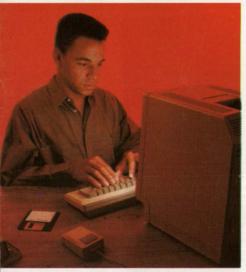
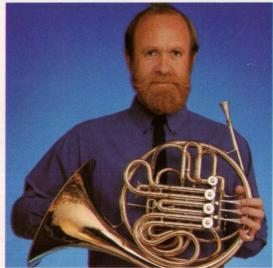


## 1990-91 Mountain View College Catalog

College Catalog

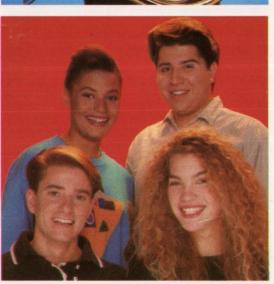
Dallas County
Community College District





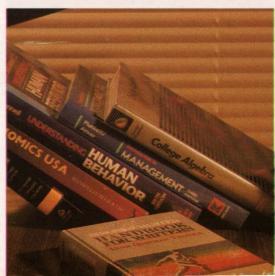














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## 1990-91 Mountain View College Catalog

**Dallas County Community College District** 



Mountain View College 4849 West Illinois Avenue Dallas, Texas 75211 Call for information: Admissions, 333-8600 Counseling, 333-8606

This catalog contains policies, regulations, and procedures in existence at the time this publication went to press. The District Colleges reserve the right to make changes at any time to reflect current Board policies, administrative regulations and procedures, and applicable State and Federal regulations. This catalog is for information purposes and does not constitute a contract.

This publication prepared by the Dallas County Community College District Office of Public Information.

The Dallas County Community College District is an equal opportunity institution.

### **TEXAS ACADEMIC SKILLS PROGRAM AND** THE DALLAS COUNTY COMMUNITY COLLEGES

In 1987, the Texas Legislature passed House Bill 2182. This bill, which became effective with the 1989 Fall Semester, requires that all Texas public college and university students be tested for reading, writing and mathematics skills. This legislation applies to students enrolling in the Dallas Community Colleges - Brookhaven, Cedar Valley, Eastfield, El Centro, Mountain View, North Lake and Richland.

Q. What is the Texas Academic Skills Program (TASP)?

A. TASP is a diagnostic testing program to assess the academic skills of students entering Texas public colleges and universities. It is designed to determine if students have the reading, writing and math skills necessary to succeed in college courses. The results of the test will point to specific academic strengths and weaknesses and will help advisors and counselors place students in courses in which they can do well and develop the necessary skills for college success. If students score poorly in one or more areas of the test, TASP requires them to enroll in Developmental Studies courses or participate in appropriate remediation until all sections of the test are passed.

Q. Who must take the TASP test?

A. Since the Fall 1989 semester, all college students have been expected to take TASP either before or during the semester of completing 15 college-level credit hours. More specifically, students desiring an Associate of Arts and Sciences Degree, an Associate of Applied Arts and Sciences Degree, a bachelor's degree or students planning to become a certified teacher in Texas MUST take and pass TASP.

Q. Are there any exemptions from taking the TASP test?

A. Students who have completed at least three (3) credit hours of college-level work prior to the 1989 Fall Semester will be exempt from taking TASP. Courses that count toward this exemption are those taken at the DCCCD or other regionallyaccredited colleges or universities, and which will count toward graduation; also, various credit-by-exam programs taken prior to Fall 1989 will result in an exemption.

The following DCCCD courses or their equivalents will NOT count toward the three hours: Any course numbered below 100, Art 199, College Learning Skills 100, Developmental Communications 120, Human Development 100, Human Development 110, Library Skills 101, Music 199, and Theatre 199. Other exemptions: Students enrolled in a DCCCD academic program leading to a certificate; blind or deaf students (until 9-1-91).

Q. Must a student take TASP prior to entering a DCCCD college?

- A. No, it is not necessary that a student take TASP prior to enrolling. However, DCCCD students must take TASP prior to completing fifteen (15) hours of college-level courses. In most cases, 5 courses will equal 15 hours of credit.
- Q. If students must take TASP by the completion of their 15th credit hour, does this mean they must pass TASP by that same time?
- A. No, students are required only to take TASP prior to completing their 15th credit hour. If students do not "pass" a section or sections of TASP, they will have the opportunity to improve their skills. Students must pass all sections of TASP before they can be awarded a degree from the DCCCD. Students who transfer to a four-year state college or university will not be allowed to take junior or senior courses until they have passed all sections of TASP.

Q. How and when will the TASP test be given?

A. The three-part (reading, writing and mathematics) test will be given on a statewide basis at designated testing sites, much like the SAT and ACT tests. Each DCCCD college is a test site. During 1990, the test will be given on June 30, September 22, and November 17. Tentative test dates for 1991 are February 16, April 20 and June 15. TASP registration materials are available in the Counseling Centers and/or Testing Centers of each of the DCCCD colleges.

Q. What is the cost of the TASP test? Is there a study guide available?

A. The cost for the total test is \$24. An Official TASP Study Guide can be purchased in DCCCD College Book Stores or it can be ordered by writing to TASP Project, P.O. Box 1403478, Austin, Texas, 78714-0347. The cost of the Study Guide is \$12. Study Guides are available for reference use in each of the DCCCD ∞llege libraries.

Q. How will TASP affect students planning to attend a DCCCD college?

Students planning to attend a DCCCD college will continue to complete the usual steps for enrollment. TASP scores should be reported after being admitted by those who have taken TASP. However, for students who have not taken TASP, the college will indicate whether or not they should take the DCCCD's assessment test. Then, before completing their 15th credit hour, students must take the TASP test.

Q. Are students transferring into the DCCCD required to take TASP?

A. Unless the transfer student qualifies for one of the exemptions discussed above, he or she is required to take TASP. Transfer students from another Texas public college/university are expected to take TASP no later than the semester of enrollment in 15 college-level credit hours, and the hours earned at other Texas public colleges ARE USED in computing the 15 credit hours. Hours earned at private or out-of-state colleges/universities ARE NOT used in computing such 15 credit hours.

If you would like more information on the Texas Academic Skills Program, please contact the college's Counseling Center.

## **Academic Calendar for 1990-91**

### Summer Sessions, 1990

First Summer Sessi	on: (Based on a 4 day class week, except for first week*)
May 28 (M)	Memorial Day Holiday
May 30 (W)	Registration (Richland Only)
May 31 (R)	Registration (All Campuses)
June 4 (M)	Classes Begin
June 7 (R)	4th Class Day
*June 8 (F)	Class Day (Only Friday Class Day)
June 21 (R)	Last Day to Withdraw with a Grade of "W"
July 4 (W)	Fourth of July Holiday
July 5 (R)	Final Exams
July 5 (R)	Semester Closes
Julý 9 (M)	Grades Due in Registrar's Office by 10:00 a.m.

## Second Summer Session: (Based on 4 day class week except for first week\*)

July 11 (W) July 12 (R)	Registration (All Campuses) Classes Begin
*July 13 (F) July 17 (Γ)	Class Day (Only Friday Class Day) 4th Class Day
August 2 (R)	Last Day to Withdraw with a Grade
August 14 (T) August 14 (T) August 16 (R)	of "W" Final Exams Semester Closes Grades Due in Registrar's Office by 10:00 a.m.

### Fall Semester, 1990

•	an Jemester,	, 1330
	August 20 (M)	Faculty Reports
	August 20-23	Registration Period
	(M-R)	(Varies by Campus)
	August 24 (F)	Faculty Professional Development
	August 24 (F)	Friday Only Classes Begin
	August 25 (S)	Saturday Only Classes Begin
	August 27 (M)	Classes Begin (M-R Classes)
	August 31 (F)	No Friday Only Classes
	September 1 (S)	No Saturday Only Classes
	September 3 (M)	Labor Day Holiday
	September 8 (S)	12th Class Day
	September 22 (S)	TASP Test Administered
	November 1 (R)	Last Day to Withdraw with a Grade of "W"
	November 17 (S)	TASP Test Administered
	November 22 (R)	
	November 26 (M)	Classes Resume
	December 7 (F)	Final Exams for Friday Only
		Classes
	December 8 (S)	Final Exams for Saturday Only Classes
	December 10-13 (M-R)	Final Exams for M-R Classes
	December 13 (R)	Semester Ends
	December 17 (M)	Grades due in Registrar's office
	` ,	by 10 a.m.
	December 25 (T)	College Buildings and Offices Closed
		for the Holidays

### Spring Semester, 1991

- p	
January 2 (W)	College Buildings and Offices Reopen
January 7 (M)	Faculty Reports
January 7-10	Registration Period
(M-R)	(Varies by Campus)
January 11 (F)	Faculty Professional Development
January 11 (F)	Friday Only Classes Begin
January 12 (S)	Saturday Only Classes Begin
January 14 (M)	Classes Begin (M-R Classes)
January 21 (M)	Martin Luther King, Jr. Day Holiday
January 25 (F)	12th Class Day
February 16 (S)	TASP Test Administered
February 21 (R)	District Conference Day
February 22 (F)	Faculty Professional Dévelopment
	(TJCTA)
February 22 (F)	No Friday Only Classes
February 23 (S)	No Saturday Only Classes
March 18 (M)	Spring Break Begins
March 22 (F)	Spring Holiday for All Employees
March 25 (M)	Classes Resume
March 28 (R)	Last Day to Withdraw with a Grade
	of "W"
March 29 (F)	Holidays Begin
April 1 (M)	Classes Resume
April 20 (S)	TASP Test Administered
May 3 (F)	Final Exams for Friday Only
May 4 (C)	Classes
May 4 (S)	Final Exams for Saturday Only
May C O (M D)	Classes
May 6-9 (M-R)	Final Exams for M-R Classes
May 9 (R)	Semester Ends
May 9 (R)	Graduation
May 13 (M)	Grades due in Registrar's office
	by 10 a.m.

### Summer Sessions, 1991

First Summer Session: (Based on 4 day class week, except for first week\*)

May 27 (M)	Memorial Day Holiday
May 29 (W)	Registration (Richland Only)
May 30 (R)	Registration (All Campuses)
June 3 (M)	Classes Begin
June 6 (R)	4th Class Day
	4th Class Day
*June 7 (F)	Class Day (Only Friday Class Day)
June 15 (S)	TASP Test Administered
June 20 (R)	Last Day to Withdraw with a Grade
	of "W"
July 3 (W)	Final Exams
July 3 (W)	Semester Ends
July 4 (R)	Fourth of July Holiday
July 5 (F)	Grades due in Registrar's Office
	by 10 a.m.
•	,

Second Summer Session: (Based on 4 day class week)

July 9 (T) July 10 (W) July 16 (T)	Registration (All Campuses) Classes Begin 4th Class Day
August 1 (R)	Last Day to Withdraw with a Grade of "W"
August 13 (T)	Final Exams
August 13 (T)	Semester Ends

by 10 a.m.

Grades due in Registrar's office

2

August 15 (R)

### Dallas County Community College District Board of Trustees



Robert Bettis Chairman



J. D. Hall Vice Chairman



Don Buchholz



Jerry Gilmore



Kenneth M. Pace



Pattie T. Powell



James W. Smith

### **Dallas County Community College District Administrators**

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Vice Chancellor of Educational Affairs	Jack Stone
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Executive Assistant to the Chancellor	Jackie Caswell
Associate Vice Chancellor/Educational Affairs	Rodger A. Pool
Associate Vice Chancellor of Business Affairs	Robb Dean
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Director of Public Information	Claudia Robinson
Director of Purchasing	Mavis Williams
Director of Resource Development	Lyndon McClure
Director of Student and International Programs	Richard McCrarv
Director of Technical Services	Paul Dumont
Difector of recipilical deraices	.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,

### MOUNTAIN VIEW COLLEGE

In southwestern Dallas County, Mountain View College is the community learning center for thousands of people. The second of seven colleges in the Dallas County Community College District, Mountain View opened in the fall of 1970. It is located at 4849 West Illinois Avenue in the southwestern section of Oak Cliff in Dallas and serves residents of South Dallas, Oak Cliff, Duncanville, Cedar Hill and parts of Grand Prairie.

The various programs at Mountain View are designed to meet a broad range of educational needs. Students may elect to complete their first two years of study leading toward a bachelor's degree, or they may prepare for a career in an occupational or technical area. Many students attend Mountain View to train for advancement in their present employment or to train for an entirely new career opportunity. Non-credit courses also are available for people of all ages to gain personal enrichment, cultural awareness or to participate in productive leisure time activities.

The Mountain View student body is composed of people of all ages and all backgrounds. The college represents a cross section of the community which it serves. This rich opportunity to interact with many varied people is an important part of the educational process and is well established in the Mountain View tradition.

### The Campus

The campus sits on the crest of a ridge that gives students an outstanding view of the downtown Dallas skyline to the north. Care has been taken to preserve the natural beauty of the 200-acre site. The long, flat-roofed buildings stretch out gracefully along both sides of a rocky ravine and natural creek which has been landscaped into a very pleasant interior courtyard and garden. Footpaths and stone terraces provide a beautiful area to walk, study or relax. An enclosed pedestrian bridge spans the ravine, giving easy access to all parts of the campus and providing a beautiful architectural focal point to the college.

### Accreditation

Mountain View College is a member of: The Southern Association of Colleges and Schools

### Institutional Memberships

The American Association of Community and Junior Colleges

The League for Innovation in the Community College

Mountain View College is recognized and sanctioned by the Coordinating Board of the Texas College and University System and the Texas Education Agency and is an Affirmative Action Equal Opportunity Institution.

### MOUNTAIN VIEW COLLEGE ADMINISTRATION

President. V.P. of Business Services. V.P. of Instruction. V.P. of Student Development. Evening Administrator. Dean, Career & Continuing Ed. Dean, Educational Resources. Dean, Student Support Services	Bob Brown       333-8705         Linda Stegall       333-8710         John Nelson       333-8696         Dick Smith       333-8610         Don Perry       333-8755
·	Juan Torres       333-8600         Jim Jones       333-8705         Jim Corvey       333-8664         Juan Torres       333-8688         Sharron Colburn       333-8678

### **Division Chairpersons**

Business	Tom Goza	. 333-8616
Communications/Social Science	David Wickham	. 333-8624
Science/Mathematics/PEH	Cliff Miller	333-8649
Fine Arts/Technology	Mike Warbritton	. 333-8656

### Mountain View College Faculty and Staff

Alfers, Kenneth G	Fletcher, Ann
Allen, Gemmy	Fulton, Stan
Baldor, Juan A	Glenn, Sharon L
Battles, Fred	Gooding, Guy
Texas, Ed.D.	Goss, Raye
Benson, Paul F	Goza, Tom
Brown, Bob Vice President of Business Services Univ. of North Texas, B.B.A, C.P.A.	Gregory, David A
Brown, Jean WMusic Texas Woman's Univ., B.S., M.A.	Grimes, Geoffrey A
Bruenjes, Ronald P	Grissom, Anne
Caldwell-Kennedy, Leleonia E	Hall, J
Coad, Bruce English Wittenburg Univ., B.A., Univ. of North Carolina, M.A., Duke Univ., Ph.D.	Datlas  Hamilton, Ramona
Colburn, Sharron Director, Public Information Dallas Baptist Univ., B.A.B.A.; Southern Methodist Univ., M.L.A.	Harris, Allatia
Cook, E. Wayne	Hegar, Kathryn W
Cortez, Lionet M., Jr	Hettle, Mark
Corvey, Sanford James	Holland, Ronald C
Cowan, John A	Jones, Jim Director, Business Operations Univ. of Texas, Arlington, B.B.A.
Cunningham, Ann R	Jordan, W. H
Curtis, Ed	Kavaller, Jim
Ground Instructor, Pilot Examiner	
Delong, J. Richard	Korman, Frank
Dershem, Don	Legg, Larry
Dexter, Rawlings P	Univ., M.S.  Lovelace, Curtis
Dodge, Tom	Studies: Univ. of Texas, Arlington; Mountain View College, A.A.A.S.  McCaffrey, Monica
Duvall, Johnny W	Trinity Univ., B.A.; Texas Tech Univ., M.A.  McCain, Charles
Dye, Arch F	East Texas State Univ , B.S., M.S., Ph.D  McLoda, William S
England, Daniel B	Ohio State Univ., B.S.; Indiana Univ., M.A.T.  Means, Richard L
Faulkner, Ann Learning Skills Univ. of Texas, Austin, B.S., M.A.	Henderson State Teachers College, B.A.; Univ. of Arkansas, M.A.  Melkus, Roger A
Felty, Larry TArt  East Texas State Univ , B.S., M.S	St. Thomas Seminary College, B.A.; Creighton Univ., M.S.; Univ. of North Texas, Ph.D.
Ferguson, Susan French	Miller, Clifford D

Mount, George	Sink, D. Michael English Ball State Univ., B.S., M.A.; Auburn Univ., Ed.D.
Mugleston, William F	Skinner, Ted R Librarian East Texas State Univ., B.S., M.S. in L.S.
Nelson, John	Smith, Richard E
Olesen, Spencer	Smith, Tommy E
Oliver, Gwendolyn L	St. John, Sue
Ortega, Diana L	Strain, Jimmie F
Oxsheer, Billy W	Stegall, Linda
Parker, Sue	Stupp, Mary
Payne, John	Tarpley, Joyce K English/Developmental Writing Rutgers Univ., B.A.; Univ. of Texas, Dallas, M.A.
Advanced and Instrument Ground Instructor	Terry, Joanne
Perry, DonDean, Career and Continuing Education Memphis State Univ., B.A., M.Ed.	Thompson, Darrell H
Pierce, L. Jack	Torres, Euclides F
Pike, Patsy Office Careers Baylor Univ., B.B.A.; East Texas State Univ., M.B.A.	Univ. of Havana, B.S., Ph.D.  Tipple, Kart Electronics
Pollock, Guy W	Southern Methodist Univ., B.S., M.S.  Walden, Jacci Music
Pool, Larry History/Government	East Texas State Univ., B.M., Univ. of Oklahoma, M.M.
Stephen F. Austin State Univ., B.S., M.A.	Warbritton, Michael L
Prince-Lockley, J. Elaine	White, Marjorie A
Pritchett, John L	Whitefield, Geneva
Richards, Donna Dean, Student Support Services Texas Woman's Univ., B.S., M.S.	Univ. of Arkansas, B.S., B.A.; East Texas State Univ., M.B.A.
Roberts, Mary	Wickersham, Charles H
Louisiana State Univ., B.S.; Southern Methodist Univ., M.B.A., C.P.A.	Wickham, David W
Robinson, Wilma W Developmental Reading/Writing Savannah State College, B.S.; East Texas State Univ., M.S.	Southern Methodist Univ., B.A., M.L.A.  Willis, John A
Rodgers, Samuel A	Univ. of Arkansas, B.S.; Univ. of North Texas, M.B.A,
Roy, Dewayne	Wilson, William A
Salter, Daniel M Pilot Technology	Wilson, Rodney M
San Jacinto College, A.S.; F.A.A. Commercial Pilot Certificate; F.A.A. Flight Instructor Ratings; F.A.A. Ground Instructor Ratings; F.C.C. Radio Operator License; Dallas Baptist Univ., B.C.A.	Wolfe, David J
Salter, M. Jo	
Sayers, Lew C. Developmental Writing Dartmouth College, B.A.; Reed College, M.A.T.	
Singleton, Emma Office Careers	
Texas Southern Univ., B.S., M.B.Ed.	

American professional Control

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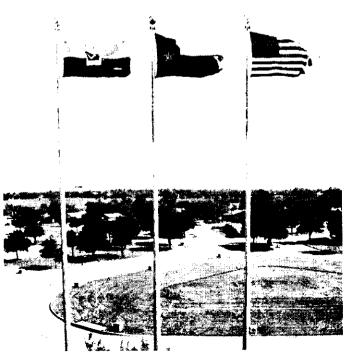
### I. GENERAL INFORMATION

## History of the Dallas County Community College District

The Dallas County Community College District is comprised of seven colleges located strategically throughout Dallas County. Together the colleges enroll approximately 75,000 students per semester and employ over 1,900 full-time faculty and staff members.

The growth of the District into an educational system with such impact was not by chance. In May, 1965, voters created the Dallas County Junior College District and approved a \$41.5 million bond issue to finance it. The next year the District's first college, El Centro, began operation in downtown Dallas. Eastfield College and Mountain View College enrolled their first students in 1970, and the plans for a multi-campus district became a reality. Richland College became the District's fourth college in 1972.

