills necessary for the instrument pilot.

AST 242 INSTRUMENT/COMMERCIAL FLIGHT I ~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 2 (F)
Prerequisites: Private pilot's license

Students must enroll in this course while pursuing the Instrument/Commercial certificate at a flight school of their choice. Credits will be awarded upon production of proof of 75 hours of flight time beyond the private pilot's license.

AST 243 INSTRUMENT/COMMERCIAL THEORY I~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (S)
Prerequisites: AST 142

An introduction to flight under IFR conditions. Course includes basic instrument flying, flight instruments, IFR charts and approach plate, IFR regulations and procedures, ATC clearances and IFR flight planning. Completion of the course will prepare the student for the Instrument Knowledge Exam.

AST 245 INSTRUMENT/COMMERCIAL THEORY II~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (F)
Prerequisites: AST 242, 243

Commercial Flight Maneuvers, Airplane Aerodynamics, Advanced Performance, Power plants (including fuel injection and turbo-charging), Environmental Control Systems and Retractable Landing Gear Systems will be taught. Also, airports (marking and lighting) will be reviewed. Advanced Weight and Balance, and Part 61, 91, 125, and 135 and NTSB 830 Commercial Pilot Regulations will build on the private pilot regulations learned earlier. High Altitude Physiology, and High Performance and Turbine-Aircraft Flight Operations will be emphasized.

AST 250 AVIATION OPERATIONS~ **THIS CLASS OFFERED AT THE COT IN BOZEMAN**

Credits: 3 (S)
Prerequisites: AST 141, AST 143 or consent of instructor

An overview of general aviation operations, specifically the operation and management of the Fixed Base Operation (FBO). This course also covers current events and trends affecting the general aviation industry as a whole.

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AST 252 INSTRUMENT/COMMERCIAL FLIGHT II ~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (F)
Students must enroll in this course while pursuing their Instrument/Commercial certificate at a flight school of their choice. Credits will be awarded upon production of proof of 75 hours of flight time beyond the private pilot's license.

AST 260 FLIGHT INSTRUCTOR THEORY~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (S)
Prerequisites: Commercial Pilot Certificate with an Instrument rating or consent of instructor.

Theory of flight and ground instruction, aircraft performance, analysis of flight maneuvers, and other basic theory as needed by the airplane flight instructor. Prepares the student for the FAA Flight Instructor oral practical test and FAA written test. In-class discussion and presentations will be the main core of the course.

AST 261 AVIATION SAFETY~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (F)
Prerequisites: AST 252

This course will concentrate primarily on the organizations and processes that govern commercial and general aviation safety in the United States. This course will also provide an overview of modern techniques used in accident investigation. Also covered are descriptions of major factors and the causation of aviation accidents.

AST 262 ADVANCED AIRCRAFT THEORY~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (S)
Prerequisites: Private Pilot Certificate and AST 211, or consent of the instructor. Introduction to high performance, multi engine, aerobatic, and tailwheel aircraft; their systems, performance, weight and balance computations, flight procedures, characteristics, and emergencies. Unusual attitude recoveries, IFR and VFR.

AST 263 AVIATION REGULATIONS AND PROFESSIONAL CONDUCT~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (S)
Provides a detailed study of the regulations and procedures common to the aviation industry as well as a survey of the legal environment and the standards of conduct required of professional pilots.

AST 281 CERTIFIED FLIGHT INSTRUCTOR~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 1 (S)
Prerequisites: Commercial Pilot Cert. and concurrent enrollment in AST 260

Students must be enrolled in this course while pursuing their Certified Flight Instructor certificate. Credit for the course will be awarded upon completion of the FAA Certified Flight Instructor Practical Test.

BIOLOGY

BIO 103 INTRODUCTION TO BIOLOGY/LAB

Credits: 4 (3 lecture, 1 lab) (F,S,SU)
This course introduces basic biological principles including the cell, the interrelationship of structure and function, and the characteristics and

classification of living things. Students will examine the five kingdoms of organisms (monera, protista, fungi, plants, animals), concentrating on vascular plants and vertebrate animals, as well as reproduction and basic ecological concepts. This general education course is designed for non-science majors. Laboratory experience will include experimentation, microscope work, observation, and dissection.

BIO 107 FUNDAMENTALS OF HUMAN BIOLOGY/LAB

Credits: 4 (3 lecture, 1 lab) (F,S,SU)
This one-term course covers the basics of human anatomy and physiology. All body systems will be examined. Fundamental principles of cellular chemistry, metabolism, anatomy and biology will be discussed as they relate to the physiology of the human body. This course is designed for specialized endorsements and certificate programs. Completion of this introductory course is highly recommended as preparatory for students planning on entering health science pre-professional programs. Laboratory experience will include experimentation, microscope work, observations, and dissection.

BIO 127 ANATOMY AND PHYSIOLOGY I FOR NON-CLINICAL MAJORS

Credits: 4 (3 lecture, 1 virtual lab) (F,S,SU)
This course is the first in an online, two-course sequence for non-clinical health majors which provides a comprehensive study of the anatomy and physiology of the human body. The course will take a systemic approach covering all body systems. Topics will include structure, function and interrelationships of organ systems. The course will provide a foundation for students entering non-clinical health careers.

BIO 128 ANATOMY AND PHYSIOLOGY II FOR NON-CLINICAL MAJORS

Credits: 4 (3 lecture, 1 virtual lab) (F,S,SU)
Prerequisites: BIO 107 or BIO 127

This course is the second in a two-course sequence for non-clinical health majors. The course will build on the topics explored in the first semester. Body systems will be covered in greater depth, and the focus will be on the interrelationships between systems. In addition to structure and function, an emphasis will be placed on the body processes which maintain homeostasis. The course will take a problem based approach allowing students to use critical thinking skills and apply knowledge from both semesters.

BIO 151 MOLECULAR AND CELLULAR BIOLOGY/LAB

Credits: 4 (3 lecture, 1 lab) (F 2008 based on Sufficient Demand)
Prerequisites: CHM111 or CHM 131

This course is designed to help students understand and apply major concepts in molecular and cellular biology including: biological macromolecules, cell structure and function, major biochemical pathways (cellular respiration and photosynthesis), cell division, Mendelian genetics, modern biotechnology, early development, and major control mechanisms within the body. Students will also examine the scientific method.

BIO 152 ORGANISMAL BIOLOGY/LAB - BIOLOGY II

Credits: 4 (3 lecture, 1 lab) (S 2009 based on Sufficient Demand)
This course is designed to help students understand and apply major concepts in organismal biology including the diversity, evolution, and ecology of organisms. The origin of life and the evolution of cells, classification and evolution of organisms, major domains and kingdoms of life, natural selection and evolution, species diversity, ecosystems organization and energy flow, community interactions, population ecology and behavioral ecology will be discussed. CHM 111 or higher is highly recommended.

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BIO 205 PERSONAL NUTRITION

Credits: 3 (F,S)
To understand the science of human nutrition and apply nutrition and food concepts to the individual during critical stages of the life cycle. To demonstrate the consumer skills needed to achieve optimal nutritional status.

BIO 213 ANATOMY AND PHYSIOLOGY I LECTURE/LAB

Credits: 4 (3 lecture, 1 lab) (F,S,SU)
Recommended Prerequisite: Human Biology (BIO 107) or Inorganic Chemistry (CHM 111)

This course is an integrated study of the human body in which histology, anatomy and physiology of each system is covered. The first semester (part I) of this sequence incorporates molecular, cellular and tissue levels of organization for the integumentary, skeletal with articulations, muscular, and nervous systems. Laboratory experience will include experimentation, microscope work, observations, and dissection.

BIO 214 ANATOMY AND PHYSIOLOGY II LECTURE/LAB

Credits: 4 (3 lecture, 1 lab) (F,S)
Prerequisites: BIO 213 with a grade of "C" or higher

This course is an integrated study of the human body in which the histology, anatomy and physiology of each system is covered. The second part of this two semester course sequence involves the study of the following systems: sensory, endocrine, cardiovascular with hematology, lymphatic with immunology, respiratory, urinary with water, electrolyte and acid base balance, digestive with nutrition and reproductive systems. Laboratory experience will include experimentation, microscope work, observations, and dissection. Upon completion of CHM 111, Anatomy & Physiology I and II, with labs, will transfer to MSU-Bozeman as Anatomy & Physiology I and II.

BIO 255 PRINCIPLES OF GENETICS

Credits: 3 (S based on Sufficient Demand)
Introduction to classical and molecular genetics of eukaryotes, with emphasis on transmission genetics, the structure and regulation of genes, and mechanisms of genetic change.

BIO 280 MICROBIOLOGY AND COMMUNICABLE DISEASES

Credits: 4 (3 lecture, 1 lab) (F,S)
Prerequisites: CHM 111 or BIO 107

Aspects of microbial life are examined in relation to growth requirements, reproduction, and disease-producing capabilities. Topics include basic biochemistry, prokaryotic, and eukaryotic morphology, microbial metabolism, genetics, and classification. In addition to the previous topics, mechanisms of infection, epidemiology, immune response and the major microbial pathogens of the human body will be explored. Emphasis will be placed on the control and spread of microorganisms and disease prevention. This course includes a required lab component.

BIOSCIENCE TECHNOLOGY

BST 101 INTRODUCTION TO BIOTECHNOLOGY

Credits: 3 (F 2008 based on Sufficient Demand)
This course explores the significance of biotechnology in the modern world. Topics include the history and scientific basis of biotechnology, current experimental techniques, applications, and societal issues.

Guest lecturers with expertise in various aspects of biotechnology and examination of current literature relating to biotechnology will be used to supplement the course textbook.

BUSINESS MANAGEMENT

BUS 106 INTRODUCTION TO BUSINESS

Credits: 3 (F,S)
This course provides an overview of business from a broad perspective. Topics covered include business ownership, free enterprise, management, human resources, marketing, finance, and accounting and data systems.

BUS 220 SALES

Credits: 3 (F)
Sales is a course designed to develop students' knowledge of sales practices and procedures and to develop skills in personal persuasion. Topics covered include selling psychology, prospecting, customer relations, approaches, presentation methods, handling objections, and closing techniques.

BUS 230 MANAGEMENT

Credits: 3 (F,S)
Prerequisite: BUS 106
This course is a study of basic management and organizational principles of business firms. Emphasis is on effectively working through others to achieve objectives. This is done by exploring planning, decision making, organizing, leading, staffing, controlling, EEOC requirements, appraising performance, handling disciplinary problems, and stress and time management.

BUS 235 MARKETING

Credits: 3 (F,S)
Prerequisite: BUS 106

This course is designed to develop students' knowledge of marketing terminology and strategies. Subject areas covered include product development, the marketing concept, consumer behavior, research, pricing, channels of distribution, and promotion.

BUS 240 ADVERTISING

Credits: 3 (S)
Prerequisite: BUS 106

This course is designed to acquaint students with the fundamentals and terminology of advertising. Topics covered are the role of advertising, demographic segmentation, advertising psychology, advertising strategies, media strengths and weaknesses, layout and design, and careers in advertising. Class participants will develop their own advertisements using a variety of media.

BUS 249 GLOBAL MARKETING

Credits: 3 (F)
This course will explore the historical and current perspective of international trade focusing on structures, strengths and weaknesses, marketing environment and regulation, currency issues, and factors affecting success and failure in international marketing.

BUS 255 LEGAL ENVIRONMENT

Credits: 3 (F,S)
Prerequisite: BUS 106

This course is designed to increase students' level of awareness of law in the business environment. Topics covered include contract law, sales contracts, agency and employer/employee relationships, torts, securities regulations, antitrust law, and product liability.

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BUS 260 ENTREPRENEURSHIP

Credits: 3 (S)

Prerequisite: BUS 106, BUS 230, BUS 235, ACCT 221 or Instructor consent.

Co requisite: ENGL 228

This course guides students through the development of a business plan, concentrating on market and industry analysis, competitive analysis, site selection, cash flow analysis, marketing, finance, and management. Students will develop a competition quality business plan for a company of their choice. Students should register for both ENGL 228 and BUS 260 in their final semester. On-campus offering of ENGL 228 is recommended for Entrepreneurship students.

BUS 299 COOPERATIVE WORK EXPERIENCE

Credits: Variable (S based on sufficient demand)

Students enrolled in business and technology programs may receive on-the-job training through the cooperative work experience program. Each student will find approved positions that will be supervised by employers and the instructor/coordinator.

CREATIVE ARTS ENTERPRISE

CAE 101 INTRODUCTION TO ARTREPRENEURSHIP

Credits: 3 (F)

This introductory course is designed for anyone interested in developing a career in the creative sector. Besides providing a basic checklist to help the budding entrepreneur, the course provides introductory material and experiences that will help creative's launch and sustain careers in the arts. Included in the class are such topics as a survey of craft, the importance of the artist statement, budgeting for the artist, website site maps, customer profiles, customer support, creative networks, and galleries and museums.

CAE 110 MAKING IT I STUDIO EXPERIENCE

Credits: 3 (F)

In this class, students develop the discipline of their art by tapping into what it takes to sustain a career in fine handcraft. In addition to working in their own studios, students create a body of work in their chosen area of arts and crafts, aided by mentor input. Students are exposed to fundamentals of design, photographing their work, developing a portfolio, creating displays, and telling the story of their craft. The semester's work culminates with the students creating an interpretive display of their work.

CAE 112 CREATIVE TECHNOLOGY

Credits: 2 (S)

The internet is an important tool in expanding markets in fine arts and crafts, in addition to serving as an invaluable tool for researching new information and developing a network with other artisans. Students learn about such topics as navigation on the World Wide Web, e-mail, internet etiquette, and file transfer.

CAE 120 MAKING IT II STUDIO EXPERIENCE

Credits: 3 (S)

Students continue the work of developing the discipline of their art and the development of a body of work in their chosen area of arts and crafts. In addition to working in their own studios, students learn the fundamentals of preparing their work for exhibition, sale, and shipment. The course cultivates creative and critical thinking skills, while mentorships and gallery/museum internships help to provide a valuable experience in the "art of the sale."

CAE 140 COMMUNICATION FOR MARKETING

Credits: 3 (S)

By focusing on communications in marketing, this class will help, in particular, students in creative arts entrepreneurship to develop a better understanding of the effective use of language in the world of business. One-on-one presentations as well as group experiences will provide students with a range of meaningful business communication skills.

CAE 201 CAPSTONE PROJECT

Credits: 2 (SU)

Through the Capstone Project, students have the opportunity to display and sell their work, experiencing both wholesale and retail markets. The emphasis is on the actual experience of implementing what has been learned through the preceding classes.

CAE 235 ARTS MARKETING

Credits: 3 (S)

Designed for the artist in mind, this class is designed to develop students' knowledge of marketing and to allow students the chance to explore the "4 P's" of marketing. This course emphasizes product development, pricing, promotion, distribution, and customer behavior.

CAE 250 CREATIVE ENTREPRENEURSHIP

Credits: 2 (SU)

This course guides the arts and crafts student through the development of their business plan, a step that creates a road map to success by providing a framework for growth and a way to avoid common business pitfalls. Students will learn about a number of topics including market analysis, competitive analysis, finance, and management.

CIVIL ENGINEERING TECHNOLOGY

CET 173 ARCHITECTURAL CONSTRUCTION AND MATERIALS

Credits: 3 (F)

This course is an introduction to construction materials and methods, building systems and construction details. Emphasis is placed on selection of materials and methods. Laboratory section includes site investigations observing materials and their properties

CHEMISTRY

CHM 111 INORGANIC CHEMISTRY/LAB

Credits: 4 (3 lecture, 1 lab) (F, S, SU)

Prerequisite: MATH 103

This course is a survey of the principles of inorganic chemistry with emphasis on scientific measurement; atomic structure; chemical periodicity; chemical bonding and nomenclature; chemical reactions and stoichiometry; gas laws; properties of liquids, solids, and solutions; acid-base chemistry; and some electrochemistry and nuclear chemistry. This course is designed for students entering health science or nursing programs. The laboratory portion of the course provides hands-on experience dealing with the topics covered in the lecture portion. It is strongly recommended that students have good basic algebra skills.

CHM 112 ORGANIC AND BIOCHEMISTRY/LAB

Credits: 4 (3 lecture, 1 lab) (F, S)

Prerequisites: CHM 111 with a grade of "C" or higher

This course is a survey of the principles of organic chemistry and biochemistry with emphasis on nomenclature; structure and classification; properties; and applications of organic and biological

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compounds. Some discussions of metabolism and cellular processes are also included. This course is designed for students entering health science or nursing programs. The laboratory portion of the course provides hands-on experience dealing with the topics covered in the lecture portion.

CHM 131 GENERAL CHEMISTRY I/LAB

Credits: 4 (3 lecture, 1 lab) (F 2008 based on Sufficient Demand)
Prerequisites: MATH 108

The first course in the two-semester general chemistry sequence covering the general principles of modern chemistry. Topics covered include: atomic structure, stoichiometry, chemical reactions, chemical bonding, the periodic table, and the states of matter. The laboratory portion of the course provides hands-on experience dealing with the topics covered in the lecture portion. The experimental nature of the science of chemistry and the mathematical treatment of data are emphasized.

CHM 132 GENERAL CHEMISTRY II/LAB

Credits: 4 (3 lecture, 1 lab) (S 2009 based on Sufficient Demand)
Prerequisites: CHM 131 with a grade of "C" or higher

The second course in the two-semester general chemistry sequence. Topics covered include: solutions, chemical equilibrium, acids and bases, thermodynamics, and kinetics. The laboratory portion of the course provides hands-on experience dealing with the topics covered in the lecture portion.

COMPUTER INFORMATION TECHNOLOGY

CIT 110 INTRODUCTION TO COMPUTERS

Credits: 3 (F,S,SU)
Using both lecture and lab experience, this course introduces the technology and terminology of computer systems and demonstrates how computers have impacted individuals and society. The course also provides instruction in the basics of operating systems and word processing, spreadsheet, and database software.

CIT 111 INTRODUCTION TO COMPUTERS FOR TECHNOLOGY MAJORS

Credits: 3 (F,S)
This course prepares technology students for computer concepts and applications coverage required in their program. Hardware and software concepts, file management techniques, and basic operating systems skills will be covered beyond the end-user level from an information technology support perspective. A hands-on overview using popular microcomputer software provides experience with word processing, spreadsheet and database software.

CIT 120 INTERNET ESSENTIALS

Credits: 2 (F,S,SU)
This course will teach skills in using the Internet as an information and educational resource as well as its impact on global society. Internet components explored will include the World Wide Web, FTP, Email, and basics of creating a web page. Social implications of the Internet and its impact on issues such as copyright and fair use will be explored. Thoughtful examination and research on the future of the Internet will conclude the class.

CIT 125 FUNDAMENTALS OF VOICE AND DATA CABLING

Credits: 3 (F, S, SU)
Fundamentals of Voice and Data Cabling is a lecture and hands on

course which focuses on standards and techniques for structured cabling installation. Students will work with both copper and fiber optic cabling along with tools used to terminate the cables. The emphasis on the skills and knowledge to correctly install cabling within a commercial environment. This course can lead to the Panduit first level installer certification.