The voters of Dallas County approved the sale of an additional \$85 million in bonds in September, 1972. provided for expansion of the four existing colleges and the construction of three more colleges. A key part of the expansion program was the remodeling and enlarging of El Centro College, a project completed in 1979. Construction of new facilities resulted in the opening of Cedar Valley College and North Lake College in 1977. Brookhaven College, the final campus in the seven-college master plan, opened in 1978. In February, 1989, the Bill J. Priest Institute for Economic Development opened near downtown Dallas. Named for the DCCCD's founding chancellor, the BJPIED serves the community through the Business and Professional Institute, Edmund J. Kahn Job Training Center, Small Business Development Center, Center for Government Conracting, Business Incubation Center, and International Trade Resource Center.



### **District Philosophy And Goals**

Since 1972, the District has been known as the Dallas County Community College District. The name shows that the District has outgrown the term "junior college." The name also reflects the District's philosophy. The colleges truly are community institutions, meeting the varied educational needs of the growing Dallas County region. The primary goal of the District and its colleges is to help students of all ages achieve effective living and responsible citizenship in a fast-changing region, state, nation, and world. Each college is therefore committed to providing a broad range of educational programs for the people it serves.

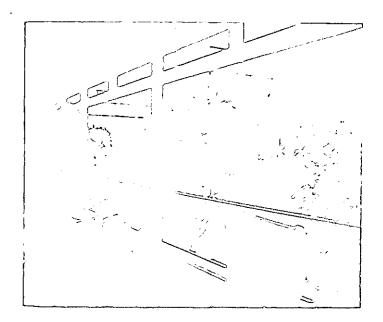
The needs, abilities, and goals of each student are considered important. The focus is on creating an educational program for the individual rather than squeezing or stretching the individual to fit an "educational mold."

The District therefore has a place for different kinds of students. There is a place for the young person setting forth toward a degree in medicine, and a place for the adult delving into an interesting hobby to enrich leisure hours. There is a place for the person preparing to enter a trade or technical field with a year or two of studies, and a place for the employed individual wanting to improve occupational skills. There is a place for the very bright high school student ready to begin college work in advance of high school graduation, and a place for the high school dropout who now sees the need for education in today's complex society. In short, there is a place for everyone.

How do the colleges meet the educational needs of such a varied family? The answer is found in four categories of programs:

- 1. For the student working toward a bachelor's or higher degree, the colleges offer a wide range of first-year and second-year courses which transfer to senior colleges and universities.
- For the student seeking a meaningful job, the colleges offer one-year and two-year programs in technical and occupational fields.
- For the employed person wishing to improve job skills or to move into a new job, the colleges offer credit and non-credit adult educational courses.
- 4. For the person who simply wants to make life a little more interesting, the colleges offer community service programs on cultural, civic, and other topics.

Additional programs are available for the high school student, dropout, and others with special needs. The colleges help each student design the educational program that best meets individual needs. Every student is offered intensive counseling to define goals and identify abilities. Continued guidance is available throughout the student's college career in case goals and plans change.



This emphasis on counseling, rare for some institutions, is routine at all District colleges.

### **District Responsibilities**

To carry out the District philosophy, the colleges obviously must offer a wide range of programs and courses, including guidance services. These programs and courses must help each individual attain a high level of technical competence and a high level of cultural, intellectual, and social development. In addition, high professional standards for the academic staff must be maintained within a framework prescribed by the Board of Trustees. At the same time, the program and organization of each college must make maximum use of faculty and facilities.

The colleges have a basic responsibility to provide educational and cultural leadership to the community. They must be sensitive to changing community needs and adapt readily to those needs. Individuals capable of continuing their educational development should be given the opportunity to improve their skills. Finally, to continue to meet its responsibilities in changing times, the college system must guard against stagnation. Creativity and flexibility are therefore fostered at the District level and on each campus.

### League for Innovation

The Dallas County Community College District is a member of the League for Innovation in the Community College. The League is composed of 19 outstanding community college districts throughout the nation. Its purpose is to encourage innovative experimentation and the continuing development of the community college movement in America. Membership commits the District to research, evaluation, and cooperation with other community college districts. The goal is to serve the community with the best educational program and the fullest use of resources.

## **Equal Educational And Employment Opportunity Policy**

Dallas County Community College District is committed to providing equal educational and employment opportunity regardless of sex, marital or parental status, race, color, religion, age, national origin, or disability. The District provides equal opportunity in accord with federal and state laws. Equal educational opportunity includes admission, recruitment, extra-curricular programs and activities, access to course offerings, counseling and testing, financial aid, employment, health and insurance services, and athletics. Existing administrative procedures of the College are used to handle student grievances. When a student believes a condition of the College is unfair or discriminatory, the student can appeal to the administrator in charge of that area. Appeals to a higher administrative authority are considered on the merits of the case.

### Family Educational Rights And Privacy Act Of 1974

In compliance with the Family Educational Rights and Privacy Act of 1974, the College may release information classified as "directory information" to the general public without the written consent of the student. Directory information includes: (1) student name, (2) student address, (3) telephone number, (4) dates of attendance, (5) educational institution most recently attended, and (6) other information, including major field of study and degrees and awards received.

A student may request that all or any part of the directory information be withheld from the public by giving written notice to the Registrar's Office during the first 12 class days of a fall or spring semester or the first four class days of a summer session. If no request is filed, information is released upon inquiry. No telephone inquiries are acknowledged; all requests must be made in person. No transcript or academic record is released without written consent from the student stating the information to be given, except as specified by law.

### **Student Consumer Information Services**

Pursuant to the Education Amendment of 1980, Public Law 96-374, the College provides all students with information about its academic programs and financial aid available to students.

### Standard Of Conduct

The college student is considered a responsible adult. The student's enrollment indicates acceptance of the standards of conduct published in this catalog.

If you are unable to complete the course (or courses) for which you have registered, it is your responsibility to withdraw formally from the course (or courses). Failure to do so will result in your receiving a performance grade, usually a grade of "F".



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Pursuant to the Education Amendment of 1980, Public Law 96-374 the College provides all students with Information about its academic programs and financial aid available to students

### Standard Of Conduct

The college student is considered a responsible adult. The student's enrollment indicates acceptance of the standards of conduct published in this catalog.

If you are unable to complete the course (or courses) for which you have registered it is your responsibility to withdraw formally from the course (or courses). Failure to do so will result in your receiving a performance grade usually a grade of F

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## II. IMPORTANT TERMS AND ABBREVIATIONS

Academic advisor: A member of the college staff who assists students in planning appropriate academic programs.

Add: During any single semester, to enroll in additional course(s) after registration.

Admission: Formal application and acceptance as a credit student. A person wishing to enroll must complete an application, be accepted, and receive a letter of acceptance from the Registrar before registering.

Audit: Enrollment in a credit course without receiving academic credit.

Catalog: The book containing course descriptions, certificate and associate degree requirements, and general information.

Class Schedule: A booklet which is published prior to each semester listing classes, sections, dates, times, instructors' names, and meeting places. This booklet is used by students in preparing personal class schedules each semester.

Common Learning: "General Education" as defined by the Dallas County Community College District. Common Learning courses contain learning experiences which provide knowledge and skills necessary for living well and functioning competently in rapidly changing local, state, national, and world communities.

Concurrent enrollment: (a) Enrollment by the same student in two different DCCCD colleges at the same time; (b) Enrollment by a high school senior in one of the DCCCD colleges while still enrolled in high school; (c) Enrollment by a student in two related courses in the same semester; (d) Enrollment in both a DCCCD institution and a four-year institution at the same time; (e) Enrollment in both credit and Continuing Education courses at the same time.

Course load: The number of hours or courses in which a student is enrolled in any given semester.

Credit: The numerical value assigned to a course (see CREDIT HOURS/SEMESTER HOURS".)

Credit Hours/Semester Hours: The unit of credit earned for course work. Each college course is worth a certain number of credit or semester hours. This number is determined by the type of class and the number of hours per week it meets. For example, a 3 credit hour class English, history, etc.) meets 3 hours per week during the fall/spring semesters; a 4 credit hour class (science, languages, etc.) meets 6 hours. Check this catalog or the current class schedule for the value of any course you wish to take.

Credit/Non-credit: Credit classes are those which award academic credit and may apply toward a degree. Non-credit classes do not apply toward a degree and are usually offered through Continuing Education.

DCCCD: Dallas County Community College District comprised of Brookhaven, Cedar Valley, Eastfield, El Centro,

Mountain View, North Lake and Richland Colleges, plus the Bill J. Priest Institute for Economic Development.

Developmental Studies Courses: Courses which develop prerequisite skills in reading, writing, and mathematics. Because of the nature of these courses, the credit earned will not count toward graduation requirements and may not be transferred to colleges outside the DCCCD.

**Drop:** The act of officially withdrawing from a particular course without penalty before a specified date. See calendar in this catalog for "Last Day to Withdraw." It is the student's responsibility to drop a course by the date published.

Dual Credit: Credit earned for both high school and college via concurrently enrolled high school students.

Electives: Courses which do not count toward a major but are required for most college degrees. Electives are selected for personal interest, skill development or to increase one's knowledge or understanding. Consult with an advisor before deciding upon electives.

Fee: A charge which the college requires for services in addition to tuition charges.

Flexible-entry course: Acourse beginning and ending on dates which are different from the regular semester. This is also referred to as "flex-entry" or "short semester registration". Consult the class schedule for further information.

Former Student: One who has attended a DCCCD college in the past but not during the previous long semester.

Full-time student: A student who is enrolled for at least 12 credit hours during a semester or for 6 credit hours during a summer session.

GPA: Grade Point Average. Two different ways of computing a G.P.A. are utilized. For further explanation, see catalog section entitled "Scholastic Standards."

**Grade Points:** See catalog section entitled "Scholastic Standards."

**Grades:** See catalog section entitled "Scholastic Standards."

Lab hours: The number of hours a student spends each week in a laboratory or other learning environment.

Lecture hours: The number of hours a student spends each week in a classroom other than a laboratory.

Major: The subject or field of study in which the student plans to specialize. For example, one "majors" in automotive technology, business, etc.

Part-time student: A student who is enrolled for less than 12 credit hours during a semester or less than 6 credit hours in a summer session.

Performance grade: A grade of A, B, C, D, or F. This does not include the grades of W, I, or WX. See catalog section on "Academic Information" for more on grades and grade point averages.

Prerequisite: A requirement which must be met BEFORE enrolling for a specific course. For example, the prerequisite for English 102 is the successful completion of English 101. A prerequisite may be another course (high school or college), an appropriate assessment score, or permission of the instructor.

**Probation:** A warning for a student whose academic work or behavior is unsatisfactory. Students on academic probation may be suspended if their academic performance does not improve.

**Registration:** The official process for enrolling in courses. This involves selecting classes with the help of an advisor, completing all registration forms and paying fees. Check the class schedule for registration dates.

Section: A number indicating day/evening, hour, room number, and name of instructor for a particular course. For example, the section number differentiates among the various classes of English 101.

Semester: A term denoting the length of time a student is enrolled in a specific course. For example, there are two long semesters (Fall and Spring) which last approximately 16 weeks. There are two summer sessions or "semesters" (Summer I and Summer II) which last approximately 5 1/2 weeks.

Skills for Living: Skills needed for living well with oneself, others, and changing environments. Skills for Living are discussed and learned throughout the curriculum and provide basic goals for all Common Learning courses.

**TASP:** Texas Academic Skills Program; see special section in this catalog about this testing program.

Technical/occupational courses: Courses which lead to a certificate or Associate of Applied Arts and Sciences Degree in a technical or occupational program. These courses are designed to aid the student in developing entry-level skills to be utilized in the job market. Consult an advisor regarding transferability if you plan to attend a four-year institution.

Telecourses: Courses providing flexibility and convenience for students seeking college credit with minimum campus visits. Students watch the course television programs at home on regular broadcasts or cablecasts, complete the study guide and reading assignments, take tests on campus, and attend optional discussion meetings. Instructors are available during regular office hours or via telephone when assistance is needed.

Transfer courses: Courses which are designed to transfer to other colleges and universities. Students need to consult with an advisor or counselor about the transferability of specific courses. Because a course will transfer does not mean it will apply toward a specific major or degree at a four-year college or university.

Transcript: An official copy of a student's academic record which can be obtained through the Admissions Office. An official transcript must have the seal of the college affixed and the signature of the Registrar.

Withdrawal: The act of ending enrollment in classes. A student withdrawing must go through a formal procedure. It is the student's responsibility to withdraw officially by the appropriate date. See the calendar in this catalog or the class schedule for the "Last Day to Withdraw."



### III. ADMISSIONS AND REGISTRATION

### **General Admissions Policy**

The College has an "open door" admissions policy. It insures that all persons who can profit from post-secondary education have an opportunity to enroll. The College requires certain assessment procedures for use in course placement prior to admission to a certificate or degree program, but the assessment is not used to determine admission.

### **Admission Requirements**

Documentary evidence of Texas residency must be provided by all applicants claiming Texas residence and requesting resident tuition classification. This evidence must be submitted with the application for admission and must prove twelve (12) months of Texas residency immediately prior to the semester of enrollment. Failure to provide evidence will result in an applicant being classified as a nonresident for tuition/fee purposes. Contact the Admissions Office for specific information detailing required documentation.

### Beginning Freshmen

Students enrolling in college for the first time who fit one of the following categories may apply for admission:

- a. Graduates from an accredited high school.
- b. Graduates of an unaccredited high school who are 18 years of age or older.
- c. Those who have earned a General Education Diploma (G.E.D.).
- d. Those who are at least 18 years of age and who do not have a diploma of G.E.D. may be admitted by individual approval.
- e. Those who are under the age of 18 and who do not have a diploma or G.E.D. may be admitted upon the written recommendation of the principal or superintendent of the last high school attended.
- f. High school seniors recommended by their high school principal. The College admits a limited number of students in this category. The student may enroll for no more that TWO college courses per semester.

### Transfer Students

Transfer applicants are considered for admission on the basis of their previous college records. Academic standing for transfer applicants is determined by the Registrar's Office according to standards established by the College. Students on scholastic or disciplinary suspension from another institution must petition the Committee on Admissions and Academic Relations for special approval. Contact the Admissions Office for further information.

Students transferring from a Texas public college or university are subject to the same TASP requirements as are "native" DCCCD students. (See special TASP section.) Therefore, transfer students from Texas public colleges and universities who began their college careers in the 1989 Fall Semester and who have accumulated at least 15 hours of college-level credit must have TASP scores on file with the DCCCD college. Otherwise, enrollment will be limited to remedial and/or other courses which will not count toward graduation.

Students transferring from a non-Texas public college or university who began their college career with the 1989 Fall Semester will have to take the TASP test either before or during their semester of enrollment in their 15th credit hour of college-level coursework.

#### Former Students

Students formerly enrolled in the Dallas County Community College District must submit an application for readmission to any District college. Students with unsettled financial debts at any District college will not be allowed to register.

### **Non-Credit Students**

Students enrolling for non-credit courses apply through the Office of Continuing Education.

#### International Students

The College is authorized under federal law to enroll non-immigrant alien students. International students are not admitted, however, until all admissions requirements are complete. International students must:

- 1. complete a personal interview with the international student counselor and receive approval from the college;
- present TOEFL (Test of English as a Foreign Language) test scores of 525 or higher and take the DCCCD assessment tests;
- 3. be proficient in English and provide a letter in their own handwriting indicating educational and vocational plans;
- 4. show evidence of sufficient financial support for the academic year by submitting an I-134 (Affidavit of support) Immigration and Naturalization Services document;
- 5. provide written proof of negative tuberculin skin test or chest x-ray, polio immunization if applicant is under nineteen years of age, measles and rubella vaccines taken since January 1,1968, and diphtheria/tetanus injections taken within the last ten years;
- 6. fulfill all admission requirements for international students at least 30 days prior to registration;

- 7. enroll as a full-time student (minimum of 12 credit hours);
- 8. supply official transcripts for all previous academic work with a minimum "C" average.

In addition to the requirements stated above, international students wishing to transfer from another U.S. higher education institution must also:

- present documentation indicating "bona fide" nonimmigrant status as an F-1 or M-1 student;
- 2. have pursued a full course of study at the institution last authorized to attend by I.N.S.;
- 3. present official transcripts verifying that the student:
- a. was "in-status" for the term immediately preceding this transfer, and
- b. has a minimum GPA of 2.00 in all college work attempted.

International students are subject to the requirements of the Texas Academic Skills Program (TASP).

Contact the Admissions Office for information.

### **Application and Admission Procedures**

Applications may be submitted any time prior to registration. Earlier application is desirable because the student's place in registration is determined by the date of the applicant's file; submitting admissions documents early also insures that there is adequate time for effective counseling and schedule planning. A later place in registration often means that the classes a student desires are already filled.

Applicants must submit the following material to the Admissions Office to have a complete admissions file:

- a. An official application, available from the Admissions Office:
- b. Official Transcripts: The following MUST be submitted: (1) for beginning college students an official transcript from the last high school attended; (2) for college transfer students, official transcripts for all previous college work attempted. The College accrediting agency requires transcripts, and the College uses them in program advisement. IT IS ABSOLUTELY ESSENTIAL THAT TRANSFER STUDENTS SUBMITTRANSCRIPTS FROM PREVIOUS COLLEGES ATTENDED.

All applicants may select only those classes available when they register. Students may enroll in certain courses at times other than regular semester registration. See the Flexible Entry courses section in this catalog and contact the Registrar's Office for additional information.

Students entering with academic deficiencies or low assessment scores may be admitted on probation and may be required to enroll in developmental or other programs designated by the college.

### **Reciprocal Tultion Agreement**

The following Associate of Applied Arts and Sciences Degrees offered by the Dallas County Community College District may be taken by Tarrent County residents at incounty tuition rates:

PROGRAM	CAMPUS
Advertising Art Apparel Design Aviation Technology Air Cargo Air Traffic Control Aircraft Dispatcher Airline Marketing Career Pilot Fixed Base Operations Avionics Commercial Music Diesel Mechanics Electrical Technology Engineering Technology Food & Hospitality Service Human Services Interior Design Machine Shop Pattern Design Physical Fitness Technology Social Work Associate Veterinary Technology Vocational Nursing	BHC ECC MVC MVC CVC NLC RLC ECC ECC MVC ECC NLC ECC ECC ECC ECC ECC
•	

### **Tuition**

Tuition is charged on a sliding scale according to the number of credit hours for which a student is enrolled and the student's place of legal residence. Tuition is subject to change without notice by the Board of Trustees or the Texas Legislature.

### **Additional Fees**

Additional fees may be assessed as new programs are developed with special laboratory costs. These fees will always be kept to a practical minimum. A graduation fee is not assessed, but each student must pay for cap and gown rental.

### Special Fees And Charges

Laboratory Fee: \$2 to \$8 a semester (per lab).

Class Fee: Variable special costs of course not otherwise, defined as "Laboratory Fee." Rental costs of specialized equipment and off-campus facilities are examples of "class fees."

Physical Education Activity Fee: \$5 a semester.

Dance Activity Fee: \$5 a semester.

Bowling Class Fee: Student pays cost of lane rental.

Private Music Lesson Fee: \$45 for one hour per week. (maximum) for one course, \$25 for one half hour per week.

**Audit Fee:** The charge for auditing a course is the same as if the course were taken for credit, except that a student service fee is not charged.

Credit by Examination: A fee will be charged for each examination. This fee can change without prior notice.

### **Refund Policy**

The refund policy of the District is based upon state regulations and on the fact that student tuition and fees provide only a fraction of the cost of offering educational opportunities. When students enroll in a class, they reserve places which cannot be made available to other students until they officially drop the class. In addition, the original enrollment of students represents a sizable cost to the District regardless of continuance in that class. Therefore, a refund is made only under the following conditions:

### (1) Official withdrawal:

Students who officially withdraw from the institution shall have their tuition and mandatory fees refunded according to the following schedule:

### Fall and Spring Semesters

100%
80%
70%
50%
25%
NONE

### **Summer Semesters**

Prior to the first class day*	100%
During the first, second or third class day	80%
During the fourth, fifth or sixth class day	50%
After the sixth class day	. NONE

### (2) Official drop of a course or courses:

Students who reduce their semester credit hour load by officially dropping a course or courses and remain enrolled at the institution will have applicable tuition and fees refunded according to the following schedule:

### Regular Session

During the first twelve class days	100%
After the twelfth class day	

### Summer Session

During the first four class days	100%
After the fourth class day	
(Continues following tuition schedule.),	

## TUITION AND STUDENT SERVICES FEE Fall and Spring Sessions

Semester Credit	Dallas County			Out-of-District			Out-of-State or Country		
Hours	Tuition	Fee	Total	Tuition	Fee	Total	Tuition	Fee	Tota
1	\$ 36	\$ 3	\$ 39	\$ 100	\$ 3	\$ 103	\$ 200	\$3	\$ 203
2	36	3	39	100	3	103	200	3	203
3	36	3	39	100	3	103	200	3	203
4	48	4	52	132	4	136	244	4	248
5	60	5	65	165	5	170	305	5	310
6	72	6	78	198	6	204	366	6	37
7	84	7	91	231	7	238	427	7	43
8	96	8	104	264	8	272	488	8	49
9	108	9	117	297	9	306	549	9	55
10	120	10	130	330	10	340	610	10	62
11	130	11	141	342	11	353	671	11	68
12	140	12	152	354	12	366	732	12	74
13	150	12	162	366	12	378	793	12	80
14	160	12	172	378	12	390	854	12	86
15	170	12	182	390	12	402	915	12	92
16	180	12	192	402	12	414	976	12	98
17	190	12	202	414	12	426	1037	12	104
18	200	12	212	426	12	438	1098	12	111
19	210	.12	222	438	12	450	1159	12	117
20	220	12	232	450	12	462	1220	12	123

## TUITION Summer Sessions

Samuelar Constant						
Semester Credit Hours	Dallas County Tuition	Out-of-District Tuition	Out-of-State or Country Tuition			
1	\$ 36	\$100	\$200			
2	36	100	200			
3	42	138	200			
4	56	184	268			
5	70	230	335			
6	84	276	402			
7	92	286	469			
8	100	296	536			
9	108	306	603			

The following definitions are brief guidelines only; please discuss any questions regarding proper tuition classification with admissions office personnel.

### **TUITION REQUIREMENTS FOR LONG TERM:**

- Datlas County Residents \$12.00 per credit unit through ten credit units and \$10.00 for each additional credit unit over ten credit hours; minimum of \$36.00
- Out-of-District Residents\* \$33.00 per credit unit through ten credit units and \$12.00 for each additional credit unit over ten credit units; minimum of \$100.00
- 3. Out-of-State Residents\*\* \$61.00 per credit unit; minimum of \$200.00
- 4. Out-of-Country Residents \$61.00 per credit unit; minimum of \$200.00

#### **SUMMER SESSION**

- Dallas County Residents \$14.00 per credit unit through six credit units and \$8.00 for each additional credit unit over six credit units; minimum of \$36.00
- Out-of-District Residents\* \$46.00 per credit unit through six credit units and \$10.00 for each additional credit unit over six credit units; minimum of \$100.00
- 3. Out-of-State Residents\*\* \$67.00 per credit unit; minimum of \$200.00
- 4. Out-of-Country Residents \$67.00 per credit unit; minimum of \$200.00

The charge for auditing a course is the same as taking the course for credit.

\*Provided he has established legal residence in the State of Texas, a student's county of residence is the county in which his legal guardian resides, if he is under 18 years of age. Students 18 years of age and older are deemed to be residents of the county in which they reside.

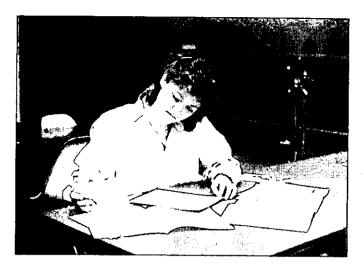
"An "Out-of State Resident" is defined to be a student of less than 18 years of age, living away from his family and whose family resides in another state or whose family has not resided in Texas for twelve months immediately preceding the date of registration; or a student 18 years of age or older who has not been a resident of the state twelve months subsequent to his 18th birthday or for the twelve months immediately preceding the date of registration.

The description of resident and non-resident status contained above are generally applicable, but the determination of residence status for tuition purposes is specifically governed by the provisions of V.T.C.A. Education Code, Section 54.052, the rules and regulations of the Coordinating Board, Texas College and University System, and judicial and/or administrative interpretations thereof. In the event of conflict between the above-noted descriptions and the latter authorities, the latter shall govern.

A foreign national on any other than a permanent resident visa must pay out-of-country tuition and fees.

\*The tuition schedule above is subject to change without notice by action of the District Board of Trustees or the State of Texas.

If you are a non-resident or an out-of-country student AND if you (or the parent on whom you are dependent) own property subject to ad valorem tax by the College District, you may qualify for a waiver of tuition to the In-District rate. Please check with the college Admissions Office for additional details.



\* The first "class day" is to be counted as the officially published date when the semester begins.

Separate refund schedules may be established for optional fees such as intercollegiate athletics, cultural entertainment, parking, etc.

Tuition and fees paid directly to the institution by a sponsor, donor, or scholarship shall be refunded to the source rather than directly to the student.

- (3) A student dropping a portion of his or her class load after the twelfth class day of a fall or spring semester (fourth class day of a summer session) is not entitled to a refund unless approved by the Refund Petitions Committee.
- (a) Refund petitions, accompanied by an explanation of any existing circumstances, shall be submitted to the Refund Petitions Committee on the campus.
- (b) If the petition is approved by the committee, the student shall be notified and shall receive a refund of tuition and fees according to the appropriate schedules in this policy.
- (4) The student must submit the request for refund before the end of the semester or summer session for which the refund is requested. Cash refunds are not issued. Refund checks are mailed to the student at the address on file in the Admissions/Registrar's Office.
- (5) Mandatory fees shall include, but not be limited to, student activity fees, laboratory fees, private lesson fees, and physical education activity fees.
- (6) Flexible entry courses are to be handled as regular semester length courses. The refund schedule will be prorated accordingly.
- (7) Refund checks normally require a minimum of one month from date of approval for processing.
- (8) The college academic calendar and the class schedule shall specify the last day for withdrawal with refund.

### **Returned Checks**

Checks returned to the Business Office must be paid with cash or a cashier's check within the time limits prescribed by the notification letter. An additional fee is added for returned checks. If a check for tuition is returned by the bank for any reason, including stop payment, the College Business Office may submit the check to the Justice of the Peace for appropriate legal action and collection. The Vice President of Student Development may also implement disciplinary procedures. Students may be dropped from courses due to returned checks.

### **Assessment and Advisement Procedures**

Assessment is the process of evaluating readiness for certain college courses and the probabilities for success in those courses. The College has an assessment program for entering students which is a required part of the enrollment process.

The assessment program includes the completion of a questionnaire which documents information on career and work plans, previous academic achievement and other relevant information. Assessment also includes an examination of individual skill levels in reading, writing and mathematics. Information on skills may come from ACT, SAT, or TASP results, previous college-level work, or from scores on the standardized tests administered free of charge by the College.

Because of the importance of such information, students should have official copies of ACT, SAT, or TASP scores and transcripts mailed to the Admissions Office or bring them personally at the time of application. It is the responsibility of the student to make these available.

The assessment program provides information needed in advisement. Academic advisement sessions provide a framework for informed decision-making on the part of students and advisors. Information on a student's skills, abilities, career plans, educational background, life experiences, and motivation is important in helping the student and advisor make selections from the many educational options available.

Details of assessment and advisement procedures are available through the College Counseling Center or in the "Schedule of Classes" each semester.

Students who did not have at least 3 college-level credit hours prior to the 1989 Fall Semester must take the TASP (Texas Academic Skills Program) test either prior to, or during, their semester of enrollment in 15 college-level credit hours. Should students fail either the reading, writing, or mathematics section of TASP, they will be required to continuously enroll in the appropriate remediation until the failed section is passed.

### Change Of Schedule

Students should be careful in registering to schedule courses only for the days and hours they can attend. Students requesting class changes should contact the Registrar's Office during the time specified in the current class schedule. No change is complete until it has been processed by the Registrar's Office.

### Non-Credit Student (Audit)

A person who meets the admission requirements of the District may, with the consent of the division chairperson and instructor, enroll in a credit course as a non-credit student. A non-credit student may attend class, but may not receive a final grade or credit for a course. An instructor may give an examination if he or she determines the examination is an essential component of the learning process. The fee in a credit course is the same for a non-credit student as for a credit student, except that a student service fee may not be charged.

### **Acceptance of Credit in Transfer**

Undergraduate credits in transfer will be accepted from colleges and universities recognized by a national accrediting agency equivalent to the Commission on Colleges of the Southern Association of Colleges and Schools. Credits earned through other education programs, such as credit-by-examination, military experience, the U.S. Armed Forces Institute, are reviewed by the Registrar and credit is granted, if applicable.

Official transcripts from all higher education institutions must be on file before the evaluation can be accomplished in the Registrar's Office. Any questions concerning the validity of the document(s) will result in the need to have an official transcript(s) sent directly from the other institution(s) to the Registrar's Office. Transfer students admitted with a grade point deficiency cannot graduate until the deficiency is cleared by earning additional grade points.

### **Address Changes And Social Security Number**

Each student has the responsibility to inform the Registrar's Office of changes in name or address. Each applicant for admission is asked to furnish a Social Security number. This number doubles as a student identification number and insures accuracy of student records. If a student does not have a Social Security number, another number is assigned for record keeping.





### TASP(Texas Academic Skills Program) Test

The Texas Academic Skills Program (TASP) is required by state law to ensure that students enrolled in Texas public colleges possess the academic skills needed to perform effectively in college-level coursework. TASP includes a testing component designed to identify and provide diagnostic information about the reading, mathematics, and writing skills of students.

Students entering the DCCCD Fall, 1989, or thereafter, must take the TASP test prior to accumulating, or during the semester of enrollment in, 15 hours of college credit. Students who have had at least 3 hours of college-level credit prior to Fall, 1989 are exempted from the TASP requirement. Students enrolled in certain DCCCD Certificate programs may be exempt from the TASP requirement.

TASP scores may be utilized in place of the DCCCD Assessment Program. Students scoring below the state-determined level must continuously enroll in appropriate remediation until such time as the TASP Test is passed. The successful completion of TASP may be a prerequisite to enrollment in some courses.

DCCCD students must pass all sections of TASP prior to being awarded the Associate in Arts and Sciences Degree, or the Associate in Applied Arts and Sciences Degree. Students planning to transfer must pass all TASP sections before enrolling in upper division (junior or senior level) courses.

For more complete information on TASP or to obtain a copy of the TASP Registration Bulletin, contact the Testing/Appraisal Center. Students must preregister to take TASP. All test fees are borne by the student although financial aid may be available to offset the cost for students deemed eligible.



### IV. ACADEMIC INFORMATION

### Scholastic Standards: Grades And Grade Point Average

Final grades are reported for each student for every course according to the following grading system.

		Grade Point
Grade	Interpretation	Value
Α	Excellent	4 points
В	Good	3 points
С	Average	2 points
D	Poor	1 point
F	Failing	0 points
1	Incomplete	Not Computed
WX	Progress; re-enrollment required	Not Computed
W	Withdrawn	Not Computed
CR	Credit	Not Computed

Grade points earned for each course are determined by multiplying the number of points for each grade by the number of credit hours the course carries. For example, a student who takes a three hour course and earns an "A" accumulates 12 grade points for that course. A student's grade point average is computed by adding the total grade point values for all courses and dividing by the number of credit hours attempted during the same period. For example, a student who takes the following courses and earns the following grades has a grade point average 2.93:

Credit Hours	Orada	0
	Grade	Grade Points
2-hour course	Α	8
3-hour course	В	9
4-hour course	<b>B</b> .	12
3-hour course	С	6
Total Credit		Total Grade
Hours:		Points:
12		35
	<u>35</u>	
	12 = 2.93	

The student's transcript and grade reports will indicate two different G.P.A.'s. G.P.A.(1) is based upon all DCCCD courses in which the student received a performance grade of A-F. G.P.A.(1) is utilized to determine Suspension/Probation status, athletic participation eligibility, and financial aid eligibility. G.P.A.(2) is based upon grade points earned in all DCCCD courses with the exception of those courses numbered 099 and below, Art 199, College Learning Skills 100, Developmental Communications 120. Human Development 100 and 110, Library Skills 101, Music 199, and Theatre 199 in which a student received a performance grade of A-F. G.P.A. (2) is utilized to determine eligibility for graduation, honor rolls, and eligibility in Who's Who in American Junior Colleges. It is also the G.P.A. which may be considered by four-year institutions when a student transfers.

For repeated courses, only the latest grade earned is included in cumulative grade point averages, even if the latest grade is lower than a preceding grade. However, transcripts do indicate all work completed in the District. When a student withdraws from a course being repeated, the cumulative grade point average is calculated by using the immediately preceding grade in the same course.

If a student believes an error has been made in determining a course grade, the instructor or appropriate division office should be contacted as soon as possible. Requests for grade changes will not be considered later than two years following the last day of the semester for which the grade was assigned.

An incomplete grade "I" may be given when an unforeseen emergency prevents a student from completing the work in a course. The "I" must be converted to a performance grade (one with a grade point value) within 90 days after the first day of classes in the subsequent regular semester. If the work is not completed after 90 days, the "I" is converted to a performance grade.

An Incomplete Contract is used to convert an incomplete grade to a performance grade and states the requirements for the satisfactory completion of the course. The Incomplete Contract must be agreed upon and signed by the instructor, the student and the division chairperson and submitted with the final grade report. When an Incomplete Contract must be submitted without the student's signature, the instructor must include a statement indicating that the student is aware of and in agreement with the contract.

Students who do not complete course requirements may receive a "WX" grade when the instructor determines that reasonable progress has been made and when the student can reenroll for course completion prior to the certification date in the next regular semester. If the student does not complete the course requirements, the "WX" is converted to a performance grade.

### **Acceptable Scholastic Performance**

College work is measured in terms of credit hours. The number of credit hours offered for each course is given with the course description.

Acceptable scholastic performance is the maintenance of a grade point average, based on G.P.A.(1), of 2.0 (on a 4.0 scale) or better. Students may not be graduated from any degree or certificate program unless they have a cumulative grade point average of 2.0, based on G.P.A.(2), or better. Grade points and hours earned in courses numbered 99 and below, Art 199, College Learning Skills 100, Developmental Communications 120, Human Development 100, Human Development 110, Library Skills 101, Music 199, and Theatre 199 cannot be used to meet graduation requirements.

### **Recommended Academic Load**

The maximum academic load is 18 credit hours of course work per semester or five classes plus physical education. Students must receive permission of the appropriate college official to carry a heavier load. Employed students carrying a full load (12 credit hours or more) should not work more than 20 hours per week. Students working more hours should reduce their academic load proportionately. The recommended load limit for day or evening students who are employed full-time is six credit hours. The recommended load limit in a six-week summer session is six credit hours. A total of 14 credit is the maximum that may be earned in any 12-week summer period.

#### Classification Of Students

Freshman:

A student who has completed fewer than 30 credit hours.

Sophomore:

A student who has completed 30 or more credit hours. Part-time:

A student carrying fewer than 12 credit hours in a given semester.

Full-time:

A student carrying 12 or more credit hours in a given semester.

### **Class Attendance**

Students are expected to attend regularly all classes in which they are enrolled. Students have the responsibility to attend class and to consult with the instructor when a absence occurs.

Instructors ar responsible for describing attendance policy and procedures to all students enrolled in their classes. If a student is unable to complete a course (or courses) in which he/she is registered, it is the student's responsibility to withdraw from the course by the appropriate date. (The date is published in the academic calendar each year and in each semester's class schedule.) If the student does not withdraw, he/she will receive a performance grade, usually a grade of "F".

Students who are absent from class for the observance of a religious holiday may take an examination or complete an assignment scheduled for that day within a reasonable time after the absence if, not later than the 15th day of the

semester, the student notified the instructor(s) that the student would be absent for a religious holiday. Sec. 51.911 Tx. Educ. Code.

### **Dropping A Course Or Withdrawing From College**

To drop a class or withdraw from the College, students must obtain a drop or withdrawal form and follow the prescribed procedure. It is the student's responsibility to drop or withdraw. Failure to do so will result in receiving a performance grade, usually a grade of "F." Should circumstances prevent a student from appearing in person to withdraw from the College, the student may withdraw by mail by writing to the Registrar. No drop or withdrawal requests are accepted by telephone. Students who drop a class or withdraw from the College before the semester deadline receive a "W" (Withdraw) in each class dropped. The deadline for receiving a "W" is indicated on the academic calendar and the current class schedule. See "Refund Policy" for possible eligibility for a refund.

### **Academic Recognition**

Full-time students who complete at least 12 hours of college-level credit and earn a grade point average of 3.5-3.79 are listed on the Vice President's Honor Roll. Full-time students who complete at least 12 hours of college-level credit and average 3.8-4.0 are placed on the President's Honor Roll. Part-time students who take six-11 college-level credit hours and maintain a 3.5 or higher grade point average are placed on the Academic Recognition List. G.P.A.(2) is utilized to determine honor roll inclusion.

### Scholastic Probation And Scholastic Suspension

Full-time and part-time students who have completed a total of 12 credit hours are placed on probation if they fail to maintain a 2.0 cumulative grade point average, utilizing G.P.A.(1). Students may be removed from probation when they earn a 2.0 cumulative grade point average, utilizing G.P.A.(1). Students on scholastic probation who achieve either a cumulative grade point average of 1.5 or above or a previous semester grade point average of 2.0 or above are continued on scholastic probation. Students on probation who do not meet the requirements for continued probation are placed on scholastic suspension. Students on suspension for the first time may not register for the immediately following semester or summer sessions without special permission. Suspended students must file a petition for readmission. The conditions for readmission are established and administered by the Vice President of Student Development.

### **Grade Reports**

A grade report is mailed to the address on record of enrollment to each student at the end of each semester. The grade report contains a listing of all credit courses attempted within the DCCCD, as well as information on academic standing. Interim grade reports are issued for other-than-semester length classes.

### **DCCCD Transcript of Credit**

The DCCCD transcript of credit is a chronological listing of college credit courses attempted within the seven college system of the DCCCD. The transcript is official if the document is embossed with the college seal and imprinted with the signature of the Registrar. It includes both GPA(1) and GPA(2).

Upon written request of the student, the Registrar's Office will send an official transcript to the individual student or to any college or agency named. Afee of one(1) dollar (subject to change without notice) will be charged for each transcript requested. There is a minimum of two working days required for processing. A transcript will be released only if all obligations to the DCCCD have been settled.

The Electronic Transcript Network permits member colleges to send transcripts to one another through a computer network. Such transcripts can normally be sent within 24 hours of the request. Member colleges prefer to receive transcripts in this fashion rather than through the generation of an "official transcript."

Transfer credits from other institutions are not recorded on DCCCD transcripts. If a student desires a transcript of work completed at another institution, the student should secure it from that institution.

### **Degree Requirements**

The College confers the Associate in Arts and Sciences Degree and the Associate in Applied Arts and Sciences Degree upon students who have completed all requirements for graduation. Each degree candidate must earn the last 15 hours as a resident student in the District colleges or accrue 45 hours in residence. The last 15 credit hours required for graduation in any degree or certificate may not be earned through credit-by examination except as approved by the college Vice President of Instruction.

Students seeking certificates or associate degrees must submit official transcripts of all previous work attempted before a certificate or degree will be awarded. Failure to submit official

transcripts directly from the institutions attended will result in the degree or certificate not being awarded.

The degree must be awarded by the college which offers the program in which the student majored. If two or more schools offer the program, the student is granted the degree where the majority of the hours were taken. Correspondence work must be approved by the Registrar for graduation credit. No more than one-fourth of the work required for any degree or certificate may be taken by correspondence.

Students entering the DCCCD Fall 1989, or thereafter, must successfully complete all sections of the TASP (Texas Academic Skills Program) Test before a degree or some Certificates can be awarded. See the TASP catalog section for additional information.

### The Common Learning Curriculum

The Common Learning curriculum is composed of required courses and clusters of courses designed to advance the learning which is common to all candidates for a degree.

The Core Curriculum consists of English 101, Speech Communication 101, and a math course numbered 100 or above. A grade "C" or better in each of the three courses is required for graduation. Students are strongly advised to enroll in these courses in the first two semesters of study because skills necessary for success in other courses are taught in Core courses.

Common Learning course requirements beyond the Core are designed to help ensure that all graduates have general knowledge as well as the specific knowledge ordinarily associated with a major course of study or a technical program. Candidates for the Associate in Arts and Sciences must take 34-36 hours in approved Common Learning courses beyond the Core. Candidates for the Associate in Applied Arts and Sciences must choose six to eight hours of course work from two of the following clusters: Laboratory Science, Behavioral/Social Science, Business, and Humanities.