CIT 126 NETWORKING BASICS (CCNA 1)

Credits: 3 (F)
Prerequisites: CIT 110 or instructor approval

Networking basics is the first of the four courses leading to the Cisco Certified Network Associate (CCNA) certification. Networking basics is a lecture and hands-on course which introduces Cisco Networking Academy Program students to the networking field. The course focuses on network terminology and protocols, local-area networks (LANs), wide-area networks (WANs), Open System Interconnection (OSI) models, cabling, cabling tools, routers, router programming, Ethernet, Internet Protocol (IP) addressing, and network standards.

CIT 140 PRESENTATION FUNDAMENTALS

Credits: 1 (F,S)
Prerequisite: CIT 110/111

This course is an introduction to the use of presentation software to create and design group presentations and slide shows. Students will be required to create group presentations to be delivered to an audience.

CIT 160 INTRODUCTIONS TO PROGRAMMING

Credits: 3 (F)
Prerequisites: CIT 111, CIT 205, MATH 108 or instructor approval

This course is an introduction to programming logic and computer problem-solving using programming language. Students learn the fundamentals of structured program design. Hands-on emphasis is provided in programming including decision structures, looping structures, and text files. Course work stresses practical application of programming.

CIT 166 COMPUTER OPERATING SYSTEMS

Credits: 4 (F)
Prerequisite: CIT 110/111

This course examines the role of operating system software and various user interfaces. The primary focus will be on using a command line interface for file management tasks as well as creating and troubleshooting batch files. File management, troubleshooting, application, Internet and administrative functions in a graphical interface will also be examined. This course maps to the MCSE/MCSA Exam 70-270 certification.

CIT 176 ROUTERS AND ROUTING BASICS (CCNA 2)

Credits: 3 (F)
Prerequisite: CIT 126

Routers and Routing Basics is the second of four CCNA courses leading to the Cisco Certified Network Associate (CCNA) Certification. Routers and Routing Basics is a lecture and hands-on course which focuses on initial router configuration, Cisco IOS Software management, routing protocol configuration, TCP/IP and access control lists (ACLs). Students will develop skills on how to configure a router, manage Cisco IOS Software, configure routing protocols, and create access list controlling access to the router. This class includes a number of hands-on activities using state-of-the-art routing equipment. After completing this course students are encouraged to take the CCNA Intro Certification exam which is one of two exams leading toward CCNA certification.

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CIT 205 DATABASE MANAGEMENT

Credits: 3 (F,S,SU)
Prerequisite: CIT 110/111

This course covers expert level skills for the Microsoft Office Specialist (MOS) certification in Microsoft Access. Use of application software focuses on data queries (both Query-By-Example and Structured Query Language), report and form generation, multiple table relationships, and interface techniques. Database administration and customization techniques will also be covered.

CIT 206 DATABASE MANAGEMENT II

Credits: 3 (S)
Prerequisite: CIT 205

Database Management II explores database systems through practical database design, implementation and management topics. Basic data modeling concepts will be explored with respect to the major data models: relational, entity relationship model, hierarchical, network, and object oriented. The relational model will be stressed. Students will learn, using normalization techniques, how to avoid Data anomalies. Database implementation and management using Oracle SQL will be covered in depth.

CIT 208 FUNDAMENTALS OF UNIX/LINUX

Credits: 4 (S)
Prerequisite: CIT 110/111, CIT 166

This course will help the student understand the many complex topics of Linux/Unix based systems and help students master Linux network administration. Students will use various learning tools, hands on projects and case projects to allow students to implement the practices they will be learning. This course will help prepare students to successfully complete the CompTIA Linus + exam.

CIT 210 NETWORK OPERATING SYSTEMS I

Credits: 2 (F)
Prerequisite: CIT 111, CIT 166

This course provides students with the knowledge and skills that are required to manage accounts and resources, maintain server resources, monitor server performance, and safeguard data in a Microsoft Windows Server 2003 environment. This course will help the student prepare for the following Microsoft Certified Professional exam: 70-290: Managing and Maintaining a Microsoft Windows Servers 2003 Environment.

CIT 211 NETWORK OPERATING SYSTEMS II

Credits: 2 (F)
Prerequisite: CIT 111, CIT 166, CIT 210

This course provides students with the knowledge and skills to implement, manage, and maintain a Microsoft Windows Server 2003 network infrastructure. The course is intended for systems administrator and systems engineer candidates who are responsible for implementing, managing, and maintaining server networking technologies. These tasks include implementing routing; implementing, managing, and maintaining Dynamic Host Configurations Protocol (DHCP), Domain Name System (DNS), and Windows Internet Name Service (WINS); securing Internet Protocol (IP) traffic with Internet Protocol security (IPSec) and certificates; implementing a network access infrastructure by configuring the connections for remote access clients; and managing and monitoring network access. This course will help the student prepare for the following Microsoft Certified Professional exam: 70-291: Implementing Managing, and Maintaining a Microsoft Windows Server 2003 Network Infrastructure.

CIT 212 NETWORK OPERATING SYSTEMS III

Credits: 2 (S)
Prerequisite: CIT 210, CIT 211

This course provides students with the knowledge and skills necessary to plan and maintain a Windows Servers 2003 network infrastructure. This course is appropriate for individuals employed as or seeking a position as a systems engineer. This course is also appropriate for individuals currently supporting a competitive platform who want to enhance their job skills on Microsoft Windows Server 2003 networking. This course will help the student prepare for the following Microsoft Certified Professional exam: 70-293: Planning and Maintaining a Microsoft Windows Server 2003 Network Infrastructure.

CIT 213 NETWORK OPERATING SYSTEMS IV

Credits: 2 (S)
Prerequisite: CIT 210, CIT 211

This course addresses the MCSA and MCSE skills path for IT Pro security practitioners, specifically addressing the training needs of those preparing for the 70-299 certification exam. The primary product focus is on Microsoft Windows Server 2003 based infrastructure solutions but will include some client focused content where appropriate. This learning product is to provide functional skills in planning and implementing infrastructure security. The course is for a system administrator or system engineer who has the foundation implementation skills and knowledge for the deployment of secure Microsoft Windows Server 2003 based solutions. This course is not intended to provide design skills, but will cover planning skills at a level sufficient to enable section making for the implementation process.

CIT 215 NETWORK OPERATING SYSTEMS V

Credits: 2 (F)
Prerequisite: CIT 210, CIT 211

This course provides students with the knowledge and skills to successfully plan, implement, and troubleshoot a Microsoft Windows server 2003 Active Directory service infrastructure. This course focuses on a Windows Server 2003 directory service environment, including forest and domain structure, Domain Name System (DNS), site topology and replication, organizational unit structure and delegation of administration, Group Policy, and user, group, and computer account strategies. This course is for individuals who are employed or seeking a position as a systems engineer. This course is appropriate for individuals who currently support a competitive platform who want to enhance their skills using Windows Server 2003 Active Directory. This course will help the student prepare for the following Microsoft Certified Professional exam: 70-294: Planning implementing, and Maintaining a Microsoft Windows Server 2003 Active Directory Infrastructure.

CIT 216 NETWORK OPERATING SYSTEMS VI

Credits: 2 (F)
Prerequisite: CIT 210, CIT 211

This course provides students with the knowledge and skills to design a Microsoft Active Directory service and network infrastructure for a Microsoft Windows Server 2003 environment. This course is intended for systems engineers who are responsible for designing directory service and/or network infrastructures. This course will help the student prepare for the following Microsoft Certified Professional exam: 70-297: Designing a Microsoft Windows Server 2003 Active Directory and Network Infrastructure.

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CIT 217 COMPUTER GRAPHIC DESIGN

Credits: 4 (S)
Prerequisite: CIT 110/CIT 111, CIT 120, CIT 229

Among the major responsibilities the web page designer faces are decisions relating to the number, placement, and function of graphics and media on the page or site being designed. This course makes a thorough examination of the strategies leading to an informed decision about graphic and media placement, as well as the tools needed to accomplish the goals of the web steward and designer. Among the tools to be employed are Adobe Photoshop and Macromedia. The overall objective of the course will be an assembly of useful strategies and processes and a firm understanding of the role of graphic design in web presentation.

CIT 220 ELECTRONIC SPREADSHEETS

Credits: 3 (F,S SU)
Prerequisite: CIT 110/111

This course introduces students to business applications using spreadsheets. Emphasis will be placed on the essential functions of spreadsheet operation, as well as an introduction to some advanced spreadsheet features such as lookup functions and list management. This course covers expert level skills for the Microsoft Office Specialist (MOS) certification in Microsoft Excel.

CIT 226 SWITCHING BASICS AND INTERMEDIATE ROUTING (CCNA 3)

Credits: 3 (S)
Prerequisite: CIT 176

This course covers advanced router configurations with both lecture and hands-on activities. Topics include LAN switching, network management, and advanced network design. This course is the third in a four-course series that leads toward certification as a Cisco Certified Networking Associate (CCNA).

CIT 229 WEB PAGE CONSTRUCTION

Credits: 3 (F)
Prerequisites: CIT 110, CIT 120

This course focuses on the skills and concepts necessary to create effective web pages that include links, graphics, sound, tables, forms, and style sheets using common editors. Other utilities, such as image mapping and graphics editing software, will also be examined and utilized.

CIT 231 WEB PAGE DESIGN

Credits: 3 (F)
Prerequisites: CIT 120

This course continues to utilize the skills developed in CIT 229 to build Web pages, concentrating on high profile, advanced applications to develop their craft. Students will research the essentials of good Web design and will master the skills necessary to create their own styles and designs. Management of community client sites will be established and published.

CIT 250 WEB PAGE PROGRAMMING

Credits: 3 (S)
Prerequisites: CIT 229, CIT 231

Among Web page builders and programmers there is a necessity to build pages that include programming to allow interaction between the visitor and the site as well as connectivity to databases that serve the client and site owner. Web Page Programming will explore, examine, and evaluate currently used programming languages that allow Web interactivity and connectivity. Students will be required to design

pages using various languages in ways that lead the mission of the site to its desired outcomes. The overall objective of the course will be an assembly of useful programming tools, processes and examples for the Web designer.

CIT 255 FUNDAMENTALS OF NETWORK SECURITY I

Credits: 3 (F)
Prerequisites: CIT 126, 176, 226, 276 or instructor approval

The Fundamental of Network Security I, focus is on expanding skills learned in CCNA program with primary emphasis on Cisco Router IOS commands used for securing a network. The course is designed to help students to prepare for the Cisco Secur Exam. Topics include access lists, route maps, VPN, CA, IKE and IP Sec, AAA and Tacacs, and CBAC. Students will learn how to best secure, monitor and correct security problems, utilizing an hands-on environment.

CIT 256 FUNDAMENTALS OF NETWORK SECURITY II

Credits: 3 (S)
Prerequisites: CIT 255

This course is a continuation of Fundamentals of Network Security I. The course is designed to help students with the Cisco Advanced PIX Firewall Exam. The students will utilize a PIX Firewall to better secure their network systems. Hardware and IOS are used to secure systems, in a hands-on environment, using the latest technologies available on the market. Students will also gain a better understanding of their legal obligations regarding secure systems.

CIT 272 PC TROUBLESHOOTING/MAINTENANCE

Credits: 4 (F,S)
Prerequisites: CIT 111 or Instructor Approval

The primary purpose of this course is to prepare students to troubleshoot and repair microcomputer systems. This goal is achieved through a three-part effort: (1) theory presentation with regular assessment; (2) hands-on operation and exploration in lab experiments; and (3) troubleshooting applications in the lab. Hands-on training includes servicing microcomputers, identification, installation, and configuration of microprocessors, memory, system boards, power supplies, and floppy and disk drives. The emphasis of this course is both the hardware and operating systems for the CompTia A+ Essentials and IT Technician Certification tests.

CIT 275 COMPUTER END-USER SUPPORT

Credits: 3 (S)
Prerequisites: CIT 166, CIT 272, COMM 135 or instructor approval

This capstone course provides students with experience in training and supporting end users, techniques for developing and delivering training modules, and strategies for providing on-going technical support. Emphasis is on problem solving, such as debugging, troubleshooting and interaction with users. An internship in the second half of the semester will give students firsthand experience with typical problems in the field.

CIT 276 WAN TECHNOLOGIES (CCNA 4)

Credits: 3 (S)
Prerequisite: CIT 226

WAN Technologies is the last of four courses leading to the Cisco certified Network Associate (CCNA) certification. This course is a lecture and hands-on course which focuses on advanced IP addressing techniques (Network Address Translation [NAT], Port Address Translation [PAT], and DHCP), WAN technology and terminology, PPP, ISDN, DDR, Frame Relay, network management, and introduction to optical networking. In addition, the student will prepare to take the CCNA certification examination. This course includes a number of hands-on activities using state-of-the-art networking equipment. After

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completing this course students are encouraged to take either the CCNA ICND certification exam which is the second part of the CCNA certification exam or the all in one CCNA certification exam.

CIT 278 ADVANCED ROUTING (CCNP 1)

Credits: 4 (F)
Prerequisite: CIT 276, CCNA TechPrep or CCNA certification

Advanced Routing is the first of four courses leading to the Cisco Certified Network Professional (CCNP) certification. Advanced Routing is a lecture and hands-on course which teaches students how to design, configure, maintain, and scale routed networks. Students learn to use VLSMs, private addressing, and NAT to enable more efficient use of IP addresses. This course teaches students how to implement routing protocols such as RIP v2, EIGRP, OSPF, IS-IS, and BGP. In addition, this course details the important techniques used for route filtering and route redistribution. After the completion of this class, students are encouraged to take the CCNP Routing (BSCI) certification exam which is one of the certification exams leading to the CCNP certification.

CIT 279 REMOTE ACCESS (CCNP 2)

Credits: 4 (F)
Prerequisite: CIT 276, CCNA TechPrep or CCNA certification

Remote Access is the second of four courses leading to the Cisco Certified Network Professional (CCNP) certification. Remote Access is a lecture and hands-on course which introduces students to the implementation of Cisco routers in WAN application. The course focuses on the selection and implementation of appropriate Cisco IOS services required to build intranet remote access links. Students will develop skills with the specific WAN Technologies of analog dialup, ISDN BRI and PRI, Frame Relay, broadband, and VPN. After the completion of this class, students are encouraged to take the CCNP Remote Access certification exam (BCRAN) which is one of the certification exams leading to the CCNP certification.

CIT 280 DESKTOP PUBLISHING

Credits: 3 (S)
Prerequisite: CIT 110/111

Students learn to design, prepare, edit, and enhance publications by integrating text, graphics, spreadsheets, and charts that have been created in other software programs. They build skills in using a desktop publishing software program by creating publications such as newsletters, brochures, advertisements, programs, business cards, and stationery.

CIT 281 MULTILAYER SWITCHING (CCNP 3)

Credits: 4 (S)
Prerequisite: CIT 276 or instructor approval

Multilayer Switching is the third of four courses leading to the Cisco Certified Network Professional (CCNP) certification. Multilayer Switching is a lecture and hands-on course which introduces students about the deployment of the state-of-the-art campus LANs. This course focuses on the selection and implementation of the appropriate Cisco IOS services to build reliable scalable multilayer-switched LANs. Students will develop skills with VLANs, VTP, STP, inter-VLAN routing, redundancy, Cisco AVVID, QOS issues, campus LAN security, and transparent LAN services. After the completion of this class, students are encouraged to take the CCNP Switching certification exam (BCMSN) which is one of the certification exams leading to the CCNP certification.

CIT 282 NETWORK TROUBLESHOOTING (CCNP 4)

Credits: 4 (S)
Prerequisite: CIT 278, CIT 279 and CIT 281

Network Troubleshooting is the last of four courses leading to the Cisco Certified Network Professional (CCNP) certification. Network Troubleshooting is a lecture and hands-on course which teaches students techniques for troubleshooting various network problems. This course focuses on the documenting and baselining of networks, troubleshooting methodologies and tools, and OSI Layers 1 to 7 network diagnostics. After the completion of this class, students are encouraged to take the CCNP Network Troubleshooting certification exam (CIT) which is one of the certification exams leading to the CCNP certification.

CIT 283 FUNDAMENTALS OF WIRELESS LANS

Credits: 3 (S)
Prerequisite: CIT 176 or CCNA 2 Techprep

The Fundamentals of Wireless LANs is an introductory course which focuses on the design, installation, configuration, operation, and troubleshooting of 802.11a, 802.11b, and 802.11g Wireless LANs. This course is a comprehensive overview of wireless technologies, devices, security, design, and best practices with a particular emphasis on real work applications and skills. Students will be doing a number of hands-on activities using Cisco wireless access points, NICs, and bridges.

CIT 287 IP TELEPHONY

Credits: 3 (F,S)
Prerequisite: CIT 276 or instructor approval

IP Telephony is an introductory course into the technology and equipment used to provide telephone services by using LAN and WAN based technologies. Students in this highly hands-on course will develop voice over IP (VoIP) networks using the application software, protocols and equipment used in implementing IP telephony in both small and large businesses.

CIT 295 CURRENT TOPICS IN NETWORK OPERATING SYSTEMS

Credits: Variable (S, F based on sufficient demand)
Prerequisite: CIT 126, CIT 210, CIT 211 or instructor approval

This course provides students with supporting knowledge and advanced skills required to set up, configure, use, and support network operating systems. This course also helps prepare the student to meet requirements to become a certified professional. Topics vary and will be determined by industry changes, technological advances, and student interest.

CONSTRUCTION

CNST 109 BLUEPRINT READING

Credits: 2 (F)

This course will introduce blueprints and emphasize reading and interpreting welding symbols. Topics covered include basic blueprint reading for welders; basic lines, basic views, title block information, dimensions, structural shapes, auxiliary views, section views, detail prints, welding symbols and other various blueprint information.

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COLLEGE STUDIES

COLS 100 INTRODUCTION TO COLLEGE

Credits: 3 (F,S)
Pass/Fail Basis

The course is designed to help freshmen make a smooth transition to college life and to help students maximize their potential in all courses.

COLS 101 FIRST YEAR SEMINAR

Credits: 3 (F)
This course serves as an introduction to college level critical thinking based on the central theme determined each semester. A cross-disciplinary approach will study the chosen theme through the lenses of areas such as biology, culture, literature, and history both in the classroom and beyond in field trip experiences. Potential themes include (but are not limited to) the Missouri River, the classic world, and the college experience. Individual participation in writing and the spoken word are encouraged by the small class size.

COMMUNICATION

COMM 130 PUBLIC SPEAKING

Credits: 3 (F,S,SU)
Public Speaking is a course designed to aid students in overcoming speech anxiety through preparation and presentation of speeches in a variety of formats.

COMM 135 INTERPERSONAL COMMUNICATION

Credits: 3 (F,S,SU)
This course is designed to show some of the difficulties that language and understanding present us. It is concerned with better understanding of ourselves and our semantic and interpersonal environments. It attempts to develop meaningful, effective, and sensitive means of relating to others. Varied group experiences and oral presentations provide students the opportunity to explore current topics.

DENTAL ASSISTANT

DA 115 HEAD, NECK AND ORAL ANATOMY

Credits: 4 (F)
The majority of this course includes content in head, neck and dental anatomy. Oral tissue embryology and histology and general human anatomic and physiologic concepts are introduced by the instructor. Tooth numbering systems and cavity classifications are emphasized as a supplement to the dental anatomy portion. Students successfully completing this course will be able to apply basic oral anatomic theory to laboratory and clinical settings.