### Associate in Arts and Sciences Degree

Students must have a minimum of 61 credit hours, a grade of "C" or better in each of the three Core courses (English 101, Speech Communication 101; and math course numbered 100 or above), a grade point average of at least "C" (2.0), based on G.P.A.(2), and a passing score on all sections of TASP (for students entering the DCCCD Fall 1989 or thereafter) to receive the Associate in Arts and Sciences Degree. These 61 hours may be earned at any district college and must include:

- English 101 (3 credit hours) [ A CORE COURSE REQUIREMENT]
- Speech Communication 101 (3 credit hours) [A CORE COURSE REQUIREMENT]
- A math course numbered 100 or above (3 credit hours)
   [ A CORE COURSE REQUIREMENT]
   English 102 (3 credit hours).
- A sophomore literature course (3 credit hours) to be chosen from English 201, 202, 203, 204, 205, 206, 215, OR 216 (English 209 and English 210 do not meet the sophomore literature requirements.)
- Laboratory Science (8 credit hours) to be chosen from Astronomy, Biology, Chemistry, Geology, Physical Science, OR Physics. (For Astronomy to meet this requirement, the student must successfully complete Astronomy 101 in combination with 103, and Astronomy 102 in combination with 104)

- Humanities (3 credit hours) Humanities 101, Literature, Music 104, Philosophy 101, OR Theatre 101
- Physical Education activity course (1 credit hour) (NOTE: Neither chronological age nor military service are acceptable excuses for waiving the physical education requirement.)
- Behavioral Science (3 credit hours) to be chosen from Anthropology, Human Development, Psychology, OR Sociology
- History 101 AND 102 (6 credit hours)
   (NOTE: Only three credit hours of History may be earned through credit-by examination.)
- Government 201 AND 202 (6 credit hours)
   (NOTE: Only three credit hours of Government may be earned through credit-by-examination.)
- Business (3 credit hours) to be chosen from Business, Accounting, Management 136, • Computer Information Systems, OR Economics. Cooperative Work Experience courses may not be used to meet Common Learning requirements
- Electives (16 18 credit hours)

A maximum of four physical education activity hours may be counted as credit toward requirements for graduation. The G.P.A. for graduation is based on the credit earned for all DCCCD work completed and all transfer work. The following courses will not count toward graduation nor the G.P.A. for graduation: Courses numbered 099 and below, Art 199, College

Learning Skills 100, Developmental Communications 120, Human Development 100, Human Development 110, Library Skills 101, Music 199 and Theatre 199.

All students planning to transfer to a four-year institution may complete their four semester requirements in physical education during their freshman and sophomore years. Students are urged to consult the catalogs of the institutions to which they may transfer for their special requirements. These catalogs should be used by students and advisors in planning programs.

See Associate in Arts and Sciences Degree requirements chart that follows this page.

### Associate in Applied Arts and Sciences Degree

Students must have a minimum of 60 credit hours, a grade of "C" or better in each of the three Core courses (English 101 OR Communications 131, Speech Communication 101, AND a math course numbered 100 or above), a grade point average of at least "C" (2.0), based on G.P.A.(2), and a passing score on all sections of TASP (for students entering the DCCCD Fall, 1989, or thereafter) to receive the Associate in Applied Arts and Sciences De-



gree. These 60 hours must include:

- English 101 OR Communications 131 (3 credit hours)
   [A CORE COURSE REQUIREMENT]
- Speech Communication 101 (3 credit hours) [A CORE COURSE REQUIREMENT]
- A math course numbered 100 or above (3 credit hours)
   [A CORE COURSE REQUIREMENT]
- Six to eight credit hours chosen from TWO of the following clusters:

-Laboratory Science: Astronomy, Biology, Chemistry, Geology, Physical Science, OR Physics. (For Astronomy to count as a lab science, the student must successfully complete Astronomy 101 in combination with 103 and Astronomy 102 in combination with 104

-Behavioral/Social Science: Anthropology, Government, History, Human Development, Psychology, OR Sociology

-Humanities: Art 104, a foreign language, Humanities 101, Music 104, Philosophy 101, Theatre 101, English 201, English 202, English 203, English 204, English 205, English 206, English 215, OR English 216

-Business: Business, Accounting, Management 136, Computer Information Systems, or Economics. Cooperative Work Experience courses may not be used to meet Common Learning degree requirements (Continues following chart on next page.)

### **ASSOCIATE IN ARTS AND SCIENCES DEGREE**

### IN ORDER TO BE ELIGIBLE TO RECEIVE AN ASSOCIATE IN ARTS AND SCIENCES DEGREE, A STUDENT MUST:

(1) Complete a minimum of 61 credit hours

(2) Receive a grade of "C" or better in each of three CORE courses

(3) Have a passing score on all sections of TASP (for students entering the DCCCD Fall, 1989 or thereafter)

(4) Complete 61 hours, including the following courses:

Students who plan to transfer to a four-year institution must consult the catalog of that institution to insure that selected courses will both transfer and apply toward the intended major. Material about transfer information is available in the Counseling Center.

	EDIT HOURS COMPLETED	REQUIREMENTS	CREDIT HOURS TO BE COMPLETED
CORE COURSES		SOCIAL SCIENCE	
English 101	3	History 101	3
Speech Communication 101	3	History 102	3
*Math (100 level or above courses)	3	Government 201	3
Note: You must receive a grade of "C"	3	Government 202	3
or better in each of these courses.		Only 3 hours of History and 3	hours
*See an advisor for the appropriate course	,	of Government may be earne	d through
selection for your major.	•	credit-by-exam.	· ·
English 102	3	BUSINESS	3
Sophomore Literature	3	3 credit hours to be chosen	
(Select from English 201, 202,	, •	Accounting	
203, 204, 205, 206, 215, or 216)		Business	
		Computer Information Syste	ems
LAB SCIENCE	8	Economics	
8 credit hours to be chosen from:	· ·	or	
Biology		Management 136	
Chemistry		Cooperative Work Experience	will not
Astronomy .		meet this requirement.	
Geology		<del></del>	
Physics		PHYSICAL EDUCATION	1
or	,	A maximum of 4 physical ed	
Physical Science		activity hours may be counted	ed toward
See an advisor for the appropriate course selection for your major.	•	graduation requirements	
- Joseph Marie Mar	<del></del>	ELECTIVE CREDIT	16
HUMANITIES	3	Any credit course offered in	the DCCCD
3 credit hours to be chosen from:		will count toward graduation	with the
Art 104		EXCEPTION of the following	courses:
Humanities 101		Courses numbered 099 and Art 199	below
Music 104		College Learning Skills 100	,
Philosophy 101		Developmental Communication	
Theater 101 Foreign Language		Human Development 100	ations 120
or or canguage	٠.	Human Development 110	
Literature		Library Science 101	J
(Select from English 201, 202,		Music 199	•
203, 204, 205, 206, 215, <i>or</i> 216)		Theater 199	
BEHAVIORAL SCIENCE	3	Students wishing to transfer to a four	vear institution, must
3 credit hours to be chosen from:	·	consult the catalog of the institutions	to which they wish to
Anthropology		transfer. These catalogs should be us	ed by students work-
Human Development		ing with an advisor in planning their a	academic orogram.
(with the exception of		Elective credit courses should be sele	cted based on such
HD 100 and HD 110)		an advisement process. The selection	of science and math
Psychology	`	courses is frequently based on the for	ur-year major, SEE
or	'	AN ADVISOR FOR SELECTION OF	APPROPRIATE
. Sociology	ļ	COURSES.	. = -

TOTAL

Where a technical/occupation program heavily emphasizes a specific cluster as part of its requirements, students are encouraged to select from other clusters to satisfy this requirement. For example, students pursuing an A.A.A.S. degree in accounting must enroll in many courses from the business cluster as part of their program requirements. Therefore, to meet Common Learning requirements, the 6-8 additional hours should be selected from the other three clusters: Behavioral/Social Sciences, Humanities, or Laboratory Science.

For some programs, more than 60 credit hours are required. All prescribed requirements for the specific technical/occupational program in which the student is enrolled must be completed. These programs may also have other criteria in addition to degree requirements. See the Technical/Occupational Programs section of the catalog for a more detailed explanation. A maximum of four physical education activity hours may be counted as credit toward graduation. The G.P.A. for an Applied Arts and Sciences Degree is based only on the hours used to meet degree requirements. The following courses will not count toward graduation nor the G.P.A. for graduation: Courses numbered 099 and below, Art 199, College Learning Skills 100, Development Communications 120, Human Development 100, Human Development 110, Library Skills 101, Music 199, and Theatre 199.

### **Certificate Programs**

The requirements for certificates are detailed under specific programs in the Technical/Occupational Programs section of this catalog. A "C" (2.0) grade point average, based on G.P.A.(2). is required. The G.P.A. for a certificate is based only on the hours used to meet certificate requirements. The following courses will not count toward graduation nor the G.P.A. for graduation: Courses numbered 099 and below, Art 199, College Learning Skills 100, Development Communications 120, Human Development 100, Human Development 110, Library Skills 101, Music 199, and Theatre 199. Students working toward a certificate may be exempt from the TASP requirement.

## Procedure For Filing Degree And Certificate Plans And For Graduation

Students should request a degree plan from the Registrar's Office at the end of their freshman year. Official transcripts of all previous college work must be on file at the time of request for degree plans. Students following a one-year certificate program should request an official plan during the first semester of their enrollment. Application for the granting of the degree or certificate should be filed in the Registrar's Office prior to the deadline announced by the Registrar.

An annual graduation ceremony is held at the conclusion of the spring semester. Participation is ceremonial only and confers on a student no rights to a degree. December graduates may participate in the next commencement if they desire and July and August graduates may participate in the spring commencement if they desire, but neither is required to do so. The Registrar's Office

should be notified if the student wishes to participate. Instructions for graduation are mailed to all candidates prior to commencement.

In addition to other graduation requirements, a student has five (5) years from the date of original enrollment in the college granting the degree to complete the specific course requirements detailed in the college catalog. If the student does not fully complete the course requirements within five (5) years, the student must select a subsequent catalog year, provided the requisite courses are still being offered in the program.

The student has the ultimate responsibility to select and register for courses meeting graduation requirements.

### Waiving Of Scholastic Deficiency

Any student in an academic transfer program may transfer to Applied Arts and Sciences degree or Certificate program. In such a case, the student may choose to have any grades below "C" disregarded. However, the procedure for disregarding low grades may only be exercised while the student is in a career program. If the student changes to an academic transfer program, the original conditions of the academic transfer program must be followed, including the calculation of a cumulative grade point average of all college credits earned. The procedure for waiving scholastic deficiency applies both to students of this college and to students transferring from other institutions. The student who wishes to use the procedure for waiving scholastic deficiency should so state in writing to the Registrar prior to registration and should inform a counselor of such intentions during the pre-registration advisement session.



# V. EDUCATIONAL AND SPECIAL OPPORTUNITIES FOR STUDENTS WISHING TO TRANSFER

### **Academic Transfer Programs**

The Dallas County Community College District offers a broad range of educational opportunities for the student whose goal is to transfer to a four-year institution. In addition to offering a strong, creative foundation for the freshman and sophomore years, the academic transfer curriculum is coordinated with several Texas four-year institutions to insure the transfer of credits. Although each four-year school is different, students may guarantee transferability of their courses by being active and responsible in the advisement process. By consulting the four-year institution regularly and taking advantage of the resources available at each of the DCCCD colleges, students may insure that the transfer process is a positive experience.

In order to aid students in transferring to other Texas public colleges and universities, the Texas Higher Education Coordinating Board has established procedures regarding the transfer of credit. The following procedures will be followed by public institutions of higher education in the resolution of transfer disputes involving lower division courses:

- (1) If a Texas public insitution of higher education does not accept course credit earned by a student at a DCCCD college, that institution shall give written notice to the student and the DCCCD that the transfer of the course credit is denied.
- (2) The two institutions and the student shall attempt o resolve the transfer of the course credit in accordance with Board rules an/or guidelines.
- (3) If the transfer dispute is not resolved to the satisfaction of the student or the DCCCD within 45 days after the date the student received written notice of the denial, the institution that denies the transfer of the course credit shall notify the Texas Higher Education Coordinating Board Commissioner of its denial and the reason for the denial.

The Commissioner of higher education or the Commissioner's designee shall make the final determination about a dispute concerning the transfer of course credit and give written notice of the determination to the involved student and institutions.

### **Earning An Associate Degree Prior To Transferring**

During the time of attendance in the DCCCD, students may elect to earn a two year associate degree. The Associate in Arts and Sciences Degree is designed specifically for those students who plan to transfer to a Texas four-year institution. The AAS Degree requires students to complete many of the core courses that will also be required by most senior institutions. The flexibility of this degree program also allows students to complete many of the introductory courses specifically related to their major field of study. Additional information regarding the AAS Degree can be found elsewhere in this catalog or from a counselor or advisor.

There are many advantages to completing the Associate in Arts and Sciences Degree program prior to transferring to a four-year institution. In addition to completing many of the requirements for a four-year degree program, students are able to attend college close to home, enjoy small class sizes, pay lower costs for tuition and fees, and take advantage of many personalized and creative programs. In addition, students who complete this degree may become more marketable in the work place should plans to complete the bachelor's degree become delayed or unobtainable. However, it is not required that a student complete the AAS Degree prior to transferring.

### Choosing A Major And Developing An Educational Plan

Some students will enter college with a clear idea of what major they will choose and to which senior institution they will transfer. However, the fact is that most students do not know where they will transfer or what their major may be.

There are several freshman level core courses that will apply toward most majors. Students are encouraged to use the first semester to investigate their own interests. By the second or third semester, students should begin to develop a clear sense of which senior institution they will enter and the requirements for their chosen degree program. Working closely with a counselor or advisor, and utilizing current information from four-year institutions, students who plan to transfer are encouraged to follow the Associate in Arts and Sciences Degree plan as many of the required courses are often required at four-year institutions.

The Counseling personnel at each of the DCCCD campuses can provide assistance in developing a degree plan for almost any major. Listed below are some of the four-year majors students can begin in the DCCCD:

Accounting
Advertising
Agriculture
American Studies
Anthropology
Architecture

Art

**Biological Science** 

**Botany** 

**Business Administration** 

Chemistry

City/Regional Planning

Computer Science

Dance

\*Dentistry

**Dietetics** 

Drama

**Economics** 

Engineering

**English** 

Entomology

Finance

Fine Arts

Foreign Languages

**Forestry** 

Geography

Geology

**Health Sciences** 

History

Home Economics

Industrial Arts

Interior Design

Journalism.

\*Law

Liberal Arts

Life Sciences

Management

Marine Biology

Marketing

**Mathematics** 

Medical Technology

\*Medicine

Meteorology

Microbiology

Music

Music Education

Nursina

Occupational Therapy

Oceanography

Optometry

Pharmacy

Philosophy

Photojournalism

Physical Education

Physical Science

Physical Therapy

**Physics** 

**Political Science** 

**Psychology** 

**Public Relations** 

Radio/TV/Film

Recreation

Social Work

Sociology

Speech Communication

Speech Pathology Teacher Preparation

\*Telecommunications

Theatre

Veterinary Medicine

Wildlife Management

Zoology

\* These fields require study beyond the bachelor's degree.

### **College Resources For Transfer Students**

Each of the DCCCD colleges offers many resources designed specifically for those students planning to transfer to a four-year institution. Students are encouraged to take advantage of these resources early in their collegiate experience, particularly if they are undecided upon a major or have not selected a senior institution. Many of the resources can assist students in making informed decisions when selecting courses, choosing a transfer institution, and completing all of the necessary steps in the transfer process.

### The Counseling Center

Students are invited to utilize the valuable resources found in the Counseling Center, and are encouraged to seek the advice of a counselor/advisor when planning each semester of study.

The Counseling Center has several resources to assist students, including a large collection of senior institution catalogs and bulletins, senior college admission application forms, and other specialized brochures and information materials. Students can also take advantage of several computer resources, such as DISCOVER, GIS, and SIGI. These simple computer programs are designed to help students clarify goals, identify career and occupational aptitudes, and research information about senior institutions.

In addition, there are many activities planned especially for transfer students. These activities include College Days where officials from senior institutions visit on-campus to talk directly with students, special transfer workshops and seminars, and events designed to assist students in making career decisions.

A number of other materials are available to aid students who plan to transfer. These materials are outlined below:

### **Course Selection Guides**

Course Selection Guides offer a listing, in DCCCD course numbers, of courses necessary for a number of majors at many institutions throughout Texas. Course Selection Guides may be available for the following majors:

Accounting

Aerospace Engineering

Agriculture

Architecture

Art

Biology

**Business Administration** 

Chemical engineering

Chemistry Civil Engineering Computer Science Criminal Justice **Economics** Electrical Engineering English **Fashion Merchandising** Finance Foreign Languages Geography Geology History Industrial Engineering Interior Design **Journalism** Management Marketing Mathematics Music Music Education Nursina Pharmacv Physical Education Physical Therapy **Physics** Political Science Pre-Law

Pre-Veterinary Medicine

Radio/Television/Film

**Psychology** 

Social Work

Sociology

Speech Pathology/Audiology
Teacher Preparation
Undecided
Although the information on these guides has been reviewed by officials at the various senior institutions, the content is subject to change, and it is the responsibility of the student to verify with the institutions of their choice the applicability of this information. Counselors and academic

majors other than those listed above. **Equivalency Guides** 

Equivalency Guides offer a listing of how every course offered in the DCCCD transfers to a given senior institution. This information is helpful for those students who have selected a senior institution, but have yet to determine a major. Students should note that the transfer equivalencies shown on these guides offer information on how courses are generally accepted by the senior institution, and do not indicate how these courses may apply toward a particular major or degree program. A counselor/advisor can assist students in determining the applicability of courses to a particular major.

advisors can also assist students with preparation for

### **Choosing A Catalog Year**

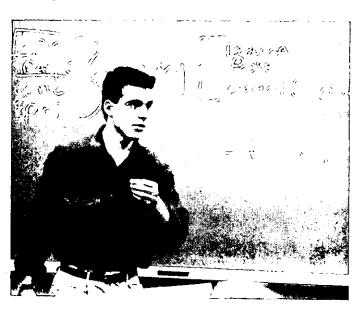
Students who plan to transfer to a four-year institution have a choice to make regarding their requirements for graduation. Such students may select to graduate under the requirements (A) in existence at the senior institution during the student's initial year of enrollment in a DCCCD college; (B) in existence at the time the major was selected; OR (C) in existence at the actual time of transfer. Students should check with the four-year institution about its policy on this matter.

Transferring students should keep a copy of the DCCCD catalogs, the four-year institution's catalogs, and the Course Selection Guides valid at the time of initial enrollment in the DCCCD and at the time when a major was selected. DCCCD course syllabi should also be maintained.

### Other Things To Consider

During the time of study in the DCCCD, students should begin to determine the necessary steps for completing the transfer admission process. The process may require a great amount of preparation, and students should be certain that they understand all of the requirements for admission, such as application deadlines, minimum grade point average requirements, limitation on the number of credit hours that are acceptable in transfer, policies regarding acceptance of repeated courses, housing information, and financial aid application procedures. Students should also consider making a personal visit to their chosen institution. Many senior institutions plan special activities and campus visitation periods where students can meet with representatives from all areas of the institution.

ITIS THE RESPONSIBILITY OF STUDENTS TO KNOW ANY SPECIFIC REQUIREMENT OF THE COLLEGE OR UNIVERSITY TO WHICH THEY WISH TO TRANSFER. THIS RESPONSIBILITY INCLUDES KNOWING COURSE REQUIREMENTS, NUMBER OF CREDIT HOURS ACCEPTED, AND GRADE POINT AVERAGE REQUIREMENTS.



### Technical/Occupational Programs

Students who desire to enter a chosen field as a skilled employee after one or two years of college work may enroll in one of the many technical/occupational programs oftered by the College.

Technical/occupational courses are accredited college courses which lead to a Certificate of Completion or an Associate in Applied Arts and Sciences Degree. These programs are established only after studies verify that employment opportunities exist in business and industry.

The College attempts to match the community's labor requirements with the ambitions and goals of its students. This realistic approach to occupational education is made possible by the excellent cooperation of local industry, business, and public agencies who increasingly depend on District colleges to supply skilled personnel.

A continuous liaison is maintained with prospective employers to help place graduates and to keep the training programs current with job requirements. Recommendations for adding new programs to the College offerings are made periodically and are based on community studies which identify additional needs.

Many technical/occupational courses can be offered on company sites for their employees.

### Credit By Examination

Students who believe they already meet the requirements of a course by experience or previous training may request credit by examination. The Registrar's Office has knowledge of courses available through this method. The examination may be a section of the College Level Examination Program (CLEP), Advanced Placement Exams (CEEB), or a teacher-made test, depending on the course.