DA 118 DENTAL OFFICE MANAGEMENT

Credits: 2 (F)
This course exposes students to various reception procedures and dental practice management responsibilities commonly expected in a professional dental office. Students will learn the fundamentals of computer use in the dental practice by utilizing a dental office software package. Skills include creating patient records and a database to set up patient accounts, schedule appointments, bill patient and third parties, and process payments and reports. HIPAA regulations and other legal expectations within the healthcare field will also be discussed. This course is offered in hybrid format with both on-line and on-site requirements.

DA 120 ORAL RADIOLOGY/RADIOGRAPHY I

Credits: 3 (F)
This course is the first of a series of two courses and includes both didactic and laboratory instruction. Content in this course includes the history of oral radiography, radiation, physics, x-ray equipment supplies and darkroom procedures, infection control practice, intraoral technique, biological effects of radiation, radiation protection and anatomic landmark identification and mounting. The practical component applies radiographic theory and technique in practice.

DA 121 ORAL RADIOLOGY/RADIOGRAPHY II

Credits: 2 (S)
Prerequisite: DA 115, DA 120
Oral Radiology/Radiography II includes didactic, laboratory, and clinic instruction. Content in this course emphasizes extraoral, and perfection of intraoral techniques, quality assurance in radiography, radiograph interpretation and assessment, and application of theory in the lab/clinic setting. A student satisfies the practical portion of this course by successfully performing both paralleling and bisecting intraoral periapical techniques, by exposing horizontal, vertical, pedodontic, and anterior bitewings, exposing occlusal radiographs, and demonstrating proper panoramic exposure. Other content sections include biological effects of radiation, radiation protection, specialty techniques, identification and correction of faulty radiographs, and digital radiography. Students are expected to obtain their own prescription patients for final full mouth series. Dental assistant program students will be prepared to sit for the oral radiology component of the Dental Assisting National Board (DANB) examination upon successful completion of this course.

DA 123 CHAIRSIDE THEORY AND PRACTICE I

Credits: 4 (F)
The Chairside I course covers aspects of the clinical dental assistant's duties in a general dental practice. It includes instruction in dental instruments, equipment, materials, and basic laboratory and chairside procedures (including patient relations and charting methods). Oral anesthesia theory is an additional component. Infection control theory, including microbiology, and practice are heavily emphasized throughout this course.

DA 124 CHAIRSIDE THEORY AND PRACTICE II

Credits: 4 (S)
Prerequisite: DA 115, DA 123
Chairside II is a continuation of Chairside I and includes lecture, laboratory and clinical sessions. Content includes emphasis on aesthetic restorative procedures, rubber dam concepts, coronal polishing, pit and fissure sealant placement, fluoride treatments, and fabrication and placement of temporary crowns and restorations.

DA 150 DENTAL SCIENCES/PREVENTIVE DENTISTRY

Credits: 4 (S)
Prerequisite: DA 115, DA 123
This course includes the study of the oral plaque diseases and their prevention as well as an introduction to the science-based subjects of oral pathology, pharmacology, nutrition, and medical emergencies. Focus will be on the theory of the oral plaque diseases processes, the identification of associated pathologies, and the prevention of the diseases. Specific content areas also include drug classifications and interactions, fluoride, oral hygiene technique, and patient education.

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DA 165 DENTAL SPECIALTIES

Credits: 3 (S)
Prerequisites: DA 115, DA 123

The clinical specialties course includes an introduction to six dental specialties: periodontics; endodontics, fixed and removable prosthodontics, oral surgery, pediatric dentistry and orthodontics. It includes theory in the individual specialties along with procedure set-ups (armamentarium), materials used, and instrumentation. The student will also apply the knowledge in a laboratory procedures setting.

DA 190 CLINICAL OFFICE PRACTICE AND SEMINAR

Credits: 7 (SU)
Prerequisites: Program director approval required to enroll.

This is the capstone course for the program and requires the student to integrate and apply all dental concepts from earlier coursework in the clinical setting. It involves rotated extramural clinical office experience in the dental community where students actively participate in the operation of the dental practice as dental assistants in training. The on-line component of the course introduces a student to job search strategies and preparation of personal resumes and cover and follow-up letters. Interview techniques are also incorporated. This course is offered in hybrid format having both on-line and on-site requirements.

INTERIOR DESIGN

DE 161 INTRODUCTION TO DESIGN

Credits: 3 (F)

This course introduces design as it relates to interior design, architecture and related professions, through the study of the elements and principles of design and the ways in which humans interact with designed environments and elements.

DE 162 INTERIOR DESIGN GRAPHICS

Credits: 3 (F)

This course provides interior design students with a basic knowledge of building structures, construction techniques, and building materials. It introduces the technical skills needed to read and produce drawings used in the practice of interior design, including floor plans, interior elevations, reflected ceiling plans, and section drawings.

DE 163 PRESENTATION DRAWING

Credits: 3 (S)

Prerequisite: DE 162 or equivalent

This course presents the elements of two- and three-dimensional design as related to interior representational drawings. Emphasis is on one- and two-point perspective drawings. Addition of color to drawings by use of marker and colored pencil is introduced.

DE 164 HISTORIC INTERIORS

Credits: 3 (F)

This course offers exposure to stylistic variations found in interior design of the ancient world and traditional Europe. Students will become aware of how these styles have been the impetus for pre-1900 architecture and decorative arts in America.

DE 165 CONTEMPORARY INTERIORS

Credits: 3 (S)

Prerequisite: DE 164

This course is a continuation of the study of the development of the interior environment from the 19th century to the present. The

difference in the basic philosophy between 19th and 20th century design is emphasized.

DE 166 TEXTILES AND INTERIOR FINISHES

Credits: 3 (F)

This course includes the study of textiles used by interior designers, including their fiber content, yarn type, characteristics, construction, selection, cost, performance and maintenance. Students will gain familiarity with a wide range of textile products used in both residential and commercial interiors, including materials for walls, flooring, ceiling, and furnishings.

DE 168 SPACE PLANNING

Credits: 3 (S)

Prerequisites: DE 161, DE 162

This course explores the physical and psychological concepts pertaining to interior spaces. Students work with commercial design programs, schematic planning tools, contract furniture, and barrier-free concepts to create functional space plans that meet program criteria. There is also emphasis on kitchen and bath space planning guidelines.

DE 261 FIELD STUDY

Credits: 3 (F)

Prerequisite: Completion of all 100-level technical courses or consent of instructor

This course gives students experience in the daily operation of an interior design firm or a related business. It provides experience in dealing with employers, clients, customers and other business persons. Students will encounter opportunities to utilize skills and knowledge acquired in previous interior design courses.

DE 262 STUDIO I

Credits: 4 (F)

Prerequisite: Completion of all 100-level technical courses

This course is a laboratory experience with a real-life design project. Students will develop a complete presentation including floor plans, interior elevations, interior perspectives, color board and room finish schedule. Students will make an oral presentation to their clients using the presentation boards to illustrate their design solutions. Emphasis is on residential design.

DE 263 STUDIO II

Credits: 4 (S)

Prerequisite: Completion of all 100-level technical courses and DE 262

Studio II is an advanced laboratory experience with a more complex real-life case study. Students will develop a complete presentation. Emphasis is on contract (commercial) design.

DE 264 LIGHT, COLOR, AND LIGHTING SYSTEMS

Credits: 3 (S)

Prerequisite: DE 161, DE 162

This course is an introductory study of color theory, including human response to color. It covers the effects of various sources of lighting on color and the basic considerations when selecting lamps and fixtures. Design of lighting systems to obtain desired foot-candle levels and illumination quality is included.

DE 265 PROFESSIONAL PRACTICES

Credits: 3 (S)

Prerequisite: Completion of all 100-level technical courses, DE 262

This course is an introduction to business principles and practices

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related to the interior design profession. Topics include business procedures, methods of charging, and steps involved in business formation. Use of contracts and specifications to achieve desired objectives is covered, as is marketing of professional services and promotion of the firm. A portfolio, resume and cover letter will be completed during this class.

DE 267 ARCHITECTURAL CAD

Credits: 3 (F)
This course focuses on the application of AutoCAD to the creation of a set of residential construction drawings. Topics covered include drawing set-up, creation and plotting.

DE 270 KITCHEN AND BATH I

Credits: 3 (F)
Prerequisite: Completion of all 100-level technical courses.

Using the National Kitchen and Bath Association guidelines, students will learn the fundamentals of kitchen and bath design, using NKBA's drawing and presentation standards. Analysis of client needs, specifying products, creating design solutions, residential plumbing and mechanical systems, project drawing and documentation will also be covered.

DE 271 KITCHEN AND BATH II

Credits: 3 (S based on sufficient demand)
Prerequisite: DE 270

This studio course is a continuation of Kitchen and Bath 1, with emphasis on bath design, further exploration into products, and more advanced design solutions.

DENTAL HYGIENE

DH 101 INTRODUCTION TO DENTAL HYGIENE/PRECLINIC

Credits: 2 (F)
An introductory course in preoperative and clinical dental hygiene concepts. The assessment phase of patient care as well as the theory of basic dental hygiene instrumentation will be emphasized.

DH 102 INTRODUCTION TO DENTAL HYGIENE/PRECLINIC LAB

Credits: 2 (F)
This course enables students to perform clinical dental hygiene procedures explored in DH 101. The basic clinical skills used during patient assessment and basic dental hygiene instrumentation will be emphasized.

DH 111 INFECTION CONTROL AND DISEASE PREVENTION

Credits: 2 (F)
This course introduces the infection and hazard control procedures necessary for the safety of dental professionals and their clients during the practice of dentistry. Topics include microbiology, practical infection control, sterilization and monitoring, chemical disinfectants, aseptic techniques, infectious diseases, and OSHA standards.

DH 118 ORAL ANATOMY FOR HYGIENISTS

Credits: 3 (F)
The majority of this course includes content in head, neck, and dental anatomy. Oral tissue embryology, histology, and physiology are also introduced and general anatomical concepts are reviewed by the instructor. Anatomic design and tooth numbering systems are

emphasized as a supplement to the dental anatomy portion. Students successfully completing this course will be able to apply basic oral anatomic theory to laboratory and clinical settings.

DH 122 ORAL RADIOLOGY/LAB

Credits: 3 (S)
This course provides a basic understanding of the fundamentals of dental radiology including processing image receptors, and production of x-rays. Emphasis is placed on radiation biology and hygiene. Hands-on experience with both traditional and digital radiographic techniques utilizing mannequins to develop skills in exposing and processing radiographs as well as providing experience in interpreting actual radiographs. Introduction to interpretation of radiographs for exposure and processing errors as well as normal radiographic anatomy and common diseases of the teeth and bones will also be studied

DH 123 RADIOGRAPHIC INTERPRETATION

Credits: 1 (S)
This course is a continuation of DH 122; Oral Radiology. The course will provide the skills needed to properly interpret and read what is revealed by a radiograph. Interpretation is an explanation of what is viewed on a radiograph. Proper interpretation of dental radiographs can function as a diagnostic and educational tool for treatment planning.

DH 130 DENTAL MATERIALS

Credits: 2 (F)
Materials most often used in dentistry are studied, focusing on the characteristics, physical properties, instruction on manipulation, and practical application of each material. Safety precautions relating to each material and procedure are emphasized.

DH 150 CLINICAL DENTAL HYGIENE THEORY I

Credits: 2 (S)
This course includes basic theory in the practice of dental hygiene. Topics include deposit/removal, patient education, fluorides, planning for dental hygiene treatment, including responding to medical/dental emergencies; charting and clinical records and procedures.

DH 151 CLINICAL DENTAL HYGIENE PRACTICE I

Credits: 4 (S)
Practice in beginning instrumentation and patient assessment in providing an oral prophylaxis, to accompany DH 150.

DH 160 PERIODONTOLOGY I

Credits: 3 (S)
An introduction to the science and management of periodontal diseases. Emphasis on the etiology and classification of the disease, along with an overview of the anatomy and histology of periodontal structures and dental accretions. The dental hygienists role in the recognition, prevention, and therapeutic procedures of the disease will be explored. This course will correlate theory with clinical activities in DH 151.

DH 165 ORAL EMBRYOLOGY AND HISTOLOGY

Credits: 2 (S)
A study of tissue morphology, embryonic development, and histologic features of the face and oral cavity.

DH 201 PERIODONTOLOGY II

Credits: 2 (SU)
This course is a continuation of DH 160; Periodontology I. The course is an advanced study of periodontology with special emphasis on various treatment modalities and their rationale in clinical dentistry. The course will include discussion on periodontal disease progression,

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treatment plan sequence, instrumentation and antimicrobials used to decrease periodontal disease progression, treatment plan sequence, instrumentation and antimicrobials used to decrease periodontal pocket depth. This course will correlate with DH 210 and DH 211.

DH 210 CLINICAL DENTAL HYGIENE THEORY II

Credits: 2 (SU)

A continuation of DH 150, this course increases the emphasis on the principles of instrumentation in periodontal therapy. Topics will include ultrasonic scaling, air polishing, and effective ergonomic principles. Students will be introduced to the professional portfolio process and selection of case patient. Theory background is used to support activities in DH 211.

DH 211 CLINICAL DENTAL HYGIENE PRACTICE II

Credits: 4 (SU)

A continuation of DH 151, this course provides additional practical experience in clinical patient treatment with an emphasis on early periodontal disease and subgingival deposits. Offered in conjunction with DH 210.

DH 215 GENERAL AND ORAL PATHOLGY

Credits: 3 (F)

Pathology is the science that studies diseases. This course will present various pathologic processes; including pathogenesis, etiology, inflammation, tumor development, systemic manifestations, and developmental disturbances. This course emphasis is the study of oral diseases and the recognition of their conditions. Students will utilize this information during their clinical practice.

DH 220 DENTAL NUTRITION HEALTH

Credits: 3 (F)

Prerequisite: BIO 213 or CHEM 111

Note: Enrollment limited to hygiene students.

To understand the science of human nutrition and the application of basic nutrition principles to achieve optimal nutritional status throughout the life cycle. To understand the impact of nutrition on oral health and the impact of oral health on nutritional status. Enrollment limited to dental hygiene students and students with instructor permission.

DH 230 COMMUNITY DENTAL HEALTH AND EDUCATION

Credits: 2 (S)

A presentation of various methods and material used in community dental health education. The course provides an understanding of basic research and statistical concepts needed for sound community health practices. Emphasis on the use of evidenced based philosophy for acquiring, assessing, interpreting, critically analyzing, and incorporating scientific literature into community health practices. Field assignments in selected social settings and projects will encourage student participation in community dental health care.

DH 235 PROFESSIONAL ISSUES & ETHICS IN DENTAL PRACTICE

Credits: 2 (S)

A study of the legal restrictions and ethical responsibilities associated with the practice of dental hygiene and dentistry.

DH 240 LOCAL ANESTHESIA

Credits: 2 (S)

An integration of anatomy, physiology, and an introduction to pharmacology and emergency procedures as they relate to the

administration of local anesthesia. Selection of proper anesthetic solutions to facilitate pain management and their specific related needs. Laboratory sessions are integrated with didactic material to develop competency in administering local anesthetic.

DH 241 GERONTOLOGY & SPECIAL NEEDS PATIENTS

Credits: 2 (F)

This course provides preparation for clinical experience when designing treatment for the geriatric and special needs patient. Innovative patient management and counseling will be included.

DH 250 CLINICAL DENTAL HYGIENE THEORY III

Credits: 1 (F)

A continuation of DH 210, this course expands beyond the basic concepts of dental hygiene theory with exposure to more difficult oral conditions and various modes of treatment. Topics include: effective patient communication, cultural diversity, dental hygiene diagnosis, dental hygiene process of care, nonsurgical periodontal therapy, root morphology and advanced instrumentation. Students will be required to continue formulation of the case paper. Theory background is used to support all clinical activities in DH 251.

DH 251 CLINICAL DENTAL HYGIENE PRACTICE III

Credits: 5 (F)

A continuation of DH 211, this course provides clinical activities with increased patient difficulty exhibiting moderate to advanced periodontal involvement and moderate deposits along with increased patient load. This course is offered in conjunction with DH 250.

DH 280 CLINICAL DENTAL HYGIENE THEORY IV

Credits: 1 (S)

A continuation of DH 250, this course includes advanced Dental Hygiene theory that will increase the student's knowledge of the profession. Emphasis is directed toward dental hygiene process of care, treatment planning and client case presentation. Considerable attention is also spent in the areas of practice management and professional development. Theory background is used to support all activities in DH 281. In addition, this class will provide preparation for State and Regional Board Examinations.

DH 281 CLINICAL DENTAL HYGIENE PRACTICE IV

Credits: 5 (S)

A continuation of DH 251, this course provides multiple clinical activities focused in time management, increased periodontally involved clients and satisfactory completion of skill assessments. The course will challenge the student's critical thinking to design a personal learning contract to reflect their needs for successful completion. In addition this course will offer opportunities for the student to participate in various off-campus experiences. This course is offered in conjunction will DH 280.

DRAFTING

DRFT 131 TECHNICAL GRAPHICS I

Credits: 4 (F)

Emphasis in this course is placed on knowledge and skills needed to produce drawings and understand basic drafting theory. Topics developed on the board include sketching, lettering, instruments, scaling, applied geometry, orthographic projection, dimensioning, applied technical mathematical relations, primary auxiliary views, sections, threads, and weld symbols.

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DRFT 132 DESCRIPTIVE GEOMETRY

Credits: 3 (S)

Prerequisite: DRFT 131, or instructor approval.

Advanced theory and practices in descriptive geometry construction and pattern development are covered in this course in preparation for advanced courses in Design Drafting.

DRFT 156 INTRODUCTION TO CAD

Credits: 3 (S)

A systems-oriented course is designed to introduce students to the concepts, techniques, and applications of PC-based computer-aided drafting that will allow them to create drawing files and download files for hard copies. Command structure, coordinate systems, text dimensions, and plotting will be covered.

DRFT 201 RESIDENTIAL DRAFTING

Credits: 3 (F)

Prerequisite: DRFT 132

The development of the principles in construction drawings of an average wood frame residential structure is the basis of this course. A complete set of working drawings will be developed.

DRFT 205 MACHINE DRAFTING

Credits: 3 (S)

Prerequisite: DRFT 131

This course is a study and application of standards used for producing working drawings, including the fundamentals of geometric dimensioning and tolerance. Both detail and assembly drawings will be produced.

DRFT 242 BLUEPRINT READING AND MATERIAL ESTIMATION

Credits: 3 (S)

This is an introduction to print reading and material estimation. Students will interpret and visualize construction drawings and do material estimation on a couple of small residential projects.

DRFT 244 TOPOGRAPHIC MAPPING AND GIS APPLICATIONS

Credits: 3 (S)

Prerequisite: DRFT 156, CIT 205

Fundamentals of mapping and geographic information systems (GIS). Includes applications of mapping projections, presentations of surveying information, and GIS methods. Mapping and GIS computer applications will be used and developed throughout the course.

DRFT 246 MANAGING THE CONSTRUCTION PROCESS

Credits: 3 (S)

Introduction to all areas construction management, combining the processes of: estimating, scheduling and/or control. Students gain knowledge of the building industry as a whole, as well as, the technical skills to manage a construction project.

DRFT 256 3D CAD

Credits: 3 (F)

Prerequisite: DRFT 156

This is a study in advanced CAD concepts and procedures to develop three-dimensional wireframe models. Emphasis will be on the creation and use of 3D primitives, surface modeling, basic solids modeling, shading techniques, and the use of animation software. Exercises will include rendered output.

ECONOMICS

ECON 102 ECONOMICS I (MACROECONOMICS)

Credits: 3 (F based on sufficient demand)

This course presents the principles underlying the operation of a macroeconomic system through the study of the national and world economies as a whole. Topics explored include gross domestic product, full employment, economic growth, surplus and deficits, income distribution, balance of trade, protectionism, government policies, and international trade.

ECON 201 ECONOMICS II (MICROECONOMICS)

Credits: 3 (S based on sufficient demand)

This course examines the subsystems of the economy such as the economics of the individual, the firm, and the industry. Study includes analysis of the pricing mechanism of the economy and the theories of income distribution.

EDUCATION

EDUC 201 INTRODUCTION TO THE EDUCATIONAL EXPERIENCE

Credits: 3 (F, S, SU)

This class explores the profession of teaching by connecting theory to real-life experiences in the field. Students will cover the development of students, diversity, learning strategies, motivation, classroom management, assessment of learning, and construction of a professional portfolio through seminar discussions, in school observations, interviews, and personal reflection.

EDUC 240 INSTRUCTIONAL TECHNOLOGY

Credits: 3 (S)

Prerequisite: CIT 110, challenge exam, or instructor approval

Prospective teachers are introduced to the uses of technology to enhance the education experience. Students will learn to use media software common in educational settings for a variety of instruction purposes.

EDUC 260 MULTICULTURAL EDUCATION

Credits: 3 (S)

This course helps current and future teachers reflect on their own heritage and how it relates to people of other economic, social cultural, ethnic, gender, religious, and sexual orientation groupings. An emphasis is placed on democratic community building in a multicultural society.

EDUCATIONAL PSYCHOLOGY

EDPY 220 EDUCATIONAL PSYCHOLOGY

Credits: 3 (F, S based on sufficient demand)

This course explores the physical, psychological, and cognitive development in students of all ages within the contexts of education, family, and society. Emphasis is given to applying brain-based research, stages of learning, and psychological factors influencing the learning process to classroom management and educational evaluation.

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ELECTRICAL, ELECTRONICS & ENGINEERING TECHNOLOGY

EET 110 ELECTRONICS SURVEY I

Credits: 3 (S)
This course presents an introduction to basic concepts and terminology of electronics for the non-electronics major. Topics start with electricity and continue through everyday commercial and home applications.

EMERGENCY MEDICAL SERVICES

EMS 102 FUNDAMENTALS OF ADVANCED CARE

Credits: 3 (F)
Prerequisite: Consent of faculty required.

This course provides an introduction to the practice of paramedicine and will provide the student with information regarding preparatory divisions the pre-hospital environmental, medical-legal issues, and general principles of pathophysiology.

EMS 105 EMT-PARAMEDIC I

Credits: 3 (F)
Prerequisite: Instructor approval required

Note: Formal acceptance into EMT-P program

This course will provide the student with reinforcement and new information concerning pre-hospital environment, pharmacology, airway management, intravenous therapy, and trauma.

EMS 110 EMT-PARAMEDIC I/II SKILLS LAB

Credits: 2 (F)
Prerequisite: Instructor approval required

Note: Formal acceptance into EMT-P program

This course provides the student with laboratory experience in the areas of assessment, physical examination, history gathering, basic and advanced airway management skills, pharmacology and the initiation and management of fluid therapy.

EMS 115 EMT-PARAMEDIC II

Credits: 3 (F)
Prerequisite: Instructor approval required.

Note: Formal acceptance into EMT-P program

This course builds upon the instructional imperatives of Paramedic I and introduces the student to various systematic medical emergencies (e.g., respiratory, cardiovascular, endocrine, and nervous system emergencies).

EMS 120 EMT-PARAMEDIC I/II CLINICAL AND FIELD INTERNSHIP

Credits: 3 (F)
Prerequisite: Instructor approval required, EMS 110, 115 with a grade of "C" or higher

The clinical and field internship experience allows the student to integrate knowledge and skills from the classroom setting into actual patient care in the hospital and field domain. A student must receive a grade of "Pass" in the clinical and field internship course or will be required to repeat EMS 110 and EMS 115.

EMS 130 FIRST RESPONDER

Credits: 3 (Under Review)
Prerequisite: Must be 18 years of age to take certification examination

This course is the nationally recognized emergency medical entry level to the emergency services industry. The course provides didactic and practical experience concerning initial assessment and immediate management of trauma and medical patients. Successful course completion will allow the student to enter the Montana First Responder authorization process. All aspects of authorization/certification are the responsibility of the student.

EMS 137 EMERGENCY MEDICAL TECHNICIAN BASIC (EMT-B)

Credits: 6 (F, S, SU)
Prerequisite: Must be 18 years of age to take certification examination

This course is the nationally recommended minimum level of training for ambulance personnel and is considered the desired level of medical training by many fire departments. The course focuses on skill development in the primary responsibilities of the EMT-B, which are to bring emergency medical care to victims of emergencies, to stabilize their condition, and to transport them safely and expeditiously to an appropriate facility. This course is a combination of classroom work and practical experience. Upon successful completion of the course, graduates are eligible to sit for the Montana and National Registry certification examinations. All aspects of authorization/certification are the responsibility of the student.

EMS 140 EMT-INTERMEDIATE I (EMT-I)

Credits: 4 (S, F based on sufficient demand)
Prerequisite: Formal acceptance into EMT-I course, EMT-Basic National Certification, and minimum of one year patient care experience as an EMT B prior to sitting for the National Registry Certification Examination; Current certification in CPR according to AHA Healthcare Provider standards or its equivalent; approved for admissions by the Medical Director.

This course is designed to bridge a nationally perceived void between the EMT-B and EMT-P levels of certification. The EMT-I will be utilized in systems where the pre-hospital care provider is required to perform skills beyond those of the EMT-B but where EMT-P level care is unavailable or unattainable. This course will refine the life-saving skills of the EMT-B in addition to providing the student with supplementary advanced life support skills that can significantly improve the quality of pre-hospital care. Course topics will include the professional roles and responsibilities of the EMT-I as well as focusing on EMS systems, medical control, medicolegal considerations, communications, medical terminology, advanced patient assessment, airway management, and the pathophysiology of shock. Must be high school graduate or equivalent to take certification examination.

EMS 145 ACLS PREPARATION

Credits: 1 (F)
Prerequisite: Instructor approval required.

This course is based upon the American Heart Association course which is considered the national standard of care for advanced providers caring for cardiac patients. The program includes didactic and skills training in cardiac anatomy and physiology, acid base balance, pharmacology, cardiac rhythm interpretation, monitor/defibrillator operation, and patient care algorithms.

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EMS 146 PALS PREPARATION

Credits: 1 (S)
This course is based upon the American Heart Association course that is considered the national standard of care for advanced providers caring for pediatric patients in the arrest situation. This course includes didactic and skills training in pediatric anatomy and physiology, assessment, airway management, pharmacology, cardiac rhythm interpretation, monitor/defibrillator operation, and patient care algorithms.

EMS 148 PRE HOSPITAL TRAUMA LIFE SUPPORT

Credits: 1 (S)
This course is designed to provide the advanced EMT with trauma specific knowledge and skills. The program emphasizes rapid recognition, management, and transportation of the critical patient. Course topics include mechanism of injury, assessment, advanced airway management, respiratory injuries and management, recognition and management of shock, intravenous therapy, head injuries, spinal injuries and special situations. The program was developed by the National Association of Emergency Medical Technicians and is utilized throughout the United States.

EMS 155 EMT-INTERMEDIATE II

Credits: 3 (S, F based on sufficient demand)
This course is a continuation of EMT - Intermediate I. This course will refine the knowledge and skills of Intermediate I in addition to providing the student with additional advanced life support skills. Course topics will include cardiology and cardiac monitoring, Advanced Cardiac Life Support, advanced patient assessment, further advanced airway management, IV therapy and shock management.

EMS 205 EMT-PARAMEDIC III

Credits: 3 (S)
Prerequisite: Successful completion of Paramedic I/II or Faculty approval
This course will continue with medical emergencies and focus on the acute abdomen, genitourinary, and reproductive regions. In addition, students will be introduced to anaphylactic toxicological, and environmental emergencies, as well as learn more about alcoholism and drug abuse with respect to the emergent pre-hospital arena.

EMS 210 EMT-PARAMEDIC III/IV SKILLS LAB

Credits: 2 (S)
Prerequisite: Successful completion of Paramedic I/II or instructor approval
Co requisite: EMS 205, EMS 225

This laboratory section will focus primarily on medical assessment, emergency pharmacology calculation and administration, in addition to reinforcement of ACLS and PALS mega code imperatives. Students will complete this laboratory section with preparation for the National Registry Certification Examination.

EMS 217 EMT-INTERMEDIATE III

Credits: 4 (S, F based on sufficient demand)
This course is a continuation of EMT-Intermediate II and is designed to emphasize the new information in the I-99 curriculum. This course will refine the knowledge and skills of Intermediate I and II in addition to providing the student with additional advanced life support skills. Course topics will include pharmacology, medication administration, cardiology and cardiac monitoring, Advanced Cardiac Life Support, advanced patient assessment, further advanced airway management, IV therapy and shock management.

EMS 220 EMT-PARAMEDIC III/IV CLINICAL AND FIELD INTERNSHIP

Credits: 4 (S)
Prerequisite: EMS 205, 225 with a grade of "C" or higher
The clinical and field internship experience allows the students to integrate knowledge and skills from the classroom setting into actual patient care in the hospital and field domain. Students must receive a grade of "Pass" in the clinical and field internship course or be required to repeat EMS 110 and EMS 115.

EMS 222 EMT-INTERMEDIATE I CLINICAL

Credits: 1 (S, F based on sufficient demand)
This course includes hospital and surgical center rotations as well as field internship experiences with Benefis Healthcare, Great Falls Clinic Surgery Center, Great Falls Emergency Services, Montana Community Ambulance, and Great Falls Fire/Rescue.

EMS 225 EMT-PARAMEDIC IV

Credits: 3 (S)
Prerequisite: Successful completion of Paramedic I/II or instructor approval

This course will complete the student's investigation into medical emergencies and will focus primarily on obstetric/gynecological, neonatal, and behaviorally unstable patients. Additionally, it will be within the scope of this course to prepare the successful candidate for the rigorous National Registry Certification Examination.

EMS 227 EMT-INTERMEDIATE II CLINICAL

Credits: 2 (S, F based on sufficient demand)
This course is a continuation of I Clinical with primary emphasis placed on hospital emergency department rotations as well as field internship experiences with Benefis Healthcare, Great Falls Emergency Services, Montana Community Ambulance, and Great Falls Fire/Rescue.

ENGLISH

ENGL 040 WRITING

Credits: 3 (F,S,SU)
Pass/Fail Basis

As an individualized approach to the understanding and use of basic elements necessary to the appropriate structuring of sentences and paragraphs, this course includes capitalization, punctuation, and word form and sentence structure.

ENGL 114 INTRO TO LITERATURE

Credits: 3 (F,S)
This course provides the student an opportunity to study the three major literary forms – fiction, poetry, and drama including examples of works from several time periods. Selections will include works by and about minorities and women.

ENGL 118 INTRODUCTION TO CRITICAL READING/WRITING

Credits: 4 (F,S)
Prerequisite: Qualifying admission assessment score

This class prepares those students making progress toward full admission to MSU for college-level reading and composition. The course introduces students to critical reading practices by focusing on textual analysis of non-fiction works and to writing for academic purposes by focusing on the development of the paragraph. The course also provides, in the context of the writing, a review and reinforcement

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of principles of English grammar and punctuation associated with successful college-level writing. The goal of this course is to develop confidence and ability to write clear and effective paragraphs and to read college-level texts.

ENGL 119 INTRODUCTION TO COLLEGE WRITING

Credits: 4 (F,S, SU)

Prerequisite: Qualifying admission assessment score

This class prepares those students making progress toward full admission to MSU for college level reading and composition. The course introduces students to critical reading practices within thematic non-fiction, fosters student critical thinking based on textual analysis, and encourages questioning and exploration. Composing paragraphs and short essays provides a review and reinforcement of principles of English grammar and punctuation associated with successful college-level writing. Confidence and ability to write clear and effective sentences are assumed.

ENGL 121 COMPOSITION I

Credits: 3 (F,S,U)

Prerequisite: ENGL 119 with a grade of "C" or higher or qualifying admission assessment score

Composition I offers a clearly defined sequential approach to writing the short essay and the research paper. Emphasis is placed on pre-writing skills, organizational techniques, development of ideas, word choice, sentence structure, referential skills, and patterns of writing-exposition, narration, description, and argumentation. Competence in basic sentence structure and writing skills at the paragraph and short essay level is assumed.

ENGL 122 COMPOSITION II

Credits: 3 (F,S, SU)

Prerequisite: ENGL 121

A continuation of the study of the modes of composition introduced in Composition I (ENGL 121), this course emphasizes argumentation and research writing. Students will complete a variety of major essays focusing on persuasive/analysis topics including a significant research paper, accompanied by a thorough reference page. Students will be introduced to library research methods, the avoidance of plagiarism and persuasive pitfalls, and formal documentation style.

ENGL 124 BUSINESS AND PROFESSIONAL COMMUNICATION

Credits: 3 (F,S, alternate SU)

Prerequisite: ENGL 119 with a grade of "C" or higher, qualifying admission assessment score, or instructor approval

Students of this course develop the skills to generate clear, concise documents for the world of work. Emphasis is placed on format, tone, style, and organization of business letters, memos, and reports. Appropriate conventions for business style, punctuation, and handling of electronic communications are included. Course is taught by computer-assisted instruction.

ENGL 175 STUDENT NEWSPAPER

Credits: 1-3 (F,S)

Prerequisites: placement into ENGL 121, or instructor approval

Students will engage in the reporting and production of the student newspaper, Roaring Winds.

ENGL 210 WORLD LITERATURE I (ANCIENT THROUGH RENAISSANCE)

Credits: 3 (F, Odd Years)

Prerequisite: ENGL 121 or instructor approval

World Literature, through its survey of literature, presents a chronological and critical study of western world literature in translation, within the historical milieu of ancient times through the Renaissance. The course also introduces students to the idea that literature is both enjoyable and useful in shaping perceptions and responses in daily life. Emphasis is placed on critical thinking and reading skills using analysis of elements such as plot, setting/ tone, character, language/figures of speech, symbolism, and theme. Competence in basic reading and writing skills is assumed.

ENGL 211 WORLD LITERATURE II (17TH CENTURY TO PRESENT)

Credits: 3 (S, Odd Years)

Prerequisite: ENGL 121 or instructor approval

World Literature, through its survey of literature, presents a chronological and critical study of western world literature in translation, within the historical milieu of the enlightenment through the Twentieth Century. The course also introduces students to the idea that literature is both enjoyable and useful in shaping perceptions and responses in daily life. Emphasis is placed on critical thinking and reading skills, using analysis of element such as plot, setting/ tone, character, language/figures of speech, symbolism, and theme. Competence in basic reading and writing skills is assumed.

ENGL 214 LITERATURE OF THE WEST

Credits: 3 (S, even years based on Sufficient Demand)

Selected readings from the literature of the Western United States from 1850 to the present are reviewed. Works range from the popular "dime" Western to A.B. Guthrie's *The Big Sky* and James Welch's *Winter in the Blood*. Poetry, drama, fiction, and essays will be included as well as exploration of "the Western" as film and television genres to assess the power of myth and the reality of history and cultures of our region.

ENGL 217 CREATIVE WRITING

Credits: 3 (F based on Sufficient Demand)

This course provides the student an opportunity to develop creative writing skills in the context of poetry and short fiction. Students will respond to the works of published authors, including selections by and about minorities and women. Conducted in a workshop atmosphere, students will write, revise, and respond and review their original work, and then submit a final portfolio containing three revised poems and a revised short story.

ENGL 218 CREATIVE WRITING WORKSHOP

Credits: 1 (SU)

Prerequisite: ENGL 217 or instructor approval

This course is a 3-day pass/fail residency workshop with emphasis on poetry and short fiction. Students will explore imaginative writing during the day and critical appraisal and revision techniques in evening sessions. Students will gain experience, also, in the oral presentation of original written works.

ENGL 220 INTRODUCTION TO NATURE LITERATURE

Credits: 3 (F, even years based on sufficient demand)

This course will survey nature literature, covering key writers and ideas of this distinctive literary form. Writers of both prose and poetry who explore the natural world and create awareness of our place within it will be featured. The concluding focus on Montana nature writers

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will provide a local and personal link to the genre. Student projects will expand coverage to include particular writers not covered in class readings.

ENGL 228 STRATEGIES OF BUSINESS COMMUNICATION

Credits: 3 (F,S)
Prerequisite: ENGL 121

Students will develop work-related skills producing both business communications and technical documents. Business letters and memos address a variety of business contexts. Instructions, technical descriptions, proposals, feasibility studies, and management plans reflect working documents that emphasize structure, format, and tone for a variety of professional audiences. This high-level course is taught by computer-assisted instruction. Entrepreneurship students should register for both BUS 260 and ENGL 228 in their last semester. On-campus offering of ENGL 228 is recommended for Entrepreneurship students.

FIRE & RESCUE TECHNOLOGY

FRS 101 FIREFIGHTER I

Credits: 5 (Contact Fire Training School)

This course requires the student to perform basic firefighter skills within the context of the fireground. Integration of skills is validated through successful completion of the State Certification Examination for Firefighter I.

FRS 102 FIREFIGHTER II

Credits: 5 (Contact Fire Training School)

This course requires the student to perform advanced firefighter skills within the context of the fireground. Integration of skills is validated through successful completion of the State Certification Examination for Firefighter II.

FRS 107 AIRCRAFT FIRE AND RESCUE

Credits: 3 (Contact Fire Training School)

Provides basic knowledge of aircraft types and systems, rescue equipment, airfield characteristics, and aircraft rescue and firefighting procedures (ARFF). Must meet the requirements of the class offered through the Helena College of Technology or equivalent.

FRS 112 FIRE INSPECTION AND INVESTIGATION

Credits: 3 (Contact Fire Training School)

This course provides the student an overview of fire prevention activities including code enforcement, recognition of common fire hazards, and the basic techniques and procedures of fire investigation. Integration of knowledge is validated through completion of an approved project that applies to an actual situation or problem.

FRS 241 FIRE DEPARTMENT INTERNSHIP

Credits: 3 (Contact Fire Training School and Program Advisor)

This 45 hour internship is designed to give the student experience in various aspects of fire department operations. The student, with approval from the fire chief and program advisor will develop a plan, goals and objectives for the internship.

FRS 245 FIRE SERVICE TRAINING & SAFETY EDUCATION

Credits: 3 (Contact Fire Training School)

This course will introduce the student to adult education using contextual methodology, the basics of public fire safety education, and how education, enforcement, and prevention interact to mitigate

community hazards. Students will apply their learning toward completion of an approved project.

FRS 250 BUILDING CONSTRUCTION

Credits: 2 (Contact Fire Training School)

This course provides an introduction to the special characteristics of non-combustible, fire resistive, frame, and ordinary construction as they apply to fire services. The primary emphasis is on improving the fire officer's ability to ensure firefighter safety by recognizing common causes and indicators of structural collapse, component failure or other hazards related to building construction.