The student pays an examination fee for each course examination. This fee must be paid prior to taking the examination and is not refundable. The College's credit by examination program is coordinated with similar programs of four-year institutions. Final acceptance of credit by examination for specific degree purposes is determined by the degree-granting institution. Students planning to use credit by examination to meet degree requirements at other institutions should check the requirements of the receiving institution.

Students must be currently enrolled at a DCCCD college to receive credit by examination. Students may not request credit by examination in courses for which they are currently enrolled. Students may earn as many credits through examination as their ability permits and needs require, but the last 15 credit hours required for graduation in any degree or certificate program may not be earned through credit by examination except as approved by the Vice President of Instruction.

Credit by examination may be attempted only one time in any given course, and a grade of "C" or better must be earned in order for credit to be recorded. A student may use credit by examination for only three (3) credit hours to apply toward the degree requirements in history and only three (3) credit hours to apply toward the degree requirements in

government.

### Non-Traditional Learning

The College is committed to serve students and the community in the most effective manner possible while maintaining high standards of education. Students learn in a variety of ways and through a multitude of experiences. Therefore, the College will evaluate these learning experiences and grant equivalent college credit applicable to an Associate in Applied Arts and Sciences degree or certificate program. The following guidelines pertain to such evaluations:

- 1. The student must be currently enrolled in the college to receive equivalent credit for non-traditional learning.
- Credit for specific courses offered by the college may be granted for non-traditional learning experiences after proper assessment of those experiences. Credit will be awarded on a course by course basis only. The student must be enrolled in the college which is assessing the learning experiences.
- 3. A student is required to complete at least 12 semester hours of course work with the District, six of which are in the student's major occupational area, prior to awarding of equivalent credits for non-traditional activities. The "CR" grade is awarded for non-traditional course work accepted for credit.
- Credit may be granted for occupational courses approved by the Coordinating Board of Colleges and Universities.
- 5. The number of equivalent credits awarded may not exceed the total number of credits required for the student's specific associate degree objective. No graduation, residency, degree or program requirements will be waived as a result of credits earned as provided by this policy.

Students desiring to take advantage of this opportunity should consult with the College Advocate for Non-traditional Learning for additional information. Students making application for assessment of prior learning through life experiences are required to enroll in a human development course to facilitate the process.

#### High School Articulation/2+2 Agreements

The College has established a process for evaluating the work of high school vocational graduates to determine it a student can receive college credit for competencies mastered in the high school vocational program. Students should check with the College Dean of Career and Continuing Education or the Counseling Center for more information.

### Flexible Entry Courses

In keeping with its commitment to meet individual educational needs, the College makes available flexible entry courses. These courses are often self paced, allowing students to work at their own speed. Students are cautioned to be aware of the time specified by the College as to when the course requirements need to be completed. Students may register for flexible entry courses during the pre-semester registration periods or at regular times during

the semester. Students should check with the Registrar to determine times for registration in these courses. Approval must be obtained for enrollment.

#### Telecourses

Students may take a variety of college-credit courses via television which are called "telecourses." Telecourses require the viewing of video programs on local cable systems, KDTN, Channel 2 or at campus Learning Resource Centers. Reading, writing and study guide assignments are required, as well as attendance at an on-campus orientation session. Three or four tests are administered on campus during each telecourse, and some courses require discussion meetings, laboratory sessions or field trips. Campus visits are scheduled for times convenient to students.

Content and credit for telecourses are equivalent to that of courses taken on campus. All telecourses are noted in the course description section of this catalog and their schedules included in the college class schedule. Telecourses may be taken in conjunction with on-campus classes, and students may enroll for them through normal registration processes. For more information, call the Telecourse Hotline: 324:7780.

### Cooperative Work Experience

Students may enrich their education by enrolling in cooperative education courses. Cooperative education is a method of instruction that offers the student the opportunity to earn college credit for the development and achievement of learning objectives which are accomplished through current on-the-job experience.

Work experience must be related to a field of study and an occupational goal. This work experience takes place at work training stations approved by the College. Employers must be willing to enter into training agreements with the College and the student/employee. The College will assist a student in seeking approvable employment, if needed.

To enroll in a cooperative education course, students must:

- \* complete a student application form
- have completed at least six semester hours in an occupational major or secure waiver or require ment from the instructor
- declare a technical/occupational major or file a de gree plan
- be currently enrolled in a course related to the major area of study;
- \* be approved by the instructor.

Additional information regarding cooperative education may be secured from the Cooperative Education Office, the Division Office, or Counseling Office at each college. Technical/occupational programs which include cooperative education are indicated in this catalog.

### International Studies



Each year a number of summer-abroad, intensive courses combine learning experiences with foreign travel. Such intensive courses are under the direct supervision of faculty, and college credit may be earned by students who successfully meet the learning objectives established for these courses. In previous years these courses have been offered in Austria, Australia, China, France, Great Britain, Germany, Russia, Jamaica, Spain, and Italy. Most of these courses are offered during the summer, and a complete listing for 1990-91 can be secured form the District Office of Student and International Programs (746-2410).

There are several semester-abroad programs available in France, Mexico, Spain, and England at colleges in those countries. Prior knowledge of French is not required for participation in the France programs, although students are expected to enroll in such language courses during their period of participation. Semester-abroad opportunities are designed for mature students with at least a 2.5 cumulative grade point average.

### **Human Development Courses**

In human development courses, students can learn skills useful in everyday living to promote their personal growth. Much of the success and satisfaction in life is dependent on good interpersonal communication skills, making healthy adjustments to our changing society, and pursuing a satisfying career. The human development curriculum gives the student an opportunity to obtain and practice skills in these important areas.

These courses are taught by counselors and other qualified instructors. They offer academic credits which transfer to most four-year institutions. The courses in human development enhance the total curriculum and blend in with the total concept of the community college.

Campuses also offer special topics courses relevant to life issues. In addition, Speech Communications 101, a course combining aspects of interpersonal communications and public speaking, is required for DCCCD associate degrees.

### **Development Studies**

Students whose assessment test scores (DCCCD, SAT, ACT, or TASP) indicate they lack the skills necessary to be successful in college-level courses will be advised to enroll in developmental courses. Successful completion of these courses will provide prerequisite skills for college-level work. Other students who wish to review and improve basic skills may also elect to take one or more developmental courses.

Reading, writing and mathematics courses are offered in classroom settings with laboratory support. These developmental courses provide instruction directly related to student's personal, academic and career goals.

### **Evening And Weekend College**

In dynamic, growing communities such as those encompassing this college district, people have continuing educational needs, yet many of them have work schedules and personal involvements which make it impossible for them to attend college during normal daytime hours. For this reason, most courses offered during the day are also available in the Evening and Weekend College. Courses are offered both on campus and at selected community locations.

Evening and weekend courses offer high quality instruction, excellent facilities, and a variety of student services, including counseling, health, library, bookstore, food services, financial aid, and recreation. Instructors are selected from the College's own full-time staff, from outstanding Dallas area educators, and from other professional specialists interested in teaching. To enroll in the evening and weekend courses, contact the Director of Admissions.

### Learning Resources Center and Library Obligations

The Learning Resources Center (LRC) supports the entire instructional program. The two major parts of the LRC are the library and instructional media services.

The library is a place where students can find print and non-print materials to supplement classroom learning or where - if they choose - they can actually take a course. The library helps students to learn in their own way and at their own speed. In addition to print materials and reference help, the library may provide slides, tapes, compact discs, computer software, videotapes, and films. The college has a growing collection of books on a wide variety of general information areas to support academic transfer programs and technical/occupational programs, In addition, there are special collections of career materials and pamphlets. The library also subscribes to current popular and technical periodicals as well as to area and national newspapers.

Instructional media services supports the classroom instructional program and are responsible for all campus audio-visual equipment and non-print materials used in the classroom and for the production of instructional materials.

Willful damage to library materials (or property) or actions disturbing users of the library may lead to the loss of library privileges. Damage cases are referred to the appropriate authorities for further action. All books and other library materials must be returned before the end of each semester. No transcript is issued until the student's library record is cleared.

### Servicemen's Opportunity College

In cooperation with other community colleges in the United States, colleges of the Dallas County Community College District participate in the Servicemen's Opportunity College. Through this program, students can plan an educational experience regardless of location requirements of the military. For further information, contact the Admissions Office.

### **Continuing Education Programs**

Within the Dallas County Community College District, Continuing Education is an educational development process which creates an instructional delivery system that is flexible, diverse, visionary, and responsive to the needs of its public, private, and corporate citizens. Continuing Education provides non-credit skills training, personal and professional courses, and programs for human, community, and economic development, and thus expands the available educational opportunities for all persons of all ages to participate in college programs.

Continuing Education instructors are professionals from the community chosen because they have proven experience in their field. Their objective is to share their knowledge, insight and expertise, to insure that students acquire a knowledge of the subject, and through a meaningful learning experience become equipped to better serve their community, business, and themselves.

Courses are offered as seminars, workshops and institutes—the type of course is determined by the nature of the material, instructional approach, and the needs of the students. Usually there are no entrance requirements or examinations; however, some courses may have age restrictions and others may require a certain amount of experience in the subject field for enrollment. Admission is on a first-come, first-served basis. Registration is simple, quick and easy, and may even be accomplished by phone. Continuing Education classes are held on the campus of each college and in a variety of locations throughout the community. Classes and activities are conducted throughout the week, both during the day and evening hours, and also on Saturday and Sunday.

Because of the nature of Continuing Education course offerings, textbooks may not be required in some courses; however, other courses will require the purchase of texts and/or special class materials. To enhance the educational experience of those students who enroll in Continuing Education classes, library privileges are afforded every student during the term in which they are registered.

Scholarship funds are available for specific vocationally oriented courses. To apply for these scholarship funds please inquire at the Continuing Education Office.

### Continuing Education Units (CEU's)

College credit may be awarded for some courses related to DCCCD vocational/technical/occupational programs. Continuing Education Units (CEU's) are transcripted upon successful completion of the course. In all recognized educational circles, one CEU is equal to "ten contact hours of participation in an organized Continuing Education or extension experience under responsible sponsorship, capable direction, and qualified instruction." The CEU is a means of recording and accounting for Continuing Education activities and meeting the certification requirements of certain professional organizations.

## The Business and Professional Institute of the Bill J. Priest Institute for Economic Development

The Business and Professional Institute (B.P.I.) manages and delivers training and education to businesses, industries, government agencies, and professional associations. The Institute custom designs training or provides college credit programs or request to be taught on any of the college campuses or on-site at an office or plant. The duration of training or services is customized to meet special requirements and is based on a per-hour contract cost. A B.P.I. office is located on each campus and is staffed with training experts to assist the business community in identifying needs, developing programs and delivering training requests. Other B.P.I. services include conference planning, business forums, tele-conferencing, basic skills assessment, and small business development assistance.

### The Bill J. Priest institute for Economic Development

The B.J.P. Institute, in addition to the Business and Professional Institute, also includes the Edmund J. Kahn Job Training Center, the Small Business Development Center (SBDC), the Center for Government Contracting, the Business Incubation Center, the Child Care Center, and the International Trade Resource Center. Detailed information about each of these programs can be found in the section entitled, "Bill J. Priest Institute for Economic Development" or by calling 214-565-5700 to request more information.



### VI. STUDENT DEVELOPMENT

The College is committed to providing opportunities for each individual student's total educational development. Specific student services are integrated with the instructional program of the College to address individual needs for educational, personal, social, cultural, and career development.

### **Student Programs and Resources**

The Student Programs and Resources Office plans and presents a wide variety of programs and activities for the general campus population and the surrounding community, including lectures, art gallery activities, and performance events. Programs often are coordinated with the various instructional divisions to provide students with valuable educational experiences. Leadership conferences, retreats, and service learning programs offer students opportunities to develop skills that can enrich the quality of their own lives and the life of their community. Student Programs and Resources seeks to involve students meaningfully in campus life. Recent research in higher education indicates that for many students involvement is an important contributor to academic success.

### **Counseling Center Services**

Individuals may find the counseling services helpful as they make plans and decisions in various phases of their development. For example, counselors can assist students in selecting courses of study, determining transferability of courses, choosing or changing careers, gaining independence, and confronting problems of daily living. Assistance is provided by the counseling staff in the following areas:

- 1. Career counseling to explore possible vocational directions, occupational information, and self appraisals of interest, personality and abilities.
- 2. Academic advisement to develop and clarify educational plans and make appropriate choices of courses.
- 3. Confidential personal counseling to make adjustment and life decisions about personal concerns.
- 4. Small group discussions led by counselors focusing on such areas as interpersonal relationships, test anxiety, and assertiveness. Counselors will consider forming any type of group for which there is a demand.
- 5. Referral sources to provide in-depth assistance for such matters as legal concerns, financial aid, tutoring, job placement, medical problems, or emotional problems.

### **Tutoring Services**

For students needing special assistance in course work, tutoring services are available. Students are encouraged to seek services through self referral as well as through instructor referral.

### Testing/Appraisal Center

The Testing Center administers various tests. Types of tests include:

- Psychological tests of personality, vocational inter ests, and aptitudes.
- Academic tests for college instructional programs.
   Many courses are individualized and self-paced, permitting students to be tested at appropriate times.
- Assessment tests, required for appropriate class place ment
- 4. Tests for selected state and national programs.
- 5. Testing for correspondence courses.

The Student Code of Conduct provisions regarding disruptive behavior and/or academic dishonesty apply equally to Test Centers as they do to classroom settings. Irregularities will be referred to the proper authorities for disciplinary action.

### **Health Center**

Health is the most fundamental human need, and a high standard of physical and mental health is desirable for every human being. The Health Center helps maintain and promote the health of students, faculty, and staff. Services provided by the Health Center include education and counseling about physical and emotional health, emergency first aid treatment, referral services to community agencies and physicians, tuberculin skin tests and other screening programs, and programs of interest to students and faculty. Students are encouraged to make an appointment with the nurse to discuss specific health problems. No information on a student's health is released without written permission from the student, except as required by law.

### **Placement Services**

The Dallas County Community College District provides job placement services free of charge to DCCCD students (credit and non-credit), alumni, and those in the process of enrolling. Staff members provide assistance by utilizing the computerized Career Planning and Placement System. This system contains lists of job openings in a variety of fields throughout the Metroplex. Staff members also provide assistance with establishing employment contacts, pre-employment skills training, job interviewing, writing a resume and cover letter, and developing job search strategies leading to success.

### **Special Services**

The Special Services Office offers a variety of support services to enable students with disabilities to participate in the full range of college experiences. Services are arranged to fit the individual needs of the student and may include sign language interpreters, notetakers, tutors, mobility assistants, readers, and loan of wheelchairs, audio tape recorders, talking calculators, taped textbooks, and oral testing (for those students with visual impairments or learning disabilities). Academic, career and personal



counseling are also available. Students with special needs should contact the office at least one month before registration. The office will provide students with an orientation session and registration information. For additional information, contact the Special Services Office or the Counseling Center.

### **Student Organizations**

Information about participation in any organization may be obtained through the Student Programs and Resources Office. The development of student organizations is determined by student interest. Categories of organizations include:

Co-curricular organizations pertinent to the educational goals and purposes of the College.

Social organizations to provide an opportunity for friendships and promote a sense of community among students.

Service organizations to promote student involvement in the community.

Pre-professional and academic organizations to contribute to the development of students in their career fields.

### Intercollegiate Athletics

Participation on athletics teams is voluntary on a nonscholarship basis for students who meet requirements established by the Metro Athletic Conference. Some sports are associated with the National Junior College Athletic Association. For more information regarding eligibility, rules, standards, and sports offered, contact the Physical Education Office.

### **Intramural Sports**

The College provides a campus intramural program for students and encourages participation. For additional information contact the intramural director in the Physical Education Office or the Student Programs and Resources Office.

### Housing

The College does not operate dormitories of any kind or maintain listings of available housing for students. Students who do not reside in the area must make their own arrangements for housing.

### **Campus Police Department**

Campus safety is provided within the framework of state law to "protect and police buildings and grounds of state institutions of higher learning." Because all laws of the state are applicable within the campus community, specially trained and educated personnel are commissioned to protect college property, personal property, and individuals on campus. Officers of the Campus Police Department are licensed Peace Officers of the State of Texas. These officers are vested with full authority to enforce all Texas laws and rules, regulations, and policies of the College, including the Code of Student Conduct.

### VII. FINANCIAL AID

Financial aid is available to help those students who, without such aid, would be unable to attend college. The primary resources for meeting the cost of education are the student, the parents and/or spouse. Financial aid, however, can remove the barriers for those families who cannot afford the cost of education beyond high school and can fill in the gap for families who can afford only part of the cost.

### How to Apply

All students must complete the Financial Aid Application and return it to the Financial Aid office of the DCCCD college the student plans to attend. The Financial Aid Form(FAF) of the College Scholarship Service must be completed using data from the Federal Income Tax Return. This form is used to provide an analysis of financial need. It may be obtained from a high school counselor or from any DCCCD Financial Aid office. The FAF is to be mailed directly to the College Scholarship Service with the required processing fee noted on the form. Allow 4 to 6 weeks for the processing. The student should mail the FAF at least one month before the priority deadline for the semesters for which the student is applying.

The Department of Education will randomly select some applicants and require that information reported on the FAF or PELL Grant application be verified for accuracy. If the student's application is one that is selected, the student will be required to provide additional documents before financial assistance can be awarded.

All eligible non-citizens must submit a copy of an INS card as proof of immigration status before financial assistance can be awarded.

For students who attended other colleges, universities, vocational or trade schools (including our DCCCD colleges), a Financial Aid Transcript must be sent from each institution to the Financial Aid office of the school where the student is applying. This procedure is required even though the student may not have received financial assistance at the previous institution.

Students born after December 31, 1959, and who are required under the Military Selective Service Act to register for the draft, must do so before financial aid can be approved. All students who apply for financial aid must sign

a Registration Compliance Statement giving their selective service registration status before financial aid can be awarded. All students receiving Pell Grants must also sign an Anti-Drug Abuse statement certifying that they will not violate drug laws, "in conducting any activity with the grant."

### Deadlines for Applying

Application for financial assistance received by the following dates will be given first priority:

Academic Year — July 1 Spring Only — November 1 Summer Sessions — May 1

Applications received after these dates will be processed as time and availability of funds permit. Late applicants need to be prepared to pay their own registration costs until action on their application can be completed. Applicants should contact the Financial Aid Office at the school to which they plan to attend for additional deadlines and requirements.

The student must reapply for financial assistance every year. The award does not continue automatically beyond the period awarded.

### **Grants**

### **Pell Grant**

The Pell Grant is a federally funded program designed to help undergraduate pre-baccalaureate students continue their education. The purpose of this program is to provide eligible students with a "foundation" of financial aid to assist with the cost of attending college. A time limit on a student's eligibility does exist depending on the student's undergraduate program of study.

All students applying for financial assistance through the College must apply for a Pell Grant. This is generally done through the FAF application discussed earlier. Other types of financial aid may be awarded if the student applies and qualifies. Eligibility for Pell Grant is based on financial need and satisfactory academic progress. Applications and additional information concerning the Pell Grant Program are available in the Financial Aid Office and in the counseling offices of most high schools. The application process takes approximately 8-10 weeks. In response to the Pell Grant application, a Student Aid Report (SAR) will be mailed directly to the student. The student should immediately review the SAR to make sure it is ∞rrect and bring all copies to the Financial Aid Office. The exact amount of the Pell Grant award will depend upon the aid index on the SAR and the number of hours for which the student enrolls. In order to be eligible, a student must enroll for a t least six credit hours each semester. When Congress appropriates full funding for the Pell Grant Program, applicants with an SAI of 0 may be eligible to receive a Pell Grant when enrolled in less than six credit hours. Students must apply each year.

### Supplemental Educational Opportunity Grant (SEOG)

The SEOG program provides assistance for eligible undergraduate students who show exceptional financial need, are making satisfactory academic progress toward their educational goal and are enrolled for at least six credit hours. The maximum award for an academic year is \$4,000; however, the actual amount of the grant may be limited to less than this, depending on the availability of funds at the school, the student's family financial condition and other financial aid the student is receiving. Priority is given to students receiving Pell Grant. Students must apply each year for the SEOG.

### **Texas Public Educational Grant (TPEG)**

The TPEG Program was enacted by the 64th Texas legislature to assist needy students attending state supported colleges in Texas. To be eligible students must show financial need and be making satisfactory academic progress toward their educational goal. The actual amount of the grant will vary depending on thavailability funds at the school, the student's family financial condition and other financial aid the student is receiving. This grant is available to students enrolled in credit and some non-credit courses. Students must apply each year for the TPEG.