FRS 265 INCIDENT MANAGEMENT AND SAFETY

Credits: 3 (Contact Fire Training School)

This course provides the student with an overview of the structure, function and expandability of an Incident Management System (IMS) as well as the command skills necessary to effectively utilize an IMS, guidelines and practice in applying an IMS, resources for implementation of a departmental IMS, and techniques and approaches related to firefighter safety and survival. Students will complete an approved project to demonstrate integration of learning.

FRS 270 TACTICAL OPERATIONS AND COMPANY MANAGEMENT

Credits: 5 (Contact Fire Training School)

NFPA 1021 Fire Officer 1: This intensive 80 hour course teaches the skills required to succeed at the first level of fire service supervision (NFPA 1021, level 1). Success in the course and testing results in certification as a Fire Officer 1. Simulations are used for both incident management and human relations skills.

FRS 285 HAZARDOUS MATERIALS

Credits: 5 (Contact Fire Training School)

NFPA 472 Hazardous Materials Technician: This intensive 80 hour class teaches the skills required to perform at the hazardous materials technician level (NFPA 472).

FRS 290 WILDLAND FIRE PROTECTION

Credits: 3 (Contact Fire Training School)

All classes offered through Montana DNRC. Refer to MT DNRC for course descriptions.

FRS 291 HYDRAULICS AND WATER SUPPLIES

Credits: 3 (Contact Fire Training School)

Covers the scope of water supply operations in the fire service. Includes pre-planning operations, water supply requirements, source options, delivery systems and options, and hydraulic calculations.

GEOLOGY

GEOL 101 INTRODUCTION TO GEOLOGY/LAB

Credits: 4 (3 lecture, 1 lab) (S based on Sufficient Demand)

This course is an introduction to geologic principles, with an emphasis upon geologic processes (plate tectonics, mountain building, and weathering); rock types (igneous, sedimentary, and metamorphic); and geologic hazards (volcanoes and earthquakes). Some time will be spent discussing geologic time; water and mineral resources; landforms; and glaciers. The laboratory portion of this course will include mineral and rock identification; topographic map reading; basic interpretation of geologic maps; and other activities dealing with topics covered in lecture. It is strongly recommended that students have good basic algebra skills.

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HEALTH AND HUMAN DEVELOPMENT

HHD 106 DRUG & HEALTH ISSUES FOR EDUCATORS

Credits: 3 (F, S, SU)

This course is a survey of drug education and health concerns for educators of school-aged children, including topics required by Montana's Board of Public Education for health-related teacher education.

HHD 128 DANCE, SOCIAL

Credit: 1 (S based on sufficient demand)

Pass/Fail Basis

Traditional and popular styles of ballroom dancing, including waltz, east coast swing, fox trot, cha cha, and American tango are introduced.

HHD 130 READING FOR RECREATION

Credit: 1 (F, S based on sufficient demand)

Pass/Fail Basis

This course encourages reading for recreation. While developing critical thinking skills, students will extend the range of their current reading interests. Students will experience classic and modern fiction in short story and/or novel form.

HHD 145 FLY FISHING

Credit: 1 (S based on sufficient demand)

Pass/Fail Basis

Students are presented the basic skills and knowledge of fly fishing including: casting, entomology, habitat, stream ethics, tackle, tactics, and strategy.

HHD 147 GOLF FUNDAMENTALS

Credit: 1 (S based on sufficient demand)

Pass/Fail Basis

Fundamental skills, equipment, rules, and etiquette of golf are presented.

HHD 151 OUTDOOR WINTER SKILLS AND SAFETY

Credit: 1 (S)

Pass/Fail Basis

This course exposes students to basic skills and equipment necessary for winter experiences in the Montana backcountry. Safety will be a course emphasis.

HHD 152 OUTDOOR SUMMER/EARLY FALL RECREATION AND SAFETY SKILLS

Credit: 1 (F, SU)

Pass/Fail Basis

This course exposes students to basic skills and equipment necessary for summer/early fall experiences in the Montana backcountry. Safety will be a course emphasis.

HEALTH INFORMATION TECHNOLOGY

HI 132 HEALTH DATA CONTENT AND STRUCTURE

Credits: 3 (S, SU)

Prerequisites or Co-requisites: AH 185, BIO 127

This course provides orientation to the health information department and its organization interrelationships in healthcare facilities. This course also covers the content and format of the health record (both

conventional and alternative formats), quantitative and qualitative analysis of the record according to regulatory and accreditation standards, numbering, filing, retention, storage, and destruction of records. Application will include real health records and exposure to health record management software.

HI 150 PROFESSIONAL PRACTICE EXPERIENCE CODING

Credits: 2 (SU)

Prerequisite: Completion of preceding courses in HICS sequence and approval of program director.

Students in this course will gain professional practice experience applying ICD-9-CM and CPT coding skills. Students create written records of their experiences and will complete assigned projects as indicated in their Professional Practice Experience Manual. This course is scheduled for 80 hours off campus. Each student will be responsible for their own transportation to and from the health care facility and any necessary living expenses.

HI 156 LEGAL AND REGULATORY ASPECTS OF HEALTHCARE

Credits: 3 (F,S)

Prerequisites: ENGL 119 or higher

This course covers basic knowledge of the legal, regulatory, and ethical aspects of healthcare including: doctrines, principles, and processes of civil law; state licensure and national accreditation standards; and professional requirements for personal liability, confidentiality, and documentation of the health record. Application will be achieved using real health records, case studies, and scenarios.

HI 210 STATISTICAL HEALTH INFORMATICS

Credits: 3 (SU)

Prerequisites or Co-requisites: MATH 161 or higher

This course will include gathering, compilation, and computing of healthcare-related statistics, use of research, surveys, and statistical methods for developing healthcare data into information for various requesters, along with database analysis, case-mix systems, software, systems analysis, networks, and imaging will also be covered. Application will include health record management software.

HI 225 HEALTH INFORMATION MANAGEMENT

Credits: 3 (F)

Prerequisites or Co-requisites: HI 132 and AH 115

General and financial management topics are studied in this course. The management functions of planning, organizing, directing, and controlling are related to the healthcare environment. Specific healthcare examples of budgeting, managerial accounting and selection, procurement, and maintenance of equipment and supplies are provided through extensive application of healthcare-related case studies and student projects.

HI 236 ICD CODING

Credits: 3 (S)

Prerequisites or Co-requisites: BIO 127, AH 201

This course covers basic and intermediate levels of theory and application of ICD-CM principles and guidelines for coding and sequencing diagnoses and procedures. Students perform basic and intermediate coding using real health records, case studies, and scenarios. Application will focus on book coding with a brief overview of encoder software. This coding class requires hands-on coding skills, knowledge of basic use of applicable coding books are an expectation.

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HI 237 CPT CODING

Credits: 3 (S)

Prerequisites: HI 236 or concurrent enrollment

This course covers basic and intermediate levels of theory and application of CPT principles to code procedures documented in healthcare records. Students perform basic and intermediate coding using real health records, case studies, and scenarios. HCPCS coding is also covered. Application will also include book and an introduction to encoder software. This coding class requires hands-on coding skills, and knowledge of basic use of applicable coding books are an expectation.

HI 240 CLINICAL QUALITY ASSESSMENT

Credits: 3 (SU)

The principles and procedures of quality, utilization, risk, and compliance processes used to improve the quality of patient health care are taught in this course. Quality assessment and improvement standards and requirements of licensing, accrediting, fiscal and other regulatory agencies are presented. Methods for identifying variations and deficiencies for follow-up action will be achieved through the application of multiple display (graphing) techniques and through health record management software.

HI 245 PROFESSIONAL PRACTICE EXPERIENCE I

Credits: 2 (F)

Prerequisite: Completion or concurrent enrollment of all courses in first 4 semesters of the HIT program and approval by the program director.

Students in this course gain professional practice experience in healthcare facility health information department including practice of skills in record assemble, analysis, abstraction, confidentiality, retention, and retrieval. Students create written records of their experiences and complete all projects in the Professional Practice Experience I Manual. This course is schedule for 80 hours of off campus. Each student will be responsible for her/his own transportation to and from the healthcare facility and any necessary living expenses.

HI 256 INTERMEDIATE ICD CODING

Credits: 2 (S, SU)

Prerequisite: HI 236, HI 237

Basic understanding of the CPT, ICD-CM, coding principles should already be established. This advanced course will cover medical necessity, coding issues for specific body systems, and for general conditions. Intensive coding application will be achieved through the use of real health records, case studies, and scenarios. Application will include the use of encoder software. DRGs, APCs, RUGs, RBRVs, and the Correct Coding Initiative (CCI) will also be covered in this class. This coding class requires hands-on coding skills, and knowledge of basic use of applicable coding books are an expectation.

HI 257 INTERMEDIATE CPT CODING

Credits: 2 (S)

Prerequisite: HI 236, HI 237

Basic understanding of the CPT, ICD-CM, coding principles should already be established. This advanced course will cover medical necessity, coding issues for specific body systems, and for general conditions. Intensive coding application will be achieved through the use of real health records, case studies, and scenarios. Application will include the use of encoder software. DRGs, APCs, RUGs, RBRVs, and the Correct Coding Initiative (CCI) will also be covered in this class. This coding class requires hands-on coding skills, and knowledge of basic use of applicable coding books are an expectation.

HI 290 PROFESSIONAL PRACTICE EXPERIENCE II

Credits: 2 (S)

Prerequisite: Completion of all courses in first 4 semesters of program and approval by the program director and instructor.

Students gain professional practice experience in a healthcare facility health information department by applying skills in coding, observe management and supervisory situations, and by completing all projects in the Professional Practice Experience II Manual and a written record of the course. This class is scheduled for 80 hours off campus for three weeks. Each student will be responsible for her/his own transportation to and from the healthcare facility and any necessary living expenses.

HI 292 TOPICS IN HEALTH INFORMATION TECHNOLOGY

Credits: 3 (F)

Prerequisite or Co-requisites: HI 290 and/or completion of all courses in first 4 semesters of the HIT program

The course provides a forum for students to prepare for the Registered Health Information Technician (RHIT) national examination sponsored through AHIMA. Reviewing and integrating new knowledge, regulations, and standards in the field of health information technology will be achieved. Guidance on the completion of job applications, preparing a resume, writing cover and follow-up letters, and job interviews (as both applicant and interviewer) are studied and practiced.

HI 295 OVERVIEW OF HEALTH INFORMATICS SYSTEMS

Credits: 3 (S)

Suggested Prerequisites: AH 185, CIT 110, second semester or greater in Health Care Program

This course will cover the principles of analysis, design, evaluation, selection, acquisition, and utilization of information systems in healthcare. Also included in this course are the technical specifications of computer hardware, software, networks, and telecommunications. Furthermore, this course will provide an understanding of technology's role in healthcare. The course will emphasize the intellectual use of information strategic planning, decision support, program management, high quality patient care, and continuous quality improvement. Application will be done through the use of health record management software and word processing application programs.

HISTORY

HIST 103 HISTORY OF THE UNITED STATES I (TO 1865)

Credits: 3 (F)

This course surveys the history of the United States from the era of discovery to the Colonial Period and through the Civil War. Topics include the political, social, economic, cultural, and diplomatic developments that contributed to the formation of the North American civilization and to the position of the United States in the world's community of nations.

HIST 104 HISTORY OF THE UNITED STATES II (1865 TO PRESENT)

Credits: 3 (S)

This course is a survey of American history since the Civil War. The focus of the course will be on why events happened and what meaning they had for today's United States. The role of individuals and groups will be as important as the functioning of the more depersonalized economic

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and political forces of history. Themes of urbanization, industrialization and ethnicity will be emphasized. This course will stress social history as well as traditional political history.

HIST 106 HISTORY OF WESTERN CIVILIZATION I

Credits: 3 (F)
This course examines the major political, economic, and cultural developments of western civilization from its inception in the Fertile Crescent in the fourth millennium B.C. through the era of the Renaissance and Reformation in the 16th Century.

HIST 107 HISTORY OF WESTERN CIVILIZATION II

Credits: 3 (S)
This course examines the major political, economic, and cultural developments of western civilization from the 17th century to the present.

HIST 210 MONTANA HISTORY

Credits: 3 (F, S, SU)
This course is a study of the major political, social, cultural and economic developments that have contributed to the formation of Montana and to Montana's place within the region, the nation, and the world, from prehistoric times to the present.

HIST 215 THE CIVIL WAR AND RECONSTRUCTION

Credits: 3 (S based on sufficient demand)
This course analyzes the causes of the Civil War, traces the military and civilian events of the war itself and considers the war's aftermath as embodied by Reconstruction, the incorporation of the American west and social climate of the Gilded Age.

HUMANITIES

HUM 242 GENDER AND EQUALITY

Credits: 3 (S based on sufficient demand)
The human cultural role of gender is examined in relation to historical perspectives, business, social and familial organizations, world views, technology, and perception of self.

HUM 244 AMERICAN CULTURAL VALUES

Credits: 3 (F)
This course surveys change and continuity in American cultural traditions, values, and beliefs from the perspectives of familial, social, and economic organizations. Explores how values and beliefs have been shaped and modified in America's rise as a world power in the context of shifting demographics, class relations, and world economies.

HUM 246 MONTANA WAYS

Credits: 3 (F)
This course introduces the diversity of people and experiences that lie at the heart of modern Montana and define the uniqueness of being "Montanan." The themes of self-reliance, community, creativity, and connections to the land will be examined from literary, artistic, anthropological, geographical, and historical perspectives.

LIBRARY

LIB 121 INTRODUCTION TO INFORMATION RESOURCES

Credits: 1 (F based on sufficient demand)
This course provides an introduction to effective use of library resources and services. The course will focus on information retrieval using library-based electronic resources accessible online through the MSU-Great Falls Campus Library web site. Evaluation of information and citing sources will also be covered. No co-requisite is required but students may find this course more relevant if it is taken in conjunction with a course requiring substantial research.

MATHEMATICS

MATH 065 PRE-ALGEBRA ~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 4 (F, S, SU)
Pass/Fail Basis

Basic concepts relating to fractions, decimals, ratios, proportions, percent, simple equations, topics of signed numbers, and 1-variable linear equations are offered as a review and/or preparation for further studies in mathematics.

MATH 085 PRE-ALGEBRA

Credits: 4 (F, S, SU)
Pass/Fail Basis

Basic concepts relating to fractions, decimals, ratios, proportions, percent, simple equations, topics of signed numbers, and 1-variable linear equations are offered as a review and/or preparation for further studies in mathematics.

MATH 100 MATH FOR THE TRADES

Credits: 3 (F, S)
This course presents basic mathematical topics as they are applied in a trades program. Topics covered include: use of measuring tools, measurement systems, dimensional arithmetic, percent, proportion, applied geometry, basic trigonometry. NOTE: This course is intended for specific programs and does NOT provide sufficient Pre-Algebra material to serve as a prerequisite for students wanting to take additional mathematics.

MATH 101 INTRODUCTORY ALGEBRA ~ THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 4 (F, S, SU)
Prerequisite: Qualifying admission assessment score within the past 3 years or instructor approval, MATH 065

Introductory Algebra initiates development in students' ability to organize thought processes and systematically solve problems while preparing students for studies in other courses. Course emphasis includes manipulation of variables, exponential applications, introduction to and factoring of polynomials, solving equations, systems of equations, and radicals. This course is intended for students who have not studied algebra but have a firm background in basic mathematics or who wish it as a review.

MATH 103 INTRODUCTORY ALGEBRA

Credits: 4 (F, S, SU)
Prerequisite: Qualifying admission assessment score within the past 3 years or instructor approval, MATH 085

Introductory Algebra initiates development in students' ability to

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organize thought processes and systematically solve problems while preparing students for studies in other courses. Course emphasis includes manipulation of variables, exponential applications, introduction to and factoring of polynomials, solving equations, systems of equations, and radicals. This course is intended for students who have not studied algebra but have a firm background in basic mathematics or who wish it as a review.

MATH 104 BUSINESS MATHEMATICS

Credits: 4 (F,S,SU)

Prerequisite: Qualifying admission assessment score within the past 3 years or consent of faculty, MATH 085

Students in this course will examine the mathematics of business ownership and will demonstrate an understanding of business decisions. Concepts include marketing, payroll, cash flow, simple and compound interest, credit, promissory notes, insurance, financial statements, ratio analysis, depreciation, annuities, and inventory valuation.

MATH 108 ALGEBRA FOR COLLEGE STUDENTS

Credits: 4 (F,S)

Prerequisite: MATH 103 or qualifying admission assessment score within the past 3 years

This course offers a review of elementary algebra with further emphasis on systems of equations, determinants, systems of inequalities, rational expressions, radical expressions, complex numbers, quadratic equations, and exponential and logarithmic functions.

MATH 120 MATH FOR ELEMENTARY TEACHERS I

Credits: 3 (F)

Prerequisite: MATH 103 or qualifying admission assessment score within the past 3 years

This course is an introduction to problem solving, sets, functions, logic, numerations systems as a mathematical structure, introductory number theory, rational and irrational numbers and probability for prospective elementary school teachers.

MATH 121 MATH FOR ELEMENTARY TEACHERS II

Credits: 3 (S)

Prerequisite: MATH 120

Introductory geometry, constructions, congruence and similarity, concepts of measurement, coordinate geometry, problem-solving are revisited, and computer applications for prospective elementary school teachers are reviewed.

MATH 130 PRECALCULUS ALGEBRA

Credits: 4 (F,S)

Prerequisite: MATH 108 with a grade of "B" or higher or qualifying admission assessment score within the past 3 years.

An extended study of algebra preparing students for further work in mathematics in particular, Calculus. Course topics include the fundamental properties of real and complex numbers, functions (polynomial, rational, radical, exponential and logarithmic), conics, matrices, determinants, sequences, series and the binomial theorem.

MATH 131 PRECALCULUS TRIGONOMETRY

Credits: 3 (S)

Prerequisite: MATH 108 with a grade of "B" or higher or qualifying admission assessment score within the past 3 years.

An extensive look at trigonometric functions and identities, Law of Sines and Cosines, polar coordinates, inverse functions, vectors, and parametric equations is the basis of this course.

MATH 150 MATH FOR LIBERAL ARTS

Credits: 3 (F,S)

Prerequisite: MATH 103 with a grade of "B" or higher, Math 108 with a grade of "C" or higher, or qualifying admission assessment score within the past 3 years

This course exposes students to topics in applied and pure mathematics directly connected to modern society. Topics include: Polya's techniques for problem solving, number theory, logic, algebraic models, optimization, linear programming, set theory, probability and statistics.

MATH 161 COLLEGE ALGEBRA W/ SCIENCE APPLICATIONS

Credits: 3 (F,S)

Prerequisite: MATH 103 with a grade of "B" or better or qualifying admission assessment score within the past 3 years

This course prepares health science students for the mathematics required in their profession. Topics investigated include: inductive reasoning; logic; mathematical number systems; linear, quadratic, exponential, and logarithmic functions; graphing; probability; statistics; English, Apothecary and Metric systems and conversions; dosage calculations; and dimensional analysis. Utilizing these areas, the course also provides students with clinical applications.

MATH 181 CALCULUS I

Credits: 4 (F)

Prerequisites: MATH 130 and MATH 131 or qualifying admission assessment score within the past 3 years

Functions, elementary transcendental functions, limits and continuity, differentiation, applications of the derivative, and curve sketching studied.

MATH 182 CALCULUS II

Credits: 4 (S)

Prerequisite: MATH 181

Integration theory, methods of integration, applications of the integral, Taylor's theorem, infinite sequences and series are studied.