## Texas Public Educational-State Student Incentive Grant (TPE-SSIG)

The TPE-SSIG Program is a state grant that is matched with federal funds to provide financial assistance to needy students attending state-supported colleges in Texas. No more than 10% of the funds may be awarded to non-resident students. To qualify, students must enroll for at least six credit hours per semester, make satisfactory academic progress toward their educational goal, and have financial need. The maximum grant for an academic year is \$2,500; however, the actual amount of the grant award may be less depending on the availability of funds and the degree of financial need. Grants are awarded by eligibility on a first-come, first-served basis. Students must apply each year for the TPE-SSIG.

#### **Scholarships**

### **DCCCD Foundation Scholarships**

The DCCCD Foundation provides a scholarship program for students who attend one of the colleges of the DCCCD. These funds are made available through the colleges to needy students who also meet additional criteria of the scholarship funds. Application forms for these Foundation scholarships and information concerning other requirements and deadlines are available in the Financial Aid Office at each college.

### Miscellaneous Scholarships

Several of the colleges have a limited number of scholarships available as a result of gifts from individuals, private industry, and community organizations. Generally, the eligibility criteria is the same as noted for the DCCCD Foundation Scholarships, and application forms are avail-



able in the Financial Aid Office.

### Loans

### Stafford Loans (formerly GSL):

The Higher Education Act of 1965, as amended, provided for student loans from private commercial lending agencies such as banks, savings and loan associations, credit unions and insurance companies. To be eligible students must now have financial need, make satisfactory academic progress toward their educational goal, and be enrolled for at least six (6) credit hours. As an undergraduate, the student may borrow up to \$2,625 per year for the first two academic years and a maximum of \$17,250 for all years of undergraduate study. The actual loan amount may be limited to less than this, depending on the cost of attendance, other financial aid, and family financial condition.

The interest rate is set by Congress and is currently 8%. Borrowers do not pay interest until six months after ceasing at least half-time enrollment. The U.S. Dept . of Education pays the interest during the time the student is enrolled and during the grace period of six months following enrollment. Repayment begins six months after the student leaves school or drops to less than half-time enrollment. After July 1, 1988, the interest rate for first time borrowers will increase from 8% to 10% in the fifth year of repayment. The minimum payment will be \$50 per month, and the loan must be repaid within 10 years. Lenders may charge a 5% loan origination fee on each loan in addition to the insurance premium charged on the loan. These charges will be deducted from the proceeds of the loan. Under the Supplemental Loans to Students (SLS) Program, independent undergraduate students may be eligible to borrow up to \$4,000 per academic year. Recent legislation requires an undergraduate to complete a needs analysis to determine whether there is Pell or GSL eligibility before an SLS loan can be completed, however. The loan maximum is \$20,000 for all the years of undergraduate study. The interest rate is variable, ranging from 9% to 12%. Repayment begins within 60 days after disbursement of the loan, except that the borrower is entitled to a deferment of the principal for at least half time enrollment. Most lenders will capitalize the interest if the payments are deferred.

Under the PLUS Program, parents may now borrow up to \$4,000 per year for each dependent undergraduate student with the loan maximum for each eligible student of \$20,000.

The current interest rate is variable. Repayment of principal and interest begins within 60 days after disbursement of the loan.

## Hinson-Hazelwood College Student Loan Program (HHCSLP)

The Hinson-Hazelwood Loan is a state-funded Guaranteed Student Loan Program for students who are attending Texas colleges and are elibible to pay Texas resident tuition rates. All Hinson-Hazelwood Loan applicants must demonstrate financial need before a loan can be approved. The loan limit has been raised to \$2,625 for the first two years of undergraduate study and a maximum of \$17,250 for all years of undergraduate study. The actual loan amount may be limited to less than this depending on the cost of attendance, other financial aid, and the family's financial condition. A 5% loan origination fee and an insurance premium on the life of the student will be taken from the total amount of each loan. The interest rate currently is 7% per year simple interest. No interest or payments are paid by the student while enrolled at least half-time or during the six month grace period. The interest rate will remain the same throughout the life of the loan. The minimum payment will be \$50 per month over a 5 to 10 year period depending on the total amount borrowed.

### **Emergency Short-Term Loans**

The colleges of the DCCCD have limited short-term loan funds available which have been established by individuals and organizations, including the DCCCD Foundation, to meet emergency needs to students. Loans are usually limited in amount and bear no interest. These loans must be repaid within 60 days of the date of the loan. A late fee of \$10 will be added for late payment. Delinquent loans are turned over to a collection agency or Justice of the Peace for recovery, and the student must pay the entire cost of collection. Because the funds are very limited, students should apply early if help is needed for registration costs.

### **Employment**

### College Work-Study Program (CWSP)

The College Work-Study Program provides part-time employment for students with financial need who are making satisfactory academic progress toward their educational goal and are enrolled for at least six credit hours. The wage rate is \$4.25 per hour and most students work 15 to 20 hours per week. You will be paid on the last working day of the month. The amount you can earn in a school year is determined by the amount of your financial need and other aid awarded as part of your financial aid package. The majority of the students are employed on campus; however, some off-campus employment is also available. Students must apply each year for College Work-Study.

## Student Assistants Employment Program (Non-Work-Study)

Part-time employment for students who do not have financial need is available on campus. The wage rate and the average hours worked per week are the same as the College-Work Study Program.

### **Off-Campus Employment**

Students who need help finding a job off-campus should apply at the Placement Office of the college they plan to attend. The wage rate varies with each job and financial need is not a requirement of employment.

### **Tultion Exemption Programs**

In addition to the grants, scholarships, employment and loan programs already mentioned, the State of Texas and DCCCD offer a number of exemptions from tuition and fee charges. These exemptions are often overlooked simply because of their unusual nature. They are not related to family income or "financial need," nor do they require completion of a regular financial aid application. Check with the Financial Aid Office or the Registrar's Office tuition exemption programs and the criteria for eligibility.

### Vocational Rehabilitation

The Texas Rehabilitation Commission offers assistance for tuition and fees to students who are vocationally handicapped as a result of a physically or mentally disabling condition. This assistance is generally limited to students not receiving other types of aid. For information, contact Texas Rehabilitation commission, 13612 Midway, Suite 530, Dallas, Texas 75234.

### Bureau of Indian Affairs .

The Bureau Of Indian Affairs offers educational benefits to American Indian students. Students need to contact the regional Bureau of Indian Affairs Office regarding eligibility.

Bureau of Indian Affairs Federal Office Building P.O. Box 368 Anadarko, OK 73005 (405) 247-6673

### **Veteran's Benefits Programs**

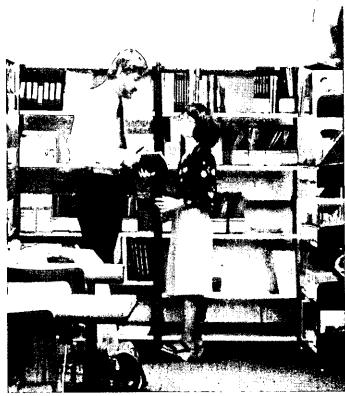
The Veteran's Benefits Programs are coordinated by the Veterans' Services Office of the College. Services of this office include counseling the veteran concerning benefits. Veterans Administration loans, Veterans Administration work study programs, financial problems, career counseling, and other areas related to the veteran's general welfare. Tutoring services are also available to the veteran who is having learning difficulties in one or more subjects. The veteran student should be aware of some of the Veterans Administration guidelines and should consult them before taking developmental or television courses. Violation of these guidelines causes complications in receiving monthly benefits or loss of those benefits.

- 1. A veteran student who plans to enroll in developmental courses must be tested and show a need in basic skills before enrolling in these courses.
- 2. A veteran student enrolled in television courses must be pursuing more on-campus credit hours than hours taken by television.
- 3. A veteran student who has successfully completed credit hours at another college or university before applying for V.A. benefits. The transcript is evaluated and credit granted when applicable.
- 4. A veteran student must enroll in courses required for a degree program. Information ondegree requirements may be obtained from the Registrar's Office.
- 5. A veteran student who withdraws from all courses attempted during a semester is considered as making unsatisfactory progress by the V.A. and may lose future benefits. A veteran student must also maintain a satisfactory grade point average as outlined in this catalog.

The above V.A. regulations are subject to change without notice. Students should contact the Veterans' Services Office in order to be aware of current regulations and procedures.

## **Hazlewood Act**

Under the Hazlewood Act certain Texas veterans who have exhausted remaining educational benefits from the Veterans Administration can attend Texas state supported institutions and have some fees waived. To be eligible, students must have been residents of Texas at the time they entered the service, have an honorable discharge, must now be residents of Texas, and be ineligible for federal grants. Applications are available at the Financial Aid Office and will take a minimum of eight weeks to process. To apply, students must submit a Hazelwood Act application, a copy of their discharge papers and a Student Aid Report stating ineligibility to the Financial Aid Office.



## **Academic Progress Requirements**

Federal law requires that students must be making satisfactory progress in their course of study in order to receive financial aid. DCCCD policy requires that students maintain a 2.0 G.P.A. for each semester for which an award is received and complete a certain percentage of the courses funded. Course work attempted at any of the colleges of the DCCCD, when the student is not receiving financial aid, also must be considered. There is a limit of 75 credit hours on the period of time for which students may receive aid. Students must have a 2.0 G.P.A. at the end of two years. A copy of the complete policy is available at the Financial Aid Office.

## **CODE OF STUDENT CONDUCT**

#### 1. PURPOSE

The purpose of this document is to provide guidelines to the educational environment of the Dallas County Community College District. This environment views students in a holistic manner, encouraging and inviting them to learn and grow independently. Such an environment presupposes both rights and responsibilities. Free inquiry and expression are essential parts of this freedom to learn, to grow, and to develop. However, this environment also demands appropriate opportunities and conditions in the classroom, on the campus, and in the larger community. Students must exercise these freedoms with responsibility.

## 2. POLICIES, RULES, AND REGULATION

## a. Interpretation of Regulations

Disciplinary regulations at the college are set forth in writing in order to give students general notice of prohibited conduct. The regulations should be read broadly and are not designed to define misconduct in exhaustive terms.

## b. Inherent Authority

The college reserves the right to take necessary and appropriate action to protect the safety and well-being of the campus community.

## c. Student Participation

Students are asked to assume positions of responsibility in the college judicial system in order that they might contribute their skills and insights to the resolution of disciplinary cases. Final authority in disciplinary matters, however, is vested in the college administration and in the Board of Trustees.

### d. Standards of Due Process

Students who allegedly violate provisions of this code are entitled to fair and equitable proceedings under this code.

The focus of inquiry in disciplinary proceedings shall be the guilt or innocence of those accused of violating disciplinary regulations. Formal rules of evidence shall not be applicable, nor shall deviations from prescribed procedures necessarily invalidate a decision or proceeding, unless significant prejudice to a student respondent or the college may result.

### e. Prohibited Conduct

Students may be accountable to both civil authorities and to the college for acts which constitute violations of law and this code. Disciplinary action at the college will normally proceed during the pendency of criminal proceedings and will not be subject to challenge on the ground that criminal charges involving the same incident have been dismissed or reduced.

## f. Definitions In this code:

- (1) "aggravated violation" means a violation which resulted or foreseeably could have resulted in significant damage to persons or property or which otherwise posed a substantial threat to the stability and continuance of normal college or college-sponsored activities.
- (2) "cheating" means intentionally using or attempting to use unauthorized materials, information, or study aids in any academic exercise.
- (3) "college" or "institution" means the colleges of the Dallas County Community College District.

- (4) "college premises" means buildings or grounds owned, leased, operated, controlled, or supervised by the college.
- (5) "college-sponsored activity" means any activity on or off campus which is initiated, aided, authorized, or supervised by the college.
- (6) "collusion" means the unauthorized collaboration with another person in preparing work offered for credit.
- (7) "complaint" means a written summary of essential facts which constitute an alleged violation of published college regulation or policy.
- (8) "controlled substance" and "illegal drugs" are those as defined by the state-controlled substances act, as amended.
- (9) "distribution" means sale or exchange for personal profit.
- (10) "fabrication" means intentional and unauthorized falsification or invention of any information or citation in an academic exercise."
- (11) "group" means a number of persons who are associated with each other and who have not complied with college requirements for registration as an organization.
- (12) "hazing" is defined in Appendix B of this code.
- (13) "intentionally" means conduct that one desires to engage in or one's conscious objective.
- (14) "organization" means a number of persons who have complied with college requirements for registration.
- (15) "plagiarism" means intentionally representing the words or ideas of another as one's own in any academic exercise.
- (16) "published college regulation or policy" means standards of conduct or requirements located in the:
  - (a) College Catalog
  - (b) Board of Trustees Policies and Administrative Procedures Manual
  - (c) Student Handbook
  - (d) Any other official publication
- (17) "reckless" means conduct which one should reasonably be expected to know would create a substantial risk or harm to persons or property or which would otherwise be likely to result in interference with normal college or college-sponsored activities.
- (18) "sanctions" means any or all of the punitive actions described in <u>Appendix A</u> of this code.
- (19) "student" means a person who has paid fees and is taking or auditing courses through the Dallas County Community College District.
- (20) "violation" means an act or omission which is contrary to a published college regulation or policy.
  - (21) "weapon" means any object or substance designed to inflict a wound, cause injury, or incapacitate, including, but not limited to, all firearms, knives, clubs, or similar weapons which are defined and prohibited by the state penal code, as amended.
- (22) "will" and "shall" are used in the imperative sense.

## g. Prohibited Conduct

The following misconduct is subject to disciplinary action:

intentionally causing physical harm to any person on college premises or at college-sponsored activities, or inten-

tionally or recklessly causing reasonable apprehension of such harm or hazing.

- (2) unauthorized use, possession, or storage of any weapon on college premises or at college-sponsored activities.
- (3) Intentionally initiating or causing to be initiated any false report, warning or threat of fire, explosion or other emergency on college premises or at college-sponsored activities.
- (4) intentionally interfering with normal college or collegesponsored activities, including, but not limited to, studying, teaching, research, college administration, or fire, security, or emergency services.
- (5) knowingly violating the terms of any disciplinary sanction imposed in accordance with this chapter.
- (6) unauthorized distribution or possession for purposes of distribution of any controlled substance or illegal drug on college premises or at college-sponsored activities.
- (7) intentionally furnishing false information to the college.
- (8) forgery, unauthorized alteration, or unauthorized use of any college document or instrument of identification.
- (9) unauthorized use of computer hardware or software.
- (10) all forms of academic dishonesty, including cheating, fabrication, facilitating academic dishonesty, plagiarism, and collusion.
- (11) intentionally and substantially interfering with the freedom of expression of others on college premises or at collegesponsored activities.
- (12) theft of property or of services on college premises or at college-sponsored activities; having possession of stolen property on college premises or at college-sponsored activities.
- (13) intentionally destroying or damaging college property or property of others on college premises or at collegesponsored activities.
- (14) failure to comply with the direction of college officials, including campus security/safety officers, acting in performance of their duties.
- (15) violation of published college regulations or policies. Such regulations or policies may include those relating to entry and use of college facilities, use of vehicles and media equipment, campus demonstrations, misuse of identification cards, and smoking.
- (16) use or possession of any controlled substance or illegal drug on college premises or at college-sponsored activities
- (17) unauthorized presence on or use of college premises.
- (18) nonpayment or failure to pay any debt owed to the college with intent to defraud.

(Appropriate personnel at a college may be designated by college or District officials to notify students of dishonored checks, library fines, nonpayment of loans, and similar debts. Such personnel may temporarily "block"admission or readmission of a student until the matter is resolved. If the matter is not settled within a reasonable time, such personnel shall refer the matter to the VPSD for appropriate action under this code. Such referral does not prevent or suspend proceedings with other appropriate civil or criminal remedies by college personnel.)

(19) use or possession of an alcoholic beverage on college premises with the exception of specific beverage-related courses within the El Centro food service program.

Sanctions for violations of prohibited conduct for (1) through (6) may results in <u>EXPULSION</u>; for (7) through (12) may result in <u>SUSPENSION</u>; for (13) through (19) may result in sanctions other than expulsion or suspension.

Repeated or aggravated violations of any provision of this code may also result in expulsion or suspension or in the imposition of such lesser penalties as are appropriate.

#### 3. DISCIPLINARY PROCEEDINGS

- a. Administrative Disposition
  - (1) Investigation, Conference and Complaint
  - (a) When the Vice President of Student Development (VPSD as referred to in this code) receives information that a student has allegedly violated a published college regulation or policy, the VPSD or a designee shall investigate the alleged violation. After completing the preliminary investigation, the VPSD may:
    - (i) Dismiss the allegation as unfounded, either before or after conferring with thestudent; or
    - (ii) Proceed administratively and impose disciplinary action; or
    - (iii) Prepare a complaint based on the alleged violation for use in disciplinary hearings along with a list of witnesses and documentary evidence supporting the allegation.

The VPSD will notify the complainant of the disposition of the complaint. If the VPSD dismisses the allegation, the complainant may appeal to the President for review in writing within (5) working days after disposition.

- (b) The President or a designee may suspend a student immediately and without prior notice for an interim period pending disciplinary proceedings, when there is evidence that the continued presence of the student on college premises poses a substantial threat to himself or herself, to others, or to the stability and continuance of normal college functions. A student who is suspended on an interim basis shall be given an opportunity to appear before the President or a designee within five (5) working days from the effective date of the interim suspension. A hearing with the President shall be limited to the following issues only.
  - the reliability of the information concerning the student's conduct, including the matter of his or her identity; and
  - (ii) whether the conduct and surrounding circumstances reasonably indicate that the student's continued presence on college premises poses a substantial threat to himself or herself, to others or to the stability and continuance of normal college functions.

After the hearing, the President or designee may modify the interim suspension as reasonable to protect the student, public, and college.

- (c) No person shall search a student's personal possessions for the purpose of enforcing this code unless the student's prior permission has been obtained or unless a law enforcement officer conducts the search as authorized by law.
  - (2) Summons
- (a) The VPSD shall summon a student regarding an alleged violation of this code by sending the student a letter. The letter shall be sent by certified mail, return receipt requested, addressed to the student at his or her last known address as it appears in the records of the Registrar's Office or shall be delivered personally to the student.

- (b) The letter shall direct a student to appear at a specific time and place not less than five (5) working days after the date of the letter. The letter shall describe briefly the alleged violation and cite the published college regulation or policy which allegedly has been violated.
- (c) The VPSD has authority to place a student on disciplinary probation if the student fails, without good cause, to comply with a letter of summons; or to apply sanctions against the student as provided in this code.

## (3) Disposition

- (a) At a conference with a student in connection with an alleged violation of this code, the VPSD shall provide the student with a copy of this code and discuss administrative disposition of the alleged violation.
  - (i) If a student accepts the administrative disposition, the student shall sign a statement that he or she understands the charges, his or her right to a hearing or to waive same, the penalty or penalties imposed, and that he or she waives the right to appeal. The student shall return the signed form by 5:00 p.m. of the day following administrative disposition.
  - (ii) If a student refuses administrative disposition of the alleged violation, the student is entitled to a hearing as provided herein. The VPSD shall note the date of refusal in writing and the student shall acknowledge in writing such date.

## Administrative disposition means:

- the voluntary acceptance of the penalty or penalties provided in this code.
- other appropriate penalties administered by the VPSD.
- without recourse by the student to hearing procedures provided herein.
- (b) The VPSD shall prepare an accurate, written summary of each administrative disposition and send a copy to the student (and, if the student is a minor, to the parent or guardian of the student), to the Director of Campus Security, to the complainant, and to other appropriate officials.

## Student Discipline Committee

- Composition: Organization
  - (a) When a student refuses administrative disposition of a violation, the student is entitled to a hearing before the Student Discipline Committee. The hearing request must be made to the VPSD in writing, on or before the sixth (6th) working day after the date of refusal of administrative disposition. The committee shall be composed of equal numbers of students, administrators and faculty of the college. The committee and its chair shall be appointed by the President for each hearing on a rotating basis or on a basis of availability. The committee chair will be selected from the administration or faculty.
  - (b) The chairman of the committee shall rule on the admissibility of evidence, motions, and objections to procedure, but a majority of the committee members may override the chairman's ruling. All members of the committee are expected to attend all meetings and are eligible to vote in the hearing.
  - (c) The chairman shall set the date, time, and place for the hearing and may summon witnesses and require the production of documentary and other evidence.
  - (d) The VPSD shall represent the college before the Student Discipline Committee and present evidence

to support any allegations of violations.

#### (2) Notice

- (a) The committee chairman shall notify the student of the date, time, and place for the hearing by sending the student a letter by certified mail, return receipt requested, addressed to the student at his or her address appearing in the Registrar's Office records. The letter shall specify a hearing date not less than five (5) nor more than (10) working days after date of the letter. If a student is under 18 years of age, a copy of the letter shall be sent to the parents or guardian of the student.
- (b) The chairman may for good cause postpone the hearing so long as all interested parties are notified of the new hearing date, time, and place.
- (c) The notice shall advise the student of the following rights:
  - To a private hearing or a public hearing (as he or she chooses);
  - (ii) To appear alone or with legal counsel if the alleged violation subjects the student to expulsion or suspension. The role of legal counsel is limited as provided in the code;
  - (iii) To have a parent or legal guardian present at the hearing;
  - iv) To know the identity of each witness who will testify;
  - To cause the committee to summon witnesses, and to require the production of documentary and other evidence possessed by the College;
  - (vi) To cross-examine each witness who testifies:
- (d) A student who fails to appear after proper notice and without good cause will be deemed to have pleaded guilty to the violation pending against him. The committee shall impose appropriate penalty and notify the student in the same manner as the notice of hearing.
- (e) Legal counsel who represents a student in a hearing where the alleged violation subjects the student to expulsion or suspension is limited to advising and assisting the student. This limitation means that legal counsel shall not cross-examine witnesses, make objections, testify, or perform other similar functions generally associated with legal representation. The same preceding limitation applies to counsel who represents the college. Student representation by legal counsel is not permitted in a hearing where the alleged violation does not subject the student to expulsion or suspension.

## (3) Preliminary Matters

- (a) Charges arising out of a single transaction or occurrence, against one or more students, may be heard together, or, upon request by one of the studentsin-interest, separate hearings may be held.
- (b) There will be disclosure of all evidence to both sides prior to the hearing.
- (c) At least by 12:00 noon, five (5) full working days before the hearing date, the student concerned shall furnish the committee chairman with:
  - (i) The name of each witness he or she wants summoned and a description of all documentary and other evidence possessed by the college which he or she wants produced.
  - An objection that, if sustained by the chairman of the Student Disciplinary Committee, would prevent the hearing;
  - (iii) The name of the legal counsel, if any, who will appear with the student;
  - (iv) A request for a separate hearing, if any, and the grounds for such a request.

#### (4) Procedure

- (a) The hearing shall be conducted by the chairman who shall provide opportunities for witnesses to be heard. The college will be represented by legal counsel if the student is represented by legal counsel in a hearing where the student is subject to expulsion or suspension.
- (b) If a hearing may result in expulsion or suspension of a student, the college will have a court reporter present to transcribe the proceedings. If a hearing will not result in expulsion or suspension of a student, legal representation is not permitted and recording of the hearing by any means is not permitted unless authorized by law.
- (c) If the hearing is a <u>private hearing</u>, the committee shall proceed generally as follows:
  - Persons present: the complainant, the VPSD and the student with a parent or guardian if desired.
  - Before the hearing begins, the VPSD or the student may request that witnesses remain outside the hearing room.
  - (iii) The VPSD shall read the complaint;
  - (iv) The VPSD shall inform the student of his or her rights, as stated in the notice of hearing;
  - (v) The VPSD shall present the college's case;
  - (vi) The student may present his or her defense;
  - (vii) The VPSD and the student may present rebuttal evidence and argument.
  - (viii) The committee, by majority vote, shall determine the guilt or innocence of the student regarding the alleged violation.
  - (ix) The committee shall state in writing each finding of a violation of a published college regulation or policy. Each committee member concurring in the finding shall sign the statement. The committee may include in the statement its reasons for the finding. The committee shall notify the student in the same manner as the notice of hearing.
  - (x) A determination of guilt shall be followed by a supplemental proceeding in which either party may submit evidence or make statements to the committee concerning the appropriate penalty to be imposed. The past disciplinary record of a student shall not be submitted to the committee prior to the supplemental proceeding. The committee shall determine a penalty by majority vote and shall inform the student, in writing, of its decision as in (ix) above.
- (d) If the hearing is a <u>public hearing</u>, the committee shall proceed generally as follows:
  - (i) Persons present: the complainant, the VPSD and the student with a parent or guardian if desired. Designated college representatives for the following groups may have space reserved if they choose to attend:
    - \* Faculty Association
    - College Newspaper
    - President

Other persons may attend based on the seating available. The Chairman may limit seating accommodations based on the size of the facilities.

- (ii) Before the hearing begins, the VPSD or the student may request that witnesses remain outside the hearing room.
- iii) The VPSD shall read the complaint;
- The VPSD shall inform the student of his or her rights, as stated in the notice of hearing;
- (v) The VPSD shall present the college's case;
- (vi) The student may present his or her defense;
- (vii) The VPSD and the student may present rebuttal evidence and argument;
- (viii) The committee, by majority vote, shall determine the guilt or innocence of the student regarding the alleged violation.
- (ix) The committee shall state in writing each finding of a violation of a published college regulation or policy. Each committee member concurring in the finding shall sign the statement. The committee may include in the statement its reasons for the finding. The committee shall notify the

student in the same manner as the notice of hearing.

A determination of guilt shall be followed by a supplemental proceeding in which either party may submit evidence or make statements to the committee concerning the appropriate penalty to be imposed. The past disciplinary record of a student shall not be submitted to the committee prior to the supplemental proceeding. The committee shall determine a penalty by majority vote and shall inform the student, in writing, of its decision as in (ix) above

#### (5) Evidence

- (a) Legal rules of evidence shall not apply to hearings under this code. Evidence that is commonly accepted by reasonable persons in the conduct of their affairs is admissible. Irrelevant, immaterial, and unduly repetitious evidence may be excluded.
- (b) The committee shall recognize as privileged communications between a student and a member of the professional staff of the Health Center, Counseling or Guidance Center where such communications were made in the course of performance of official duties and when the matters discussed were understood by the staff member and the student to be confidential. Committee members may freely question witnesses.
- (c) The committee shall presume a student innocent of the alleged violation until there is a preponderance of evidence, presented by the VPSD, that the student violated a published college regulation or policy.
- (d) All evidence shall be offered to the committee during the hearing.
- (e) A student defendant may choose not to testify against himself or herself. The committee will make a determination based on the evidence presented.

#### (6) Record

The hearing record shall include: a copy of the notice of hearing; all documentary and other evidence offered or admitted in evidence; written motions, pleas, and other materials considered by the committee; and the committee's decisions.

#### (7) Petition for Administrative Review

- (a) A student is entitled to appeal in writing to the President who may alter, modify, or rescind the finding of the committee and/or the penalty imposed by the committee. A student is ineligible to appeal if the penalty imposed is less than suspension or expulsion. The President shall automatically review every penalty of expulsion. Sanctions will not be imposed white appeal is pending.
- (b) A student is entitled to appeal in writing to the Board of Trustees through the President, the Chancellor, and the Chairman of the Board. An appeal from the Student Discipline Committee is by review of the record (not de novo).
- (c) A petition for review is informal but shall contain, in addition to the information required, the date of the Student Discipline Committee's action and the student's reasons for disagreeing with the committee's action. A student shall file his or her petition with the President on or before the third working day after the day the Discipline committee determines the penalty. If the President rejects the petition, and the student wishes to petition the Chancellor, he or she shall file the petition with the

Chancellor on or before the third working day after the President rejects the petition in writing. If the Chancellor rejects the petition, and the student appellant wishes to petition the Board of Trustees, he or she shall file the petition with the Chairman of the Board on or before the third working day after the day the Chancellor rejects the petition in writing.

- (d) The President, the Chancellor, and the Board of Trustees in their review may take any action that the Student Discipline Committee is authorized to take; however, none may increase the penalty. They may receive written briefs and hear oral argument during their review.
- (e) The President, Chancellor and Board of Trustees shall modify or set aside the finding of violation, penalty, or both, if the substance rights of a student were prejudiced because of the Student Discipline Committee's finding of facts, conclusions or decisions were:
  - in violation of federal or state law or published college regulation or policy;
  - clearly erroneous in view of the reliable evidence and the preponderance of the evidence;
  - capricious, or characterized by abuse of discretion or clearly unwarranted exercise of discretion

## **APPENDIX A - SANCTIONS**

## 1. Authorized Disciplinary.Penalties:

The VPSD or the Student Discipline Committee may impose one or more of the following penalties for violation of a Board policy, College regulation, or administrative rule:

- a. Admonition
- b. Warning probation
- c. Disciplinary probation
- d. Withholding of transcript of degree
- e. Bar against readmission
- f. Restitution
- g. Suspension of rights or privileges
- Suspension of eligibility for official athletic and nonathletic extracurricular activities
- Denial of degree
- Suspension from the college
- k. Expulsion from the college

#### 2. Definitions:

The following definitions apply to the penalties provided above:

- An "Admonition" means a written reprimand from the VPSD to the student on whom it is imposed.
- b. "Warning probation" means further violations may result in suspension. Disciplinary probation may be imposed for any length of time up to one calendar year and the student shall be automatically removed from probation when the imposed period expires.
- c. "Disciplinary probation" means further violations may result in suspension. Disciplinary probation may be imposed for any length of time up to one calendar year and the student shall be automatically removed from probation when the imposed period expires. Students may be placed on disciplinary probation for engaging in activities as illustrated by, but not limited to the following: being intoxicated, misuse of I.D. card, creating a disturbance in or on college premises and gambling.
- d. "Withholding of transcript of degree" may be imposed upon a student who fails to pay a debt owed the college or who has a disciplinary case pending final disposition or who violates the oath of residency. The penalty terminates on payment of the

debt or the final disposition of the case or payment of proper tuition.

- e. "Bar against readmission" may be imposed on a student who has left the College on enforced withdrawal for disciplinary reasons.
- f. "Restitution" means reimbursement for damage to or misappropriation of property. Reimbursement may take the form of appropriate service to repair or otherwise compensate for damages.
- g. "Disciplinary suspension" may be either or both of the following:
  - (1) "Suspension of rights and privileges" is an elastic penalty which may impose limitations or restrictions to fit the particular case:
  - "Suspension of eligibility for official athletic and nonathletic extracurricular activities": prohibits, during the period of suspension, the student on whom it is imposed from joining a registered student organization; taking part in a registered student organization's activities, or attending its meetings or functions; and from participating in an official athletic or nonathletic extracurricular activity. Such suspension may be imposed for any length of time up to one calendar year. Students may be placed on disciplinary suspension for engaging in activities as illustrated by, but not limited to the following: having intoxicating beverages in any college facility, with the exception of specific beverage related courses within the El Centro food service program; destroying property or student's personal property; giving false information in response to requests from the college; instigating a disturbance or not; stealing, possession, use, sale or purchase of illegal drugs on or off campus; any attempt at bodily harm, which includes taking an overdose of pills or any other act where emergency medical attention is required; and conviction of any act which is classified as a misdemeanor or felony under state or federal law."
- "Denial of degree" may be imposed on a student found guilty of scholastic dishonesty and may be imposed for any length of time up to and including permanent denial.
- i. "Suspension from the college" prohibits, during the period of suspension, the student on whom it is imposed from being initiated into an honorary or service organization; from entering the college campus except in response to an official summons; and from registering, either for credit or for noncredit, for scholastic work at or through the college.
- "Expulsion" is permanent severance from the college. This
  policy shall apply uniformly to all the colleges of the Dallas
  County Community College District.

In the event any portion of this policy conflicts with the state law of Texas, the state law shall be followed.

## **APPENDIX B - HAZING**

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- 1. Personal Hazing Offense
  - A person commits an offense if the person;
    - (1) engages in hazing;
    - (2) solicits, encourages, directs, aids, or attempts to aid another person in engaging in hazing;
    - (3) intentionally, knowingly, or recklessly permits hazing to occur; or
    - (4) has firsthand knowledge of the planning of a specific hazing incident involving a student in an educational institution, or firsthand knowledge that a specific hazing incident has occurred, and knowingly fails to report said

knowledge in writing to the VPSD or other appropriate official of the institution.

- b. The offense for failing to report hazing incident is a misdemeanor punishable by a fine not to exceed \$1,000, confinement in county jail for not more than 180 days, or both such fine and confinement.
- c. Any other hazing offense which does not cause serious bodily injury to another is a misdemeanor punishable by a fine of not less than \$500 nor more than \$1,000, confinement in county jail for not less than 90 days nor more than 180 days, or both such fine and confinement.
- d. Any other hazing offense which causes serious bodily injury to another is a misdemeanor punishable by a fine of not less than \$1,000 nor more than \$5,000, confinement in county jail for not less than 180 days nor more than one year, or both such fine and confinement.
- e Any other hazing offense which causes the death of another is a misdemeanor punishable by a fine of not less than \$5,000 nor more than \$10,000, confinement in county jail for not less than one year nor more than two years, or both fine and confinement.

## Organization Hazing Offense

- a. An organization commits an offense if the organization condones or encourages hazing or if an officer or any combination of members, pledges, or alumni of the organization commits or assists in the commission of hazing.
- b. The above offense is a misdemeanor punishable by a fine of not less than \$5,000 nor more than \$10,000. If a court finds that the offense caused personal injury, property damage, or other loss, the court may sentence the organization to pay a fine of not less than \$5,000 nor more than double that amount lost or expenses incurred because of such injury, damage, or loss.

## 3. Consent Not a Defense

It is not a defense to prosecution of a hazing offense that the person against whom the hazing was directed consented to or acquiesced in the hazing activity.

#### 4. Immunity from Prosecution

Any person reporting a specific hazing incident involving a student in an educational institution to the VPSD or other appropriate official of the institution is immune from liability, civil or criminal, that might otherwise be incurred or imposed as a result of the report. A person reporting in bad faith or with malice is not protected.

## 5. Definition

"Hazing" means any intentional, knowing, or reckless act, occurring on or off the campus of an educational institution, by one person alone or acting with others, directed against a student that endangers the mental or physical health or safety of a student for the purpose of pledging, being initiated into, affiliating with, holding office in, or maintaining membership in any organization whose members are or include students at an educational institution. The term includes but is not limited to:

- a. any type of physical brutality, such as whipping, beating, striking, branding, electronic shocking, placing of a harmful substance on the body, or similar activity;
- any type of physical activity, such as sleep deprivation, exposure to the elements, confinement in a small place, calisthenics, or any other activity that subjects the student to an unreasonable risk of harm or that adversely affects the mental or physical health or safety of the student.

- c. any activity involving consumption of a food, liquid, alcoholic beverage, liquor, drug, or any other substance which subjects the student to an unreasonable risk of harm or which adversely affects the mental or physical health or safety of the student.
- d. any activity that intimidates or threatens the student with ostracism, that subjects the student to extreme mental stress, shame, or humiliation, or that adversely affects the mental health or dignity of the student or discourages the student from entering or remaining registered in an educational institution, or that may reasonably be expected to cause a student to leave the organization or the institution rather than submit to acts described in the subsection;
- any activity that induces, causes, or requires the student to perform a duty or task which involves a violation of the Penal Code.

## Student Grievance Procedure

#### 1. Definition

Student grievance is a college-related internal problem or condition which a student believes to be unfair, inequitable, discriminatory, or a hindrance to the educational process. This includes sexual harassment that a student may suffer from another student or employee of the district.

### 2. Scope

This student grievance procedure is not intended to supplant the Student Code of Conduct, which allows the student procedural due process in disciplinary proceedings initiated by the college. This student grievance procedure is designed to provide the student with the opportunity to question conditions which the student believes impede his or her education or instruction. This student grievance procedure is not designed to include changes in policy nor does it apply to grading practices. Recommendations for initiating new policy or changing established policy are handled through normal administrative channels. Problems with grades will be dealt with first by the instructor, then by the division chair, and so forth to the President if necessary.

## 3 .Limitations

The Student Grievance Procedure is not intended to supplant campus administrative procedures that address matters of policy or student grades.

## 4. Procedures

Students who believe that they have a college-related grievance:

- Should discuss it with the college employee most directly responsible for the condition which brought about the alleged grievance.
- b. If discussion does not resolve the matter to the student's satisfaction, the student may appeal to the next level of authority. The student may consult with the Administrative Office to determine the next level of authority.
- c. If an appeal does not resolve the grievance, the student may proceed to the appropriate Vice President with a written presentation of the grievance.
- d. If the Vice Presidential level of appeal does not prove satisfactory to the student, the student may appeal the grievance to an appeal committee.

## 5. Exception To Procedures

#### Sexual Harassment:

All students and employees shall report complaints of sexual harassment to the VPSD or college President. A complaint

includes sexual harassment that a student may suffer from another student or employee, or that an employee may suffer from a student.

### Appeal Committee

## Procedures:

- A student who wishes a grievance to be heard must submit a request in writing to the VPSD.
- The VPSD will convene and chair the Appeal Committee. b.
- The appeal must be heard by the committee within ten (10) class days of the request unless extended with the agreement of both the student and the VPSD.
- The committee will be ad hoc and will consist of two (2) students, two (2) faculty members, and one (1) staff member who is either an administrator a non-contractual employee. It is the responsibility of the President or the President's designee to appoint all committee members.
- The Appeal Committee will make its recommendation directly to the President. The decision of the President shall be final.

#### CAMPUS PARKING AND DRIVING REGULATIONS

#### General Provisions

- Authority for Regulations: The Board of Trustees, for the benefit of its colleges, is authorized by state law (Sec. 51.202, Education Code) to promulgate and enforce rules and regulations for the safety and welfare of students, employees, and property and other rules and regulations it may deem necessary to govern the institution, including rules for the operation and parking of vehicles on the college campuses and any other property under institutional control.
- Authority of Campus Peace Officers: Pursuant to the provisions of Sec. 51.2203, Education Code, campus peace officers are commissioned peace officers of the State of Texas; and as such have full authority to enforce all parking regulations, and other regulations and laws within areas under the control and jurisdiction of the District. In addition, campus peace officers may enforce all traffic laws on public streets and highways which are in proximity to areas under District control. Campus peace officers may issue citations to violators or take other action consistent with the law.

### Permits:

Vehicle: In accordance with Sec. 51.207, Education Code, each college may issue and require use of a suitable vehicle identification decal as permits to park and drive on college property. Permits may be suspended for violations of applicable state law or parking and driving regulations. Each person who is required to have a vehicle identification decal shall apply to the Department of Campus Security for the decal. No fee is charged for the decal which must be placed on the rear window of the driver's side of a motor vehicle and on the gas tank of the motorcycle or motorbike.

Handicap: All authorized decals for handicap parking areas must be displayed prior to parking in such areas.

- Posting of Signs: Under the direction of the college president, the Department of Campus Safety shall post proper traffic and parking signs.
- Applicability of Regulations: The rules and regulations in this Chapter apply to motor vehicles, motorbikes and bicycles on college campuses or other District property, and are enforceable against students, employees of the District and visitors.

- Prohibited Acts: The following acts shall constitute violations of these regulations:
  - Speeding: The operation of a vehicle at a speed greater than is reasonable and prudent under existing conditions. The prima facie maximum reasonable and prudent speed on campus streets is twenty (20) miles per hour, and ten (10) miles per hour in parking areas, unless the street or area is otherwise posted.
  - Double parking, or otherwise parking, standing or stopping so as to impede the flow of traffic.
  - Driving the wrong way on a one-way street or lane. C.
  - Driving on the wrong side of the roadway. d.
  - Improper parking, so that any portion of a vehicle is outside the marked limits of a parking space.
  - f. Parking in unauthorized areas, as illustrated by, but not limited to those areas posted as visitor parking, no parking, handicapped parking or loading zones, designated crosswalks, motorcycle areas, or other unauthorized areas as designated
  - Parking trailers or boats on campus. g.
  - Parking or driving in areas other than those designated for vehicular traffic, as illustrated by, but not limited to courtyards, sidewalks, lawns, or curb areas.
  - i. Failure to display a parking permit.
  - Collision with another vehicle, a person, sign or immovable j. object.
  - Reckless driving. k.
  - Failure to yield the right-of-way to pedestrians in designated 1. crosswalks.
  - Violation of any state law regulating vehicular traffic.
- 3. Tow-away Areas: A vehicle may be towed if parked without authority in the following areas:
  - Handicapped parking. a.
  - Fire lanes. . **b**.
  - Courtyards. C.
  - "No Parking" zones. d.
  - Areas other than those designated for vehicular traffic. €.
  - Other unauthorized areas as designated by sign. f.