MATH 216 BASIC STATISTICS

Credits: 4 (F,S)

Prerequisite: MATH 108 with a grade of "C" or higher, or qualifying admission assessment score within the past 3 years

This course presents concepts, principles, and methods of statistics from two perspectives: descriptive and inferential. Statistical topics include organizing data, sampling, and measures of central tendency, probability, correlation, random variables, hypothesis testing, confidence intervals, and inference.

MATH 217 INTERMEDIATE STATISTICS

Credits: 3 (S)

Prerequisite: MATH 216

This course studies binomial distributions, simple and multiple linear regression, confidence intervals, F tests, and one-way analysis of variance. Statistical analyses are performed using computer software packages.

MATH 260 LINEAR ALGEBRA

Credits: 4 (S)

Prerequisite: MATH 181

This course will present the vocabulary, notation, and algebra of matrices and vectors. Systems of linear equations, matrix algebra, determinants, vector algebra, vector spaces, eigenvalues, eigenvectors,

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and linear transformations will be studied. Applications and mathematical technology will be incorporated.

MANUFACTURING

MFGT 205 MANUFACTURING PROCESSES AND MATERIALS

Credits: 3 (F)
The fundamentals of manufacturing are introduced in this course. Capabilities, typical applications, advantages, and limitations of material and process selection for manufacturing are topics covered.

MODERN LANGUAGE

ML 121 INTRO TO AMERICAN SIGN LANGUAGE

Credits: 3 (F,S)
In this course, the student will have an opportunity to develop a basic syntactic knowledge of American Sign Language (ASL), basic vocabulary and basic conversational skills. Vital aspects of deaf culture and community will be incorporated. The direct experience method, using ASL, will be used to enhance the learning process. Students must successfully complete this course prior to being accepted into the Interpreting and Transliterating Preparation Program.

ML 221 AMERICAN SIGN LANGUAGE INTERMEDIATE

Credits: 3 (F, S)
Prerequisite: ML 121
American Sign Language (ASL) II continues the skill development started in ASL I. This course will cover instructions in the grammatical features of ASL, vocabulary development, conversational skills, and exposure to the culture of the deaf community.

MEDICAL ASSISTANT

MO 138 CLINICAL PROCEDURES I

Credits: 3 (F)
Prerequisite: Instructor approval – BIO 213 and BIO 214 with a grade of "C" or higher

This course is designed to develop a basic knowledge of skills and practices of the allied healthcare professional assisting in a clinical setting. Units include Universal Precautions, patient preparation, preparing for and assisting with examinations, infection control, surgical asepsis, pharmacology, and drug administration.

MO 238 CLINICAL PROCEDURES II

Credits: 3 (F)
Prerequisite: MO 138 with a grade of "C" or higher

This course is designed to introduce students to additional skills and practices of the allied healthcare professional assisting in a clinical setting. Units include laboratory orientation, collecting and handling laboratory specimens, hematology, physical therapy, electrocardiography, emergencies, first aid, and nutrition.

MO 241 CLINICAL REVIEW

Credits: 1 (S)
Corequisite: MO 242

This seminar is designed for students participating in MO 242. It features discussions of clinical topics and situations.

MO 242 EXTERNSHIP

Credits: 4 (S)
Prerequisite: Instructor approval and MO 138, MO 238 with a grade of "C" or higher

Students gain practical experience in clinical medical environments where they have an opportunity to perform various clinical and administrative procedures under supervision. Students are expected to use competencies required for the medical assistant.

MUSIC

MUS 102 FUNDAMENTALS OF MUSIC

Credits: 3 (F, S)
Designed for the student with little or no musical background, this course introduces the fundamental elements of music reading and notation. It includes note and rhythmic reading, scales, intervals, and chords.

MUS 210 MUSIC APPRECIATION

Credits: 3 (F, SU)
This course is a comprehensive introduction to the theory, history, and literature of music of Western Civilization. The course examines musical styles through several time periods and is designed to develop the students' aural acuity as well as their intellectual understanding of music as an important contribution to Western culture.

MUS 212 AMERICAN MUSIC

Credits: 3 (S, SU based on sufficient demand)
This course will survey musical idioms, styles and trends developed in the United States from 1492 to the present. Included are folk, sacred, country and western, blues, pop, rock and roll, jazz, and fine art music.

MUS 214 WORLD MUSIC

Credits: 3 (F, S)
World Music introduces the music of varied cultures of the world by presenting the music within its historical and societal contexts. The course includes topics and musical surveys from Asia, Africa, the Americas and Europe.

NATIVE AMERICAN STUDIES

NAS 201 MONTANA'S AMERICAN INDIANS

Credits: 3 (F, S, SU)
This course focuses on the interactions of Montana's American Indians in socioeconomic structures based on historical and current perspectives including cultural world views, religion, reservations, treaties, vested rights, sovereignty, contemporary tribal governments, and socioeconomic problems.

NAS 215 NATIVE AMERICAN RELIGIOUS TRADITIONS

Credits: 3 (F based on sufficient demand)
This course will examine, explore, and describe selected Native American Religious systems focusing on origins, world views, religious beliefs, traditions and ceremonies, sacred songs and dance, and the way they have been affected by western civilization. A major focus will be on the Northern Plains People.

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NURSING

NURS 100 INTRODUCTION TO NURSING

Credits: 1 (S)

The purpose of this course is to initiate the student to the roles/functions/expectations of the nurse. The course will explore nursing history, current views of nursing, different types of nursing occupations, and educational requirements. The course will expose the students to issues surrounding the profession of nursing.

NURS 140 PHARMACOLOGY

Credits: 3 (F)

This course introduces the principles of pharmacology, including drug classifications and their effects on the body. The course reflects general principles, theories, and facts about drugs and their administration. Principles of action, uses, side effects, and patient education are taught to facilitate the student's learning in the clinical setting. Specific drug information is discussed in relation to assessment, nursing diagnosis, patient monitoring, interventions, patient education and evaluation of safe and effective drug therapy. Emphasis is placed on utilizing the nursing process related to pharmacology and the nurse's ability to think critically.

NURS 150 FUNDAMENTALS OF NURSING

Credits: 7 (F)

This course introduces students to the clinical skills essential for the nursing role. Also includes complex concepts and behaviors of nursing roles within the context of the nursing process, holistic care and health care. The course emphasizes the theoretical and practical concepts of nursing skills required to meet the needs of patients in a variety of clinical settings. Students will be given the opportunity, in a lab setting, to practice these nursing skills.

NURS 250 GERONTOLOGY

Credits: 2 (F)

This course will focus on the nursing management of the older adult. Theories of gerontology and aging will be emphasized. The course will examine the principles of gerontology, challenges of aging, nutrition, pharmacology, pain, elder mistreatment, dying, and physiological basis of practice. The course will emphasize a holistic approach necessary to provide care for the older adult in diverse care settings. Ethical issues related to the care of the older adult will be explored. In the clinical component of this course, students will be able to safely deliver essential basic skills and show knowledge and concern to patients in the geriatric setting.

NURS 260 CORE CONCEPTS OF ADULT NURSING

Credits: 7 (S)

This course prepares the student to care for patients experiencing common, well-defined health alterations in settings where stable patients are anticipated. Students are introduced to standardized nursing procedures and customary nursing and collaborative therapeutic modalities. The course guides the student through the nursing process when planning nursing care for the common diseases of the following systems: urinary, endocrine, Integumentary, neurological, sensory, gastrointestinal, respiratory, cardiovascular, blood disorders, cancer, sensory, and musculoskeletal. The clinical component provides advancement from in-depth to complex nursing skills, knowledge, and attitudes necessary to care for the acutely ill patient.

NURS 270 CORE CONCEPTS OF MATERNAL/CHILD

Credits: 3 (S)

Emphasizing caring, communication, professionalism, and critical thinking, the course provides information about fetal development and prenatal and postnatal care of the mother and newborn. Role of the nurse in meeting the needs of the family is emphasized. Clinical application of caring for the mother and newborn will allow the student to demonstrate acquired knowledge. The course also includes growth and development patterns as well as care of the well and sick child.

NURS 280 CORE CONCEPTS OF MENTAL HEALTH

Credits: 2 (S)

This course will explore physiological, psychological, sociocultural, spiritual and environmental factors, associated with Mental Health/Illness. Focus will be placed on psychotherapeutic management in the continuum of care, milieu management and special populations with emphasis on individuals, families and communities.

NURS 290 LEADERSHIP ISSUES

Credits: 2 (SU)

This capstone course provides the Practical Nursing student information regarding the current status of practical nursing. This course assists the nursing student to bridge the role between student and employee. Leadership/management skills, continuing educational needs, licensure requirements, job applications, advanced educational programs and charge nurse responsibilities are included. Students will take the National League of Nursing (NLN) test and receive an application for the State Board of Nursing

Examination. There is a forty-five hour clinical to provide the student the experience of organizing the care for a small group of patients (5) in an extended care setting as a patient manager.

OFFICE TECHNOLOGY

OO 107 KEYBOARDING BASICS

Credits: 3 (F, S)

This course is an introduction of microcomputer keyboarding techniques using the touch system. Lessons cover the keyboard, basic skills, and an introduction to common business formats.

OO 108 ADVANCED KEYBOARDING AND FORMATTING

Credits: 3 (F, S)

Prerequisites: OO 107 (or challenge) OO 265/266, or concurrent enrollment

Students develop microcomputer keyboarding skills by completing drills designed to improve concentration, speed, and accuracy. Emphasis is also placed on formatting business documents.

OO 111 FUNDAMENTALS OF HEALTH INSURANCE

Credits: 4 (F, SU)

Prerequisites: AH 185

This course is designed to introduce students to the major national medical insurance programs, including Medicare, Medicaid, Blue Cross/Blue Shield, and TRICARE. Topics covered will include plan options, carrier requirements, state and federal regulations, abstracting from source documents, manual claim form completion, legal and ethical issues, and a review of diagnostic and procedural coding. Students will also learn computerized billing procedures using a typical medical office software package.

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OO 112 ADVANCED HEALTH INSURANCE TECHNIQUES

Credits: 3 (S)
Prerequisites: OO 111

This course will build on topics covered in OO 111. Students will study characteristics and requirements of each type of insurance including: indemnity plans, HMOs, PPOs, Worker's Compensation (state by state variances). Students will also discuss the adjudication process, resolve reimbursement problems and respond to claims reviews and appeals. Students will use medical office software package to complete assignments.

OO 173 COMPUTER CALCULATORS

Credits: 1 (1/2 semester) (F,S)
Prerequisite: MATH 104

Students master the touch method of entering data on the ten-key numeric keyboard. Speed and accuracy are emphasized on computer ten-keys using the desktop calculator. Ten-key functions will be used to solve common mathematical problems.

OO 179 RECORDS MANAGEMENT

Credits: 3 (F)
This comprehensive course introduces the complex management of records including setting up practical systems utilizing the four basic formats: alphabetic; subject; numeric; and geographic. Techniques in managing information and systems are discussed; advantages and disadvantages of systems are analyzed and compared; forms management is utilized; controls involving requisitioning, charging, following-up, transferring, storing, and disposing of information are studied.

OO 180 LEGAL STUDIES I

Credits: 4 (F)
Terms commonly used in the legal profession are introduced. Students will learn to define the terms and use them in legal context. In addition, students will be introduced to the legal field through the study of general law office procedures, ethics, court system and structure, civil litigation, and criminal law, and legal document format. This course is also designed to equip students with knowledge of procedures and with the basic attitudes, skills, and ethics required of a legal office employee.

OO 181 LEGAL STUDIES II

Credits: 4 (S)
Prerequisite: OO 180

Students continue their introduction to the legal field through the study of family law, administrative agencies, legal research, real estate, estate planning and probate, contracts, torts, bankruptcy, and business organizations. Study also includes related legal documents and their format. This course is also designed to equip the students with knowledge of procedures and with the basic attitudes, skills, and ethics required of a legal office employee.

OO 220 PREPARING RESUMES

Credits: 1 (F)
Prerequisite: Recommended course be taken during students final semester of attendance

Students will study the components of a "winning" resume and go through the steps in preparing a resume. They will identify critical differences among traditional, scannable, and electronic resumes. Personal strengths will be identified and focused to improve marketability in targeted career areas.

OO 221 INTERVIEWING FOR JOBS

Credits: 1 (S)
Prerequisite: Recommended course be taken during students final semester of attendance

This course will help the student master the art of interviews, develop strategies to market themselves, acquire successful interview techniques, navigate interview questions and answers, and utilize good follow-up moves.

OO 255 MEDICAL TRANSCRIPTION I

Credits: 3 (F, S)
Prerequisite: AH 185, CIT 110, OO 107 or 108, or instructor approval

Students are introduced to ethical considerations, rules, regulations, forms, and techniques in recording medical documents. Transcription of various medical reports is required with emphasis on competency in medical vocabulary, spelling, punctuation, and extensive usage of medical reference materials.

OO 256 MEDICAL TRANSCRIPTION II

Credits: 3 (S, SU)
Prerequisites: OO 255 with "C" or better

This course is designed to increase speed and accuracy in transcribing medical data with exposure to advanced technical language in a variety of specialties. Special attention is on speed, accuracy, production, style, and formats.

OO 260 MACHINE TRANSCRIPTION

Credits: 3 (S)
Prerequisite: CIT 110, OO 265 or OO 266, or concurrent

Students review and apply grammar, punctuation, formatting, and word usage rules. Proofreading and listening skills are emphasized in the transcription of mailable business documents.

OO 265 WORDPERFECT

Credits: 3 (S)
Prerequisite: CIT 110, OO 107, or consent of faculty

Corel WordPerfect software is used to create documents used in academic, professional, and business environments. These functions include formatting and editing documents, revising documents, managing documents, printing documents, using projects, creating headers and footers, inserting footnotes, creating columns, formatting tables and inserting formulas, using styles, changing fonts, sorting and extracting text, merging documents, formatting macros, creating graphics, and creating charts.

OO 266 MICROSOFT WORD 2007

Credits: 3 (F,S)
Prerequisite: CIT 110, OO 107, or instructor approval

Word processing software is used to create documents used in academic, professional, and business environments. These functions include editing, selecting, find and replace, document assembly, graphics, printing, headers and footers, columns, file management styles, math features, fonts and other print features, tables, sort and select, merges, macros, and reference tools.

OO 287 LEGAL TRANSCRIPTION

Credits: 4 (S)
Prerequisites: OO 260 or concurrent, OO 265 or OO 266

Students prepare legal documents and correspondence from machine dictation involving civil litigation, family law, probate, corporations, and real estate. Competencies in transcribing, document formatting,

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punctuating, spelling and utilizing legal terminology are important objectives of this course. Advanced word processing applications are emphasized.

OO 290 INSURANCE INTERNSHIP

Credits: 3 (S)
Prerequisites: Satisfactory completion of all courses in the program and/or consent of the Program director.

Students will gain practical experience in insurance billing by working in a variety of medical facilities where they will have the opportunity to apply concepts studied in the medical billing curriculum. Facilities will include dental and medical offices, health insurance companies, hospitals, and independent billing companies.

OO 295 ADMINISTRATIVE OFFICE PROCEDURES

Credits: 3 (S)
Prerequisites: OO 108, OO 265/266, or concurrent

This course is designed to equip students with knowledge of procedures along with basic attitudes and skills required of an office employee. Units include the role of the office professional, office organization, mail procedures, postal services, public relations, customer service, telephone techniques, schedules and appointments, travel arrangements, meetings and conferences, work prioritization, ordering and managing supplies, business research, job enhancement, and office management. Students will be required to assist in finding an appropriate Internship related to their field of study. This Internship must be approved by their instructor. Course should be taken during final spring semester.

PHILOSOPHY

PHIL 101 INTRODUCTION TO PHILOSOPHY

Credits: 3 (F based on sufficient demand)
An introduction to philosophy through examination of the thought of selected great philosophers or of traditional positions on classical philosophical problems.

PHIL 201 HISTORY AND PHILOSOPHY OF SCIENCE

Credits: 4 (F)
This course will explore the history of science from its classical beginnings to modern times. The development of the process and meaning of science will be emphasized. In particular, the philosophical basis of science as a way of knowing and understanding the world will be compared to other major areas of philosophy. Students will be engaged in group discussions and will make group and individual presentations. Students will also write several short papers and a research paper. This course will include guest lecturers.

PHIL 232 BASIC ETHICS

Credits: 3 (F based on sufficient demand)
This course introduces ethical theory through an examination of the major schools and the fundamentals of decision-making. It examines general moral theory and applies this theory to moral problems of historical and current interest.

PHIL 238 MEDICAL ETHICS

Credits: 3 (F, S based on sufficient demand)
This course provides a broad overview of the field of biomedical ethics. Topics discussed will include issues such as death and dying, human and animal experimentation, abortion, confidentiality, AIDS, the allocation of medical resources, as well as an examination of the codes of ethics of various health professions.

PHYSICAL SCIENCE

PHYS 110 SURVEY OF NATURAL SCIENCES

Credits: 4 (4 lecture) (F, S based on sufficient demand)
A course designed to introduce some of the basic aspects of the Biological, Physical, and Earth Sciences. The biology component will emphasize the structural and functional features of organisms, their classification, and their importance in the environment. The physical science component will present a non-mathematical approach to understanding some of the basic concepts in chemistry and physics. The earth science studies will focus upon the interrelationships between geology, paleontology, astronomy, meteorology and oceanography. This course is required for elementary education majors.

PHYS 130 FUNDAMENTALS OF PHYSICAL SCIENCE W/ LAB

Credits: 4 (3 lecture, 1 lab) (F, S, SU)
This course is an introduction to the fundamental behavior of energy and matter. It is divided into two sections: physics and chemistry. Topics discussed in the physics portion include: scientific measurement; motion; work and energy; heat and temperature; and waves (including sound and light). Topics discussed in the chemistry portion include: atomic structure; the periodic table of elements; chemical bonding and nomenclature; chemical formulas and equations; and solutions. Several lab experiments relating to some of these topics will be performed. No prior work in physics or chemistry is assumed for this course, although it is strongly recommended that students have good basic algebra skills.

POLITICAL SCIENCE

POLS 206 US GOVERNMENT

Credits: 3 (F, S)
This course examines the major institutions of national government and politics. Special emphasis is placed on the Constitution and other political rules of the game as shapers of public consciousness and government policy.

POLS 208 STATE & LOCAL GOVERNMENT

Credits: 3 (F, S)
This course seeks to understand and demonstrate the operation and structure of state, tribal, and local governments and how the federal government impacts them all.

PSYCHOLOGY

PSY 101 GENERAL PSYCHOLOGY

Credits: 3 (F,S,SU)
This course is an introduction to the nature and scope of the field of psychology as a scientific and human endeavor. Major topics include: historic development of the field; biological and developmental processes; consciousness and perceptions; learning, remembering, and thinking; motivation and emotion; personality and individuality; social behavior; normal stress and coping; and abnormal psychology and treatment methods.

PSY 109 LIFESPAN DEVELOPMENT

Credits: 3 (F,S,SU)
This course presents the study of human development throughout the lifespan. Study will include: the three domains of development (physical, cognitive and psychosocial); major theories; the influence of genetics; and prenatal development. The overall framework of the course is chronological dividing the lifespan into seven parts: infancy;

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early childhood; middle childhood; adolescence; early adulthood; middle adulthood; and late adulthood. This organization emphasizes the whole person and assists students to appreciate the ways in which the three domains of development continuously interact.

PHYSICAL THERAPIST ASSISTANT

PTA 100 INTRODUCTION TO PHYSICAL THERAPY

Credits: 3 (F)

Prerequisite: Acceptance into PTA program

Co requisites: PTA 101, 110, 205, 210

This course is designed to give the student an overview of the Physical Therapy profession by providing a historical perspective, as well as, an understanding of its philosophy in relation to the professional organization; an overview of the roles of the Physical Therapy staff members in the clinical setting, as well as, members of the health care team in various delivery systems; development of interpersonal communication skills relating to the profession; and understanding of the commitment of the graduate to continued personal and professional development.

PTA 101 PHYSICAL THERAPIST ASSISTING I / LAB

Credits: 4 (3 Lecture, 1 Lab) (F)

Prerequisites: Acceptance into PTA Program

Co requisites: PTA 100, 110, 205, 210

This is the first of three sequential skills and procedures courses in the PTA program. The following topics are covered: basic principles and procedures of physical therapy; basic care skills and application techniques; use of assistive devices; architectural and environment barriers; introduction to range of motion (ROM); introduction to pain theories, conditions, and assessment; and physiological principles, indications/contraindications, and application of physical agents discussed in lecture.

PTA 110 ISSUES IN PHYSICAL THERAPIST ASSISTING

Credits: 2 (F)

Prerequisites: Acceptance into PTA program

Co requisites: PTA 100, 101, 205, 210

This course provides a detailed overview of ethical, legal, and psychosocial issues relating to the role of the PTA in health care delivery. It includes such topics as the implications of chronic illness; the aging process and death/dying; client's role in health management; financing of physical therapy; regulations governing PTAs; code of ethics; and the PTA's role in departmental administration.

PTA 201 PHYSICAL THERAPIST ASSISTING II / LAB

Credits: 4 (3 Lecture, 1 Lab) (S)

Prerequisites: PTA 100, 101, 110, 205 with a grade of "C" or higher and PTA 210 with a grade of "Pass"

Co requisites: PTA 208, 211, 215, 220

This is the second in the series of procedures and application courses. The following topics are covered: theoretical principles and application of chest physical therapy, biofeedback, topical applications, electrotherapy, ultrasound, and ultraviolet; procedure and application of cervical and lumbar traction; gait analysis and training; theory and application of massage; measurements and principles of therapeutic exercise.

PTA 205 MOTION AND HUMAN BODY'S RESPONSE/ LAB

Credits: 4 (3 Lecture, 1 Lab) (F)

Prerequisites: Acceptance into PTA program

Co requisite: PTA 100, 101, 110, 210

This course is designed to provide the student with an understanding of: the human musculoskeletal system relative in the biomechanical elements of normal and abnormal human motion; physiology of exercise and its effects on movement and daily activity; and osteology and arthrology in relation to muscle action and joint mechanics. The study of goniometry, manual muscle testing, joint mobilization and athletic taping will also be presented.

PTA 208 INTRODUCTION TO NEUROSCIENCE

Credits: 3 (S)

Prerequisites: PTA 100, 101, 110, 205 with a grade of "C" or higher and PTA 210 with a grade of "Pass"

Co requisites: PTA 201, 211, 215, 220

This course is an introduction to neuroanatomy and neurology in relationship to neurological pathologies of the brain and spinal cord commonly treated by physical therapy. Structures and basic functions of the nervous system will be discussed.

PTA 210 CLINICAL EXPERIENCE I

Credits: 3 (F)

Prerequisites: Acceptance into the PTA program

Co requisites: PTA 100, 101, 110, 205

The purpose of this clinical affiliation is to provide the student with an opportunity to apply skills and techniques learned in PT 100, 101, and 110 under the appropriate supervision of the clinical instructor. This course will include a four-week clinical rotation at an approved site.

PTA 211 PHYSICAL THERAPIST ASSISTING III / LAB

Credits: 4 (3 Lecture, 1 Lab) (S)

Prerequisites: PTA 100, 101, 110, 205 with a grade of "C" or higher and PTA 210 with a grade of "Pass"

Co requisite: PTA 201, 208, 215, 220

Through this course the student is introduced to neurological development: normal vs. abnormal - birth through adult; disease processes and outcomes; and neurophysiological routines used for treatment. Principles and treatment of specific disabilities are also presented.

PTA 215 INTRODUCTION TO ORTHOPEDICS

Credits: 3 (2 Lecture, 1 Lab) (S)

Prerequisites: PTA 100, 101, 110, 205 with a grade of "C" or higher and PTA 210 with a grade of "Pass"

Co requisite: PTA 201, 208, 211, 220

This course introduces students to pediatric and adult musculoskeletal pathologies and management of orthopedic and surgical problems commonly seen by physical therapy. Course content will include: basic biomechanics and mechanisms of orthopedic injuries and diseases, survey of surgical repair with emphasis on rehabilitation, evaluation techniques and treatments used by physical therapists, theoretical application of therapeutic exercise programs and equipment commonly used for treatment of various orthopedic conditions and surgical procedures, and orthopedic pediatric treatment routines.

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PTA 220 CLINICAL EXPERIENCE II

Credits: 4 (S)
Prerequisites: PTA 100, 101, 110, 201, 205, 208, 211, 215 with a grade of "C" or higher and PTA 210 with a grade of "Pass"

Co requisite: PTA 201, 208, 211, 215

The students will continue to build on their clinical experiences from PTA 210 and implement knowledge gained from PTA 201, PTA 211, PTA 110, PTA 208, and PTA 215. This will consist of a six-week clinical rotation at an approved site.

PTA 225 SEMINAR AND PROJECT IN PHYSICAL THERAPIST ASSISTING

Credits: 3 (SU)
Prerequisites: PTA 100, 101, 110, 201, 205, 208, 211, 215 with a grade of "C" or higher and PTA 210, 220 with a grade of "Pass"

Co requisite: PTA 230

This concentrated course is designed to integrate skills and techniques from previous clinical experiences and from the course work presented throughout the PTA program. It focuses on presentation of comprehensive treatment plans utilizing all treatment skills and techniques learned during the previous semesters. The students will be expected to provide written reports including complete patient information and treatment plans and then present this information in the form of a case study/project. Research and current issues are discussed and presented. Students will be required to relate sociological, physical, and psychological aspects of illness and injury to their projects. A cumulative exam of the PTA curriculum, as well, as preparation for the state's licensure exam is covered in this course. Student questions and concerns are also addressed.

PTA 230 CLINICAL EXPERIENCE III

Credits: 5 (SU)
Prerequisites: PTA 100, 101, 110, 201, 205, 208, 211, 215 with a grade of "C" or higher and PTA 210, 220 with a grade of "Pass"

Co requisite: PTA 225

This is the third of three full-time affiliations/clinical experiences during which the student develops proficiency in physical therapy procedures, understanding of clinical responsibilities and supervisory relationships with a minimum competence necessary to graduate as an entry level physical therapist assistant and become an active participant of the health care team. This course will include an eight-week clinical rotation at an approved site.

RADIOLOGIC TECHNOLOGY

RAD 105 INTRODUCTION TO RADIOLOGIC TECHNOLOGY

Credits: 2 (S)
Prerequisite: Acceptance into RAD program

This course will introduce the student to the field of radiography and its various imaging modalities to prepare the student for what they will see and experience during their clinical rotations. It includes instruction in the areas of medical ethics and medico-legal aspects of radiographic imaging that will increase the awareness of the student to the legal responsibilities associated with radiographic imaging and an overview of pharmacology including contrast media, reactions to contrast media and electrical safety to aid the student in their clinical experience for those procedures that require the use of contrast media.

RAD 105 INTRODUCTION TO RADIOLOGIC TECHNOLOGY

Credits: 2 (F)
Prerequisite: Acceptance into RAD Program

This course will introduce the student to the field of radiography and its various imaging modalities to prepare the student for what they will see and experience during their clinical rotations. It includes instruction in the areas of medical ethics and medico-legal aspects of radiographic imaging that will increase the awareness of the student to the legal responsibilities associated with radiographic imaging and an overview of pharmacology including contrast media, reactions to contrast media and electrical safety to aid the student in their clinical experience for those procedures that require the use of contrast media.

RAD 110 RADIOGRAPHIC PROCEDURES I

Credits: 2 (F)
Prerequisite: Acceptance into RAD Program

In this course the student is introduced to the principles of radiographic positioning including the terminology involved, bone classifications, bone anatomy, bone pathology, and arthrology. Positioning, pathology, and radiographic procedures related to the abdomen and chest are also covered. Instruction will include lecture, audio/visual media and positioning demonstrations in a radiographic room.

RAD 111 RADIOGRAPHIC PROCEDURES II

Credits: 3 (S)
Prerequisite: RAD 110

This unit of instruction provides the student with the opportunity to learn the radiographic procedures associated with examinations of the upper extremity, lower extremity, and vertebral column. Modification of routine positioning to accommodate traumatized patients is also presented. Methods of instruction include lecture, audio/visual media, and positioning demonstrations in a radiographic room.

RAD 115 RADIOGRAPHIC PRINCIPLES I

Credits: 3 (F)
Prerequisite: Acceptance into RAD Program

This course takes the student through the analysis of a radiographic image from a quality standpoint and the various factors that influence the quality of the final radiographic image. Image evaluation and knowing how to correct poor images is essential in the performance of the radiologic technologist. Instruction methods will include lecture, audio/visual media, and the review of radiographic images to reinforce the information presented during the lectures.

RAD 116 RADIOGRAPHIC PRINCIPLES II

Credits: 3 (S)
Prerequisite: RAD 115

This course begins with basic principles of physics to prepare the student for instruction related to x-ray circuitry. As a technologist an understanding of x-ray circuitry helps to realize when machine failures occur and what can be done to reduce the likelihood of machine failure. Having a basic knowledge of x-ray circuitry can aid the technologist in describing machine problems to repair personnel so that repairs may be made more efficiently. Instruction methods will include lecture and audio/visual media.

RAD 120 RADIOBIOLOGY / RADIATION PROTECTION

Credits: 3 (F)
Prerequisite: Acceptance into RAD Program

This course will introduce the student to the concepts of radiation, sources of radiation, and the production of x-rays that are used for

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imaging areas of the body. The effects of radiation exposure on living tissues and the risks to both the exposed individual and the individual's offspring are also included. Methods utilized to reduce exposures to patients and personnel are also covered. Instruction methods will include both lectures and audio/visual presentations.

RAD 130 PATIENT CARE IN RADIOLOGY

Credits: 3 (S)
Prerequisite: Successful completion of the first semester RAD Program

This course is designed to introduce the student to techniques and procedures utilized to provide care to the patient in the Radiology Department. It will provide instruction in the areas of infection control, vital signs, venipuncture, and patient communication. This instruction is necessary to meet some of the General Patient Care requirements of the American Registry of Radiologic Technologists.

RAD 140 CLINICAL EDUCATION I

Credits: 6 (F)
Prerequisite: Acceptance into RAD Program

This aspect of the curriculum will involve time spent at the clinical education sites assisting with the performance of radiographic examinations on patients. Students will be given clinical rotations at each clinical site and attendance is mandatory. Students will be required to demonstrate competency in the operation and manipulation of the various types of radiographic equipment found at each clinical site during this time. Students will begin to document competencies on radiographic procedures during this time as well to meet the clinical competency requirements of the ARRT and the COT program.

RAD 141 CLINICAL EDUCATION II

Credits: 6 (S)
Prerequisite: RAD 140

The student will continue assisting in the performance of radiographic examinations on patients at the clinical sites. Students are expected to continue to improve clinical skills and to demonstrate competency in additional radiographic procedures involving the chest, abdomen including digestive and urinary systems, upper extremities, lower extremities, and vertebral column to meet the clinical competency requirements of the ARRT and the COT program. Students will be given clinical rotations at each clinical site and attendance is mandatory.

RAD 210 RADIOGRAPHIC PROCEDURES III

Credits: 4 (F)
Prerequisite: RAD 111

This unit of instruction will provide the student with positioning and procedures involving the cerebral cranium, visceral cranium, urinary system, digestive system, biliary tract, and mammography. Methods of instruction include lecture, audio/visual media, and positioning demonstrations in a radiographic room.

RAD 215 RADIOGRAPHIC PROCEDURES IV

Credits: 2 (S)
Prerequisite: RAD 210

This course introduces the student to angiographic imaging and includes instruction on angiographic procedures and the equipment necessary to perform angiography. It will include common pathologic conditions that require angiographic studies and the radiographic appearance of these pathologic conditions. Several therapeutic procedures performed through angiographic methods are also included.

RAD 220 RADIOGRAPHIC PRINCIPLES III

Credits: 2 (F)
Prerequisite: RAD 116

This course will include instruction covering the interaction of radiation with atoms of the body, computer applications in radiology including computer terminology applicable to radiology systems, and an introduction to quality assurance testing that is performed within the radiology department to insure quality imaging can be provided. Instruction methods will include lecture and audio/visual media.

RAD 240 RADIOGRAPHIC INTERNSHIP

Credits: 3 (SU)
Prerequisite: RAD 141

This course is to provide the student with the opportunity to practice in an internship setting. The internship will be for eight weeks at 40 hours per week. The student will be required to continue to demonstrate competency in new radiographic procedures to meet the clinical competency requirements of the ARRT and the COT program. Attendance is mandatory and will be monitored with the use of a time clock and time cards. Radiation monitoring devices must be worn at all times while in clinical education and possession of the device may be checked on site by the staff.

RAD 241 CLINICAL EDUCATION III

Credits: 6 (F)
Prerequisite: RAD 240

This course is a continuation of RAD 240 and provides the student with the opportunity to improve clinical skills learned during their first year and to demonstrate clinical competency in more advanced radiographic procedures. In addition to previous clinical assignments, the student will be scheduled for clinical observations in areas of specialized imaging including CT, MRI, and ultrasonography. The student will be required to continue to demonstrate competency in new radiographic procedures to meet the clinical competency requirements of the ARRT and the COT program.

RAD 242 CLINICAL EDUCATION IV

Credits: 6 (S)
Prerequisite: RAD 241

This is the final clinical rotation period for the student. During this time the student is expected to finish the clinical competency requirements of the ARRT and COT program. In addition to normal clinical rotations at each clinical site, the student will be provided clinical observation rotations in the areas of nuclear medicine and radiation therapy.

RAD 270 REGISTRY REVIEW

Credits: 2 (S)

This course will begin the review process to prepare the student for the certification examination provided by the American Registry of Radiologic Technologists (A.R.R.T.) which is taken after graduation from the clinical portion of the program. It will involve review testing to identify those areas of the didactic curriculum in which the students have their greatest weaknesses followed by classroom discussion. This allows the review to be more focused to the needs of the students. Computerized testing is also utilized to prepare the student for the testing format utilized by the A.R.R.T.

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RESPIRATORY CARE

RC 140 RESPIRATORY CARE CLINIC I

Credits: 5 (S)
Prerequisite: Consent of faculty

Students will gain knowledge through supervised experiences in hospital patient care, techniques, and equipment. Emphasis is on patient contact, medical gases, hyperinflation, equipment, percussion, humidity and aerosol therapy, airway management, and secretion management. Safety and environmental awareness will be covered in all clinical courses.

RC 141 RESPIRATORY CARE CLINIC II

Credits: 5 (SU)
Prerequisite: RC 140

Students will have supervised experiences in hospital patient care, techniques, and equipment. The previous clinical techniques will be expanded with emphasis on IPPB, artificial airway suctioning, chest physiotherapy, medication nebulization, EKGs, chest assessment, and continuous mechanical ventilation.

RC 150 RESPIRATORY CARE

Credits: 3 (F)

Respiratory Care introduces new respiratory therapist students to the field of respiratory care. Course content includes respiratory care organizations, physical principles in respiratory care, medical terminology, respiratory drugs, medical ethics, and patient communications.

RC 155 RESPIRATORY PHYSIOLOGY

Credits: 3 (F)
Respiratory Physiology covers structures and functions of the circulatory and respiratory systems. Topics studied are blood, the heart, blood vessels, respiratory structure, the physics of gas pressure, ventilation, regulation of ventilation, O₂ and CO₂ transport, ventilation and perfusion balance, acid-base balance, and interpretation of arterial blood gases.

RC 170 RESPIRATORY CARE TECHNIQUES AND PROCEDURES

Credits: 5 (F)
Knowledge and skills taught will provide students with the theories, principles, and laboratory experience in the areas of medical gas therapy and aerosol and humidification therapy in the use of hyperinflation devices and chest physical therapy. An introduction to infection control, body mechanics, gas analyzers, artificial airways, manual resuscitators, secretion removal, and safety and environmental awareness will be studied.

RC 171 RESPIRATORY CARE TECHNIQUES AND PROCEDURES II

Credits: 5 (S)
Prerequisite: RC 170

Knowledge and skills taught will provide students with the theories, principles, and laboratory experience in the areas of adult and infant mechanical ventilation. Ventilators including but not limited to: Nellcor Puritan Bennett 7200ae and 840, Siemens Servo 900C and 300a, Sensormedics 3100A High Freq. Oscillator, Repironics BiPaP Vision, and the Infrasonics Infant Star 500. Other areas such as arterial blood gas techniques, transcutaneous gas monitoring, hyperbaric oxygen therapy, mixed gas therapy, discontinuance of mechanical ventilation, trouble shooting during mechanical ventilation, techniques of ventilation,

ventilator waveforms and high frequency ventilation will also be investigated.

RC 180 VENTILATOR MANAGEMENT

Credits: 2 (S)

This course covers ventilator management of the adult patient in the intensive care setting. Content includes oxygenation and ventilation, ventilation techniques, equipment, and monitoring.

RC 240 RESPIRATORY CARE CLINIC III

Credits: 6 (F)

RC 241 RESPIRATORY CARE CLINIC IV

Credits: 6 (S)

Students will be supervised in in-hospital practice of advanced therapeutic and diagnostic respiratory care procedures including pulmonary function testing, arterial blood gases, intubation, continuing education, pulmonary rehabilitation, newborn and adult intensive care, and supervisory management. These courses extend through two semesters.

RC 245 RESPIRATORY CARE CLINICAL SEMINAR I

Credits: 1 (F)

This course is concurrent with Respiratory Therapy Clinical (RC 240-241)

The purpose for this course is to provide students with an opportunity to share significant clinical experiences, to present clinical problems, to practice communication skills, and the presentation of student in-services. The student will learn to take the NBRC (National Boards) Clinical Simulation Examination. Complete job seeking skills will be taught.

RC 246 RESPIRATORY CARE CLINICAL SEMINAR II

Credits: 1 (S)

This course is concurrent with Respiratory Therapy Clinical (RC 240-241)

The purpose for this course is to provide students with an opportunity to share significant clinical experiences, to present clinical problems, to practice communication skills, and the presentation of student in-services. The student will learn to take the NBRC (National Boards) Clinical Simulation Examination. Complete job seeking skills will be taught.

RC 250 HEMODYNAMIC MONITORING

Credits: 3 (F)

Hemodynamic Monitoring covers the management of the circulatory system in the intensive care setting. Content includes ECG interpretation, monitoring, and management of cardiac function.