## Citations:

- Types: Citations shall be of two types:
  - Campus Citations: A campus citation is a notice that the alleged violator's parking and driving privilege or permit has been suspended pending appeal or disposition.
  - (2) Court Citations: A court citation is a notice of alleged violation of the type used by the Texas Highway Patrol, as authorized by Education Code, Sec. 51.206. Generally, such citations shall be used for violations by visitors, other persons holding no college permit, and employees of the District for excessive violations. However, such citations may be used for the enforcement of any provisions of these regulations.

## b. Disposition

(1) Campus Citation: A campus citation is returnable to the Department of Campus Safety, and a permit or driving privilege may be reinstated by the payment of a five dollar (\$5.00) service charge per citation at the college business office.

- (2) Court Citation: A court citation is returnable to the justice or municipal court in which the case is filed. Disposition of the citation may be made in the same manner as any other criminal case within he jurisdiction of such court.
- Suspension Review: A person receiving a campus citation shall have the right to appeal the suspension of rights by submitting to the college safety committee, within ten (10) days after the date of violation, notice of appeal in writing, which shall state the reasons for such appeal.
- 6. Safety Committee: The safety committee shall consist of not less than three (3) persons appointed by the President, none of whom shall be a campus peace officer. The committee shall meeet as needed, but not less than five (5) business days after receipt of notice of appeal. Notice of such meetings shall be given to an appellant not less than twenty-four (24) hours prior thereto.

#### 7. Penalties

- a. Impoundment: Failure to pay the service charge within ten (10) days after receipt thereof, or, if appealed, within ten (10) days after denial of appeal, shall result in impoundment of the vehicle, denial of readmission to any District college, and withholding of any transcript or degree. If a vehicle is impounded, the owner is liable for any wrecker charges and storage fees in addition to the service charge.
- b Multiple Citations: Receipt of four (4) citations during the period from August 15 of a year to August 14 of the year following will result in suspension of the parking and driving permit or driving privilege for the balance of such year.
- Court Citations: Penalties for convictions in municipal or justice court are as prescribed by state law, not to exceed \$200 per conviction.
- Miscellaneous: The District nor any of its colleges or employees are responsible for damage to or theft of a vehicle or its contents while on the college campus.

## Communicable Disease Policy

The Board acknowledges the serious threat to our community and nation posed by the AIDS epidemic. This policy and other procedures developed by the Chancellor shall emphasize educating employees and students concerning AIDS and managing each case of AIDS individually with sensitivity, flexibility, and concern for the individual as well as employees and students. In addition, this policy defines and addresses other comunicable diseases which from time to time arise in the colleges and District among students and employees.

The District's decisions concerning a person who has a communicable disease shall be based upon current and well-informed medical judgement which includes the nature of the disease, risk of transmission to others, symptoms and special circumstances of the person, and balancing identifiable risks and available alternatives to respond to a student or employee with a communicable disease.

## Discrimination

Students: No student will be required to cease attending a college or participating in college functions solely on the basis of diagnosis of a communicable disease.

Employees: An employee who has a communicable disease will be treated in the same manner as other employees who have other ilnesses or injuries.

#### Confidentiality

The District shall comply with applicable statutes and regulations which protect the privacy of persons who have a communicable disease.

#### Education

The Chancellor shall develop and maintain a comprehensive educational program regarding HIV infection for students and employees.

Each college shall have a Communicable Disease Coordinator. The coordinator shall be a registered nurse who has received training in communicable diseases, particularly HIV infection. A student or employee who has a communicable disease is strongly encouraged to report the disease to the coordinator.

#### Counseling

The Communicable Disease Coordinator shall refer students and employees to sources of testing for HIV infection and counseling upon voluntary request. An individual shall bear the expemses of such testing and counseling.

## DALLAS COUNTY COMMUNITY COLLEGE DISTRICT

## 1990-91 Technical/Occupational Programs Offered On Our Campuses

Career Education Programs			\$ 5 6 6 <b>\$</b> \$ \$				
Accounting Associate	•	•	•	•	•	•	•
Advertising Art	_	T	Γ	T	↾	Γ	Г
Air Conditioning & Refrigeration — Residential		•	•	Τ	Г	•	$\vdash$
Air Conditioning & Refrigeration Technology	-  -	1	•	Τ	一	✝	┪
Apparel Design	- -	╈	<del>                                     </del>	•	H	Н	
Architectural Technology	- -	╅	┢	•	┢	-	H
Associate Degree Nursing	╌	┿	┝	•	┝	┝	Н
LVN Option	-  -	╁	┝	-	┝	Ι-	
Auto Body Technology	-	┿	-	Ŀ	H	H	Н
Automotive Career Technician	- -	╀	ŀ	L	L	<u> </u>	Ц
	-	•	L	_	L.		
Automotive Technology	_ _	•	•	L	L		Ц
Dealership-Sponsored Technician	_ L•	<u> </u>		$\square$			
Electronic Engine Control Technician	•						
Service Technician	•						╗
Aviation Technology	- -	✝	Т		•	ヿ	T
Career Pilot	-  -	-	Ι	H	-	$\vdash$	ᅱ
Air Cargo Transport	-  -	Η,	Η,	Н	-	ᅱ	
Air Traffic Control	-  -	-	Н	Н	-	-	4
	-  -	$\vdash$	L	Ц	•	_	_
Aircraft Dispatcher	-	Ц	Щ	Ц	•	[	$\exists$
Airline Marketing	-	Ц	لــا		•		╝
Fixed Base Operations/Airport Management	L	L		ot	•		
Child Development Associate	•		•		T	$\exists$	٦
Administrative	•	П	•	コ	╗	T	コ
CDA Training Certificate	•	П	╗	7	T	7	┪
Infant-Toddler	•	Н	•	┪	7	┪	┪
Special Child Certificate	•		•	╛	7	┪	╗
Commercial Music		Н	╗	┪	7	7	┪
Arranger/Composer/Copyist	╌├╴		┥	+	+	ᆉ	$\dashv$
Music Retailing	╌├─	•	+	$\dashv$	-	+	4
Performing Musician		-	-	$\dashv$	+	$\dashv$	4
Recording Technology	-	•	-	4	4	4	4
Computes later asian San	.∟	٠	4	_	4	_	_
Computer Information Systems	•	•	•	•	•	•	•
Business Computer Assistant	.	┙	_	•	$\perp$		╛
Business Computer Information Systems	•	•	•	•	•	•	•
Business Computer Programmer	•	•	•	•	•	•	•
Computer Center Specialist	П	П	٦	•	Ţ	Т	7
Computer Operations Technician	П	П	T	•	T	7	٦
Personal Computer Support	П		1	•	•		•
Construction Management & Technology	П	$\exists$	7	T		•	┪
Construction Technology	H	7	7	$\top$	7,	•	┪
Criminal Justice	┢═┪	+	4	•	+	+	4
Diesel Mechanics	$\vdash$	-+	+	+	٠.	+	4
Digital Electronics Technology	H	+	+	+	╂	+	-
Drafting & Computer Aided Design	$\vdash \vdash$		•	4	4	4	4
Flectronic Docion	H	4	•	4	•	4	4
Electronic Design	$\sqcup$	4	•	4	1	1	⅃
Educational Personnel	$\Box$	$\perp$	$\perp$	$\perp$	$\perp$	Ŀ	٠
Bilingual/ESL .		_[	_[		Т	J	1
Educational Assistant	П	T	T	T	T	7.	7
Electrical Technology	$\sqcap$	+	1	+	1	,†	1
Electronic Telecommunications	$\sqcap$	T,	•	1	+-	+-	1
Electronics Technology	H	+	╅	+	:	+	1
Avionics	H	+	+	+	+	+	$\dashv$
Engineering Technology	뉴	4	+	+	+-	4	4
Electro-Mechanical	-	4	4	ļ•	4	ֈ•	4
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Electronic Controls	•	$\perp$		$\perp$	$\perp$	•	
Electronic Quality Control	Ц					•	
Industrial Technology	•	T	T	•	T	Τ	7
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Career Education Programs	•	ď,	Š,	٤,	ا با	ķ	۶,
Manufacturing Engineering	F	•	Т	Ŧ	Т	Т	T•
Mechanical Quality Control	7	T	T	Ŧ	7	T	1.
Mechanical Technology	7	T	1	T	T	1	1.
Quality Control	- -	T	7	7	1	T	•
Robotics & Fluid Power	1	•	1	1	•	,	•
Robotics Technology	1	†	1	Ť	1	1	十
Fashion Marketing	•		7	†	+	†	†
Financial Management	7	T	+	1	1	1	•
Fire Protection Technology	1	十	1	1	,	十	T
Food And Hospitality Service	1	†	†	1	,	†	t
Graphic Communications	<u> </u>	T	1	,	+	t	t
Graphic Arts	┢	十	١.	†	╈	╈	+
Interior Design	╌├╴	╅	+	١,	+	┿	┿
Interpreter Training Program	╌	╁		┿-	+	t	╁
Sign Language Studies	╌├╴	t	+	┰	+	╁	╁
Legal Assistant	╌	╁	╀	٦.	+	┿	╁
Machine Parts Inspection	╌	+	┿	╀	+	┿	╁╌
Machine Shop	⊦	╁	╀	╁	١.	+-	╁
Management Careers	-			١.		+-	╁
Administrative Management	-	+-	+-	┿	┽	-	+
Mid-Management	-	+	+-	4-	4÷	+-	•
Postal Service Administration	F	╀	+	╀	+	╄	•
Sales, Marketing & Retail Management	-	╁	╁	┿	╀	╀	╀╌
Small Business Management	ŀ	+-	╌	╀	+-	╀	╀
Transportation and Logistics Management	├	•	╁	╀	•	┢	•
Medical Laboratory Technology	┢	╁	╀	١.	╁	⊢	┝
Medical Transcription	-	t	十		+	H	╁
Motorcycle Mechanics	$\vdash$	١.	۲	┽	╁	$\vdash$	$\vdash$
Office Technology	-	† <del>-</del>	١.	╁	╁		•
Administrative Assistant	-		+-	+	+-	+−	-
Legal Secretary		•	╆	•	•	•	<del> </del>
General Office Certificate	E	•	٦	ŀ	<del> </del>	•	•
Office Information Systems Specialist	F	•	-	١.	╎	-	-
Ornamental Horticulture Technology	۲	<del>  -</del>	╁	╀	╁	-	•
Greenhouse Florist	┝	├-	╀╴	╁	╁	H	•
Landscape Management	⊢	├-	┝	╀	-	Н	•
Landscape Nursery	┝	┝	⊢	╀	-	Н	•
Florist	┝	┢	┝	┤-	1	Н	-
Landscape Gardener	-		┝	┝	⊢	┝┑	
Outboard Marine Engine Mechanics	┝	-	┢	╁	H	-	Н
Pattern Design	卜	-	-	١.	H		H
Physical Fitness Technology	$\vdash$	-	┝	H			Н
Radiologic Sciences	Н		┢╌	•		Ť	$\exists$
Diagnostic Medical Sonography	H	_	H	•	$\vdash$	$\dashv$	ᅥ
Radiography Technology	H	-	-	•	-	┪	ᅱ
Real Estate	-	•	-	Ť	H	•	
Respiratory Care, Levels I and II	Н	۳	$\vdash$	-	Н	4	⊣
Small Engine Mechanics	Н	•	١.	-	Н	$\dashv$	ᅥ
Social Work Associate	Н	-	_	_	Н	┥	
Human Services	Н	$\dashv$	•		Н	$\dashv$	$\dashv$
Surgical Technology	Н	$\dashv$	•	L	Н	$\dashv$	$\dashv$
Surgical Technology for Graduate R.N.	Н	4	Н	•	Ц	4	4
Veterinary Technology	Н	ᅴ	Н	•	Ц	4	4
Video Technology	Н	•	$\dashv$	Щ	4	4	$\dashv$
Vocational Nursing	$\dashv$	4	4	_		•	ᆛ
Welding Technology		4	4	-	4	$\dashv$	4
Troising reciniology	-		4	4	•	4	4

BHC	- Brookhaven College
CVC	- Cedar Valley College

## **ACCOUNTING ASSOCIATE**

## (Associate Degree)

The Accounting Associate two-year program is designed to prepare a student for a career as a junior accountant in business, industry and government. Emphasis will be placed on internal accounting procedures and generally accepted accounting principles.

The Associate in Applied Arts and Sciences Degree is awarded for successful completion of at least 66 credit hours as outlined below. Students desiring a less comprehensive program that includes some bookkeeping procedures and practices should consider the General Office Certificate. The General Office Certificate is available in the Office Careers Program.

	CREDIT HOURS
SEMESTER!	
ACC 201 Principles of Accounting I	3
BUS 105 Introduction to Business	
ENG 101 Composition I	
MTH 130 Business Mathematics or	
MTH 111 Mathematics for Business and	
Economics	3
OFC 160 Office Calculating Machines	3
•	15
SEMESTER II	
ACC 202 Principles of Accounting II	3
ENG 102 Composition II	3
CIS 103 Introduction to Computer Information	on
Systems	3
MGT 136 Principles of Management	3
OFC 172 Beginning Typing*	3
SC 101 Introduction to Speech	•
Communication	3
	18
SEMESTER III	
ACC 203 Intermediate Accounting I	
ACC 204 Managerial Accounting	
ACC 250 Microcomputer-Based Accounting	
Applications	
ECO 201 Principles of Economics I	
+ Elective	3
ACC 703 Cooperative Work Experience or	
ACC 704 Cooperative Work Experience or	
+ + + Elective	3-4
OCHCOTED N	18-19
SEMESTER IV	
ACC 238 Cost Accounting or	•
ACC 239 Income Tax Accounting	
BUS 234 Business Law	
ECO 202 Principles of Economics II OFC 231 Business Communications	
OFC 251 DUSINESS COMMUNICATIONS	2

Minimum H	Hours Required66
+ Elective-m	ust be selected from the following:
ANT 100 GVT 201 GVT 202 HST 101 HST 102 HD 105 HD 106	Introduction to Anthropology
PSY 101 PSY 103 PSY 131 SOC 101 SOC 102	Introduction to Psychology
+ + Elective-	-must be selected from the following:
ART 104 ENG 201 ENG 202 ENG 203 ENG 204 ENG 205 ENG 206 HUM 101 MUS 104 PHI 101 THE 101 Foreign Lang	Art Appreciation       3         British Literature       3         British Literature       3         World Literature       3         World Literature       3         American Literature       3         American Literature       3         Introduction to the Humanities       3         Music Appreciation       3         Introduction to Philosophy       3         Introduction to the Theatre       3         guage       3
+ + + Electiv	ves-may be selected from the following:
Any CIS of C ACC 205 ACC 207 ACC 238 ACC 239 ACC 703 ACC 704 ACC 713 ACC 714 BUS 143 MGT 237 CIS 262 CIS 265 MKT 206	S Programming Course Business Finance
*Students w	ho can demonstrate proficiency by previous training, e

\*Students who can demonstrate proficiency by previous training, experience, or placement tests may substitute a course from the electives + + + listed for this program.

## **AVIATION TECHNOLOGY**

Because of the varied and interrelated aviation career options available, Mountain View's Aviation Technology Program is designed to allow students to take a group of core courses which includes selected aviation, business, English, mathematics and human relations courses and then proceed with specialized courses in the specific career option they wish to enter.

The Associate of Applied Arts and Sciences degree options are (1) Career Pilot including flight instructor certificate, multi-engine rating, flight engineer and air transport pilot ground school and type-rating for small, multi engine, turbo - jet powered airplane; (2) Air Cargo Transport; (3) Airline Marketing; (4) Fixed Base Operations/Airport Management; (5) Aircraft Dispatcher and (6) Air Traffic Control. A one year certificate program is available in Aircraft Dispatcher.

## AVIATION TECHNOLOGY --CAREER PILOT OPTION

(Associate Degree)

The Career Pilot Option provides students with flight training and ground school through the commercial certificate. All ground school instruction and flight training conform to Part 61 and 141 of the Federal Aviation Administration Regulations. Prior to admission to the program, registration and payment of fees, consultation with and approval by an Aviation Technology instructor is necessary. Simulator fees, flight fees and fees for pre- and post-flight briefing are in addition to the regular tuition charge.

Students completing this option may find employment opportunities as an airline pilot, corporate pilot, flight engineer, flight instructor and other general aviation positions. It is recommended that students in the Career Pilot Option schedule flight training during the summer months in addition to the Spring and Fall semesters to aid in completing the program within a two year period.

ODEDIT

	CREDIT
	HOURS
٦ <u> </u>	
Introduction to Aviation	3
Aviation Law	3
Flight Basic*	2
FAA Regulations, Airspace and Air	•
Traffic Control	3
	17
R II	• • • • • • • • • • • • • • • • • • • •
Ground School Commercial	3
Aero Engines and Systems	3
Flight Private Pilot*	1
· Aero Dynamics	3
Composition I	3
atics Elective	3
•	16
	Introduction to Aviation Ground School Private Aviation Law Flight Basic* FAA Regulations, Airspace and Air Traffic Control Meteorology

SEMESTE	R III	
<b>AVT 221</b>	Advanced Navigation	3
<b>AVT 224</b>	Ground School Instrument .	
AVT 265	Flight Commercial I*	
AVT 266	Flight Commercial II*	3
PSY 131	Applied Psychology and Hum	
	Relations or	
PSY 101	Introduction to Psychology.	
CIS 103	Introduction to Computer Info	rmation
	Systems	3
	Systems	17
SEMESTER	R IV	
AVT 212	Airport Management	3
<b>AVT 267</b>	Flight Commercial III - Instrum	
<b>AVT 268</b>	Flight Commercial IV*	
AVT 250	Flight Instructor Ground Scho	ol or (2)
AV 129	Introduction to Aircraft Electro	
	Systems	3
SC 101	Introduction to Speech Comn	
	• • • • • • • • • • • • • • • • • • • •	14-15
Minimum H	Hours Required	64
+ Mathemati MTH 101	cs Elective-must be selected from the	following:
MTH 111	College Algebra	3
MTH 130	Business Mathematics	
MTH 195	Technical Mathematics I	
*Flight cours regardless of	es are flexible enrollment and may be t f semester.	aken in sequence
transfer to	udents enrolling in this program a four-year institution should cor	sult an advisor
	or regarding transfer requirement	
	these courses to the four-year in	stitution of their
choice.		
ADDITI	Onal oppringation	<b>N</b> .
-	ONAL CERTIFICATIO	
AVAILA	BLE FOR CAREER PI	LOT
OPTION	V	CREDIT
		HOURS
Flight Instru	uctor Certificate	•
AVT 250	Flight Instructor Cround Coho	-1 0
AVT 250	Flight Instructor Ground Scho	
AVT 252	Flight Instructor - Airplane*	2
AVI 252	Instrument Flight Instructor	
AVT 253	Ground School	3
AV 1 200	Flight Instructor - Airplane Instrument*	1
Multi-Engin	e Rating	
AVT 254	Flight Advanced I*	1
Flight Engir		
	Flight Engineer Ground School	J 2'
Air Transpo	ort Pilot	,
	Air Transport Pilot Ground Sch	വറി ദ
	g (small, multi-engine, turbo-jet)	
AVATORE	Type Peting Turbe let Crouns	10-b1 0

\*Flight courses are flexible enrollment and may be taken in sequence regardless of semester.

Type-Rating Turbo-Jet Ground School .3 Flight Advanced II-Jet Type-Rating\* . . . . 1

**AVT 255** 

## AVIATION TECHNOLOGY --AIR CARGO TRANSPORT OPTION

## (Associate Degree)

This option is designed to provide students with an overview of transportation methods and technology associated with the aviation industry. Upon completion of the program, students may be eligible to be employed in positions such as air cargo sales, air freight transportation and cargo loading.

	CREDIT
	HOURS
SEMESTER	1
AVT 110	Introduction to Aviation 3
AVT 121	Ground School Private 3
AVT 122	Aviation Law
C12 TVA	FAA Regulations, Airspace and Air
	Traffic Control
BUS 105	Introduction to Business 3
	15
SEMESTER	<b>!</b>
<b>AVT 226</b>	Meteorology 3
AVT 249	Air Transportation, Traffic and
	Cargo
ACC 201	Principles of Accounting I 3
ENG 101	Composition I 3
+ Elective	<u>3</u>
	15
SEMESTER	
AVT 212	Airport Management
AVT 223	Airline Management 3
MGT 136	Principles of Management 3
PSY 131	Applied Psychology and Human
D0\4.404	Relations or
PSY 101	introduction to Psychology 3
SC 101	Introduction to Speech Communication 3
SEMESTER	
AVT 225	Aviation Marketing