RC 255 PULMONARY ASSESSMENT

Credits: 3 (S)

Prerequisite: Instructor approval

This course is a study of the diagnostic techniques and procedures including interview and history taking, chest assessment, chest radiology, laboratory findings, and arterial blood gases and an introduction to pulmonary function testing. Information will be used to investigate pulmonary diseases.

RC 260 NEONATAL RESPIRATORY CARE

Credits: 3 (SU)

Neonatal Respiratory Care is an infant intensive care course. The student will study fetal to neonatal transition, assessment of the newborn, cardiopulmonary disorders of the newborn and respiratory therapeutic procedures for the newborn.

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RC 265 RESPIRATORY CARE IN ALTERNATIVE SITES

Credits: 1 (F)
Prerequisite: Consent of faculty

Rehabilitation for the chronic lung disease patient is stressed in this course. Areas discussed include selection of candidates, assessing pulmonary dysfunctions, rehabilitation techniques, biofeedback, home oxygen therapy, psychological factors, patient education, starting a pulmonary rehabilitation program, home care, and patient nutrition.

RC 273 PULMONARY FUNCTION TESTING

Credits: 1 (F)
Pulmonary Function Testing is a study of pulmonary diagnostic testing.

Course content includes pulmonary function normal values, lung volume tests, ventilation and ventilatory control tests, spirometry, gas distribution tests, diffusion tests, pulmonary function equipment, and quality assurance in the pulmonary function lab.

RC 275 PULMONARY DISEASES

Credits: 2 (S)

Pulmonary Diseases surveys etiology, epidemiology, diagnosis, pathology, treatment, and prognosis of diseases of the lungs and diseases which affect the lungs. Diseases studied include pneumonia, tuberculosis, fungal diseases, asthma, RDS, COPD, sleep apnea, pulmonary embolus, cystic fibrosis, lung cancer, and AIDS.

RC 280 SUPERVISORY MANAGEMENT

Credits: 2 (S)

The objective of this course is to provide students with the information and skills to facilitate the transition from respiratory therapist to respiratory supervisor. The areas investigated include interpersonal communications, planning, organizing, staffing, influencing, and motivating. Practical respiratory supervisory case studies provide student participation requiring role-playing in interpersonal communications, problem solving, and critical thinking. This course will include subsistence patterns, social structures, values and beliefs across past and modern cultures.

SOCIOLOGY

SOC 111 INTRODUCTION TO SOCIOLOGY

Credits: 3 (F,S,SU)

This course offers exposure to fundamentals, perspectives, and terminology of sociology. It includes the study of society and human interaction as it is shaped by social structure and culture. Students also survey the interdependence of social institutions including family, religions, economics, politics, education and occupation, as well as population changes, social differentiation, inequality, deviance, conformity, modernization, social order, and social changes.

SOC 115 SURVEY OF CRIMINAL JUSTICE

Credits: 3 (F based on sufficient demand)

This course offers exposure to the fundamental perspectives and terminology of the criminal justice system in the United States. It includes the study of the interaction of the individual with the criminal justice system. Students will also examine the causes of criminal behavior and the history, influences, and related fields of knowledge that are connected to the criminal justice system. Topics will include responsibilities of agencies, roles of personnel, and the inter relationships of criminal justice to political agencies and other factors that influence the criminal justice system.

SURGICAL TECHNOLOGY

SURG 102 SAFE PATIENT CARE & OPERATING ROOM TECHNIQUES

Credits: 5 (F)
Co-requisite: SURG 104

This course prepares students for the scrub and circulator roles of surgical technology, emphasizing the competencies involved, as well as the responsibilities of the surgical technologist.

SURG 104 SURGICAL TECHNOLOGY LAB

Credits: 7 (F)
Prerequisite: Consent of faculty

Co-requisite: SURG 102

An introduction to the physical organization of the surgical suite, including observation of surgical procedures and demonstrations of operating room techniques.

SURG 105 SURGICAL PROCEDURES I

Credits: 4 (F)
Co-requisite: SURG 104, SURG 192

This course familiarizes students with the surgical technologist's role during surgical procedures in the pre-operative, intra-operative, and post-operative stages.

SURG 106 SURGICAL PROCEDURES II

Credits: 5 (S)
Co-requisite: SURG 192, SURG 193

This course familiarizes students with the surgical technologist's role during surgical procedures in pre-operative, intra-operative, and post-operative stages.

SURG 109 SURGICAL PROCEDURES LAB I

Credits: 2 (F)
Co-requisite: SURG 102

This course is designed to go hand-in-hand with the SUR 101 course, which will be concurrently given on-line by UM/COT. This course will present entry level responsibilities and competencies of the surgical technologist and related nursing procedures in both the scrub and circulator roles. This course will include lecture, as well as hands-on, problem solving sessions and clinical observations.

SURG 110 SURGICAL PROCEDURES LAB II

Credits: 5 (F)
Co-requisite: SURG 102

This course is designed to go hand-in-hand with the SUR 101 course, which will be concurrently given on-line by UM/COT. This course will present entry level responsibilities and competencies of the surgical technologist and related nursing procedures in both the scrub and circulator roles. This course will include lecture, as well as hands-on, problem solving sessions and clinical observation experiences.

SURG 192 CLINICAL EXPERIENCE I

Credits: 4 (S)

This course will provide a supervised clinical experience in surgical settings providing scrub, assisting, and circulating experience on surgical procedures level I and level II. Each student will be assigned a specific surgical facility, and then assigned a specific preceptor who will become their daily on-site clinical mentor. In addition to the clinical experience, student will have a weekly debriefing facilitated by the instructor in order to share clinical experiences and learn from each other.

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SURG 193 CLINICAL EXPERIENCE II

Credits: 4-5 (S)
This course will provide a supervised clinical experience in surgical settings providing scrub, assisting, and circulating experience on surgical procedures level I and level II as in Clinical I. However, a greater degree of proficiency and independence will be expected from the student. Each student will be assigned a specific surgical facility, and then assigned a specific preceptor who will become their daily on-site clinical mentor.

SURG 194 INTERNSHIP

Credits: 4-5 (SU)
Prerequisite: Instructor approval and all SURG classes with a grade of "C" or higher
This course will provide a minimally supervised clinical experience in surgical settings providing scrub, assisting and circulating experience on surgical procedures level I - III. However, a greater degree of proficiency and independence will be expected from the student. The internship develops the student's competencies as a first scrub on surgical procedures, and acquaints them with the professional expectations of surgical technologists as a capstone experience preparing them for initial employment. The course provides the student with the actual experience in surgical procedures, team work, flexibility, organization and efficiency. In addition, the student will learn how to prepare all supplies and equipment used in the operating room in preparation for surgical procedures.

AUTO BODY REPAIR & REFINISHING

TB 112 AUTO AND PAINT SHOP SAFETY

Credits: 1 (F)
A departmental orientation for new students in classroom and lab policies and procedures will be conducted in this course. Specialized tools used in the auto repair industry, shop safety, paint guns, hydraulic equipment, and air compressors, the proper use and care of personal safety equipment, and the safe handling and disposal of various chemicals are introduced.

TB 130 BASIC AUTO CONSTRUCTION

Credits: 2 (F)
This course will introduce students to the automotive body-repair business. Technical aspects of the auto design, the construction materials, as well as the classroom study of damage classification and repair techniques will be introduced. The theory and practice of welding thin gauge mild steel with a MIG welder will be taught.

TB 134 CORRECTING SHEET METAL

Credits: 3 (F)
Prerequisite: TB 130
Theory and practice in manipulative skills are given in this course. Students will receive instruction and lab experience in roughing, bumping metal, shrinking, fillers and sanding.

TB 136 CORRECTING COLLISION DAMAGE

Credits: 5 (S)
Prerequisite: TB 134
This course involves the study of impact forces and the transfer of energy through a vehicle. Students will study the unit-body and full-framed vehicle locating primary and secondary damage.

TB 141 SURFACE PREPARATION AND UNDERCOATS

Credits: 3 (F)
Beginning students in refinishing will be given theory and laboratory experience with metal conditioners, wax and grease removers, and primers. Students will work with lab test panels only.

TB 142 TOP COAT APPLICATION

Credits: 3 (F)
Students will study lacquer top coats including clear coating, metallic colors, and sealers. Students will work with lab test panels only.

TB 150 PAINT REMOVAL

Credits: 3 (S)
Prerequisite: TB 141
Students will evaluate and study the condition of old paint film and its thickness as well as analyze the most efficient way of removal using chemical strippers, bead blasters, or mechanical sanders.

TB 153 OVERALL REFINISHING

Credits: 3 (S)
Prerequisite: TB 142
This course includes a comprehensive study of auto refinishing techniques. Students will develop skills in sanding and masking operations used to properly refinish a complete automobile with acrylic enamel.

TB 154 PAINT PROBLEMS

Credits: 1 (S)
Co requisite: TB 153
Students will participate in laboratory practice and preparation to determine the causes of various paint failure due to break down, improper preparation, incompatible materials, wrong use of materials, or poor spray techniques.

TB 220 FIBERGLASS AND PLASTIC REPAIR

Credits: 3 (F)
Prerequisite: TB 136
Students will study repair and replacement of fiberglass and S.M.C. panels. Students will gain practical experience in welding procedures for soft, and rigid plastics. They will identify the various types of plastics used in the construction of internal and external body panels. Students will learn to use flexible fillers, primers and paints.

TB 243 PANEL REPLACEMENT

Credits: 3 (F)
Prerequisite: TB 136
This course will give students practical experience in removal and replacement of weld on panels, door skins, and rocker, quarter and top panels.

TB 245 PRODUCTION BODY REPAIR

Credits: 3 (S)
Prerequisite: TB 243
In this course, students' work will be compared to industry flat rate charges used when repairing damage. The learning experiences are simulated to on-the-job work conditions stressing quality and shop flat-rate time. Students will be expected to function as an employer would expect in areas such as dependability, working independently, and customer relations.

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TB 246 TOTAL BODY REBUILDING AND SECTIONING

Credits: 3 (S)
This course covers the theory and practice in the use of body measuring equipment including tram gauges and centering gauges. Students will use frame and body pull systems to return a lab vehicle to its proper dimensions and will study the theory of full-body sectioning and proper use of recycled parts.

TB 248 SPOT REPAIR AND BLENDING

Credits: 3 (F)
Co requisite: TB 153
Students will have the opportunity in this course to obtain practical experience in color sanding, compounding, masking, and blending methods used in spot repairing.

TB 249 PAINT FORMULATION AND TINTING

Credits: 3 (F)
Co requisite: TB 248
This course provides instruction and practice in the process of mixing paint from tinting colors. Assigned lab projects will give students the opportunity to mix, adjust, and tint to match the existing color.

TB 250 PRODUCTION REFINISHING

Credits: 3 (S)
Prerequisite: TB 249
Emphasis in this course will be on refining skills and increasing productivity and will be timed for comparison with industry standards.

TB 254 SPECIALTY FINISHES

Credits: 1 (S)
Prerequisite: TB 253
This course provides instruction and practical experience in custom finishes as well as new production applications. Students will receive instruction and lab experience using gel-coating, metal flake, pearl, and candy.

TB 255 ESTIMATING COLLISION DAMAGE

Credits: 3 (S)
This course will focus on instruction in the procedures of estimating collision and refinishing repairs. A study will be made of parts catalogs, flat-rate manuals, and computer estimation programs.

THEATER

THEA 101 INTRO TO THEATER AND THE PERFORMING ARTS

Credits: 3 (S based on sufficient demand)
This course provides an introduction to performing arts with an emphasis on theatre, and the background and theories of theater arts, but also touches on music performance, dance, film, television and radio, their history and influence on society, especially as they relate to the theatre. In this course there is no assumption that the student has a practitioner's interest in arts. Focus is on enabling the student to become a more sophisticated consumer and critic of performing arts through reading a viewing of selected works. In addition, student will gain some actual, practical experience in performance, the better to understand what may be required in order to perform.

THEA 103 FUNDAMENTALS OF ACTING

Credits: 3 (F based on sufficient demand)
This is a beginning performance class. It is designed to equally meet the needs of students who might later choose to pursue a career in the performing arts and for those students who want to develop a working acquaintance with performance and to develop performance skills through both group experience and individualized instruction. The course focuses on developing and understanding the essential theories of acting as well as the effective application of these theories in artistic expression.

WELDING TECHNOLOGY

WELD 101 WELDING THEORY I THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 1 (F)
This course covers welding safety, oxy-fuel and shielded metal arc welding (SMAW), definitions covering joining common metals, joint and weld classifications, welding positions, power source selection, plus manual and semiautomatic cutting principles, and terminology.

WELD 102 WELDING PRACTICAL I THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (F)
Corequisite: WELD 101
Oxy-fuel practical work will involve fusion welding, brazing, and cutting. Shielded metal arc welding (SMAW) practical work will involve flat and horizontal welding skills using a variety of electrodes.

WELD 103 WELDING THEORY II THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 1 (S)
Corequisite: WELD 104
Prerequisites: WELD 101, WELD 102

This course will concentrate on the processes which use inert and/or inert and active gas mixtures for shielding during welding. Gas metal arc welding (GMAW) or MIG, gas tungsten arc welding (GTAW) or TIG, and plasma welding and cutting (PAW/PAC) operations will be thoroughly covered. Process selection and use for welding ferrous and nonferrous metals will be covered.

WELD 104 WELDING PRACTICAL II THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (S)
Corequisite: WELD 103
Prerequisites: WELD 101, WELD 102

Practical work involves the application of GMAW and GTAW as it is used in industry today. Use of the various modes of metal transfer, joint styles, welding positions, welding of carbon and stainless steels, and aluminum alloys on various joint styles and in various welding positions, and manipulation techniques will be emphasized.

WELD 110 APPLIED METALLURGY

Credits: 2 (F)
This course covers basic metallurgical principles and their relationship to the following processes: welding, machining, forming, heat treating, and finishing of ferrous and nonferrous metals. Includes applied metallurgy lab testing exercises.

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WELD 117 FABRICATION BASICS THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (S)

Prerequisites: WELD 101, WELD 102, WELD 110

Corequisites: CNST 109, WELD 103, WELD 104

This course focuses on the skills needed to accurately fabricate weldments from intermediate to advanced welding blueprints. Students will construct numerous projects using various layout techniques combined with a wide range of cutting and welding processes. Student will learn to control warping and distortion with different techniques, so the finished projects will meet the most exacting industry standards.

WELD 1119 INTRODUCTION TO STRUCTURAL WELDING THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 3 (F)

Prerequisites: WELD 101, WELD 102, WELD 110

CorequisiteS: CNST 109, WELD 103, WELD 104

This course covers gas metal arc welding (GMAW) of structural steel and stresses certification code welding on plate and structural steel in all positions. Course instruction and related information will include gas metal and flux core arc welding equipment and welding variables, shielding gases, troubleshooting equipment and weld defects, welder certification and welding codes.

WELD 126 WELDING QUALIFICATION PREPARATION THIS CLASS OFFERED AT THE COT IN BOZEMAN

Credits: 2 (S)

Prerequisites: WELD 101, WELD 102

Corequisites: WELD 103, WELD 104

This is an advanced course in shielded metal arc welding (SMAW) and gas metal arc welding (GMAW) procedures to prepare for industrial certification. This includes welding single vee groove weld-but joints with backing strips in the flat, horizontal, vertical, and overhead position following the American Welding Society (AWS) and the American Society of Mechanical Engineers (ASME) code specifications.

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Vance Weckworth Office Technology
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Mary Wisman Interior Design
Mandy Lynn Wright-Knight English
Mark Yaeger Construction Design
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Montana State University - Great Falls College of Technology

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Courtney Brooks.....Bookstore
Sandy Brown.....Cafeteria
Kirsten Bryson Library
Pamela Buckheit..... Business & Technology Dept
Staci Campbell..... Accounts Receivable
Elizabeth Chappie Zoller COT-Bozeman
Marie Cherry Accounting
Delisa Clampitt Student Services
Thomas Cole..... Computer Support
Dwight Cook Maintenance
Paige Culver Admissions
Lou Desaveur Dreiling..... Outreach
Thomas Degel..... Registrar's Office
Gerald Eberl..... Maintenance
Kelli Engelhardt..... Financial Aid
Art England..... Maintenance
Marianne Frank Information Desk
Lee Anne Gills.....Arts & Sciences Dept
Kathleen Haggart..... Payroll
Nancy Hall Library
Steven Halsted.....Bookstore
Jerome Heithoff..... Maintenance
Jillian JacobsonBookstore
Lorene Jaynes Associate Dean's Office
Dianna Klopfenstein Accounts Receivable
Monica Knock Interpreter
Patricia Laird..... Dental Hygiene
Michael LoganCafeteria
Jack Logozzo Maintenance
Fanci Pulliam Admissions
Willie McGee Computer Support
Gail Mooney Academic Resources
Natalie Nefzger Recruiter
Heather Palermo Dean's Office
Dustin Ratliff.....Bookstore
Deborah Richerson Outreach
Julie Rummel Financial Aid
Jennifer Schade Health Sciences
Eugene StewartAutobody/Maintenance

Leslie SullivanCollege Relations
James SweatPrint Center
Susan Thomas.....Facility Coordinator
Karen Vosen.....Distance Learning
Ronald Wynegar Maintenance

Institutional Accreditation

MSU – Great Falls College of Technology

Accredited through the Northwest Commission on Colleges and Universities, one of six regional accrediting associations in the United States.

The Northwest Commission on Colleges and Universities (NWCCU) is an independent, non-profit membership organization recognized by the U.S. Department of Education and the Council for Higher Education Accreditation (CHEA) as the regional authority on educational quality and institutional effectiveness of higher education institutions in the seven-state Northwest region of Alaska, Idaho, Montana, Nevada, Oregon, Utah, and Washington. It fulfills its mission by establishing accreditation criteria and evaluation procedures by which institutions are reviewed.

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Program Accreditation

PRACTICAL NURSE PROGRAM

Approved by the Montana State Board of Nursing
Health Care Licensing Bureau
301 South Park, Room 430
PO Box 200513 Helena, MT 59620-0513
Tel (406) 841-2300 Receptionist

DENTAL ASSISTING

Accredited by the American Dental Association
Council on Dental Education
211 East Chicago Avenue
Chicago, Illinois 60611
Tel (312) 440-4653

DENTAL HYGIENE

Accredited by the American Dental Association
Commission on Dental Accreditation
211 East Chicago Avenue
Chicago, Illinois 60611
Tel (312) 440-4653

HEALTH INFORMATION CODING SPECIALIST

American Health Information Management Association (AHIMA)
Assembly on Education
233 N. Michigan Avenue, Suite 2150
Chicago, IL 60601-5800
Tel (312) 233-1100

HEALTH INFORMATION TECHNOLOGY

Commission on Accreditation for Health Informatics and
Information Management Education (CAHIIM)
Accreditation Services
c/o AHIMA
233 N. Michigan Ave, Suite 2150
Chicago, IL 60601-5800

RESPIRATORY CARE

Commission on Accreditation of Allied Health Education Programs
(CAAHEP)
1361 Park Street
Clearwater, FL 33756
Tel (727) 210-2350

Committee on Accreditation for Respiratory Care (CoARC)

1248 Harwood Road
Bedford, TX 76021-4244
Tel (817) 283-2835

SURGICAL TECHNOLOGY

Commission on Accreditation of Allied Health Education Programs
(CAAHEP)
35 East Wacker Drive
Suite 1970
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Technology(ARC-ST)
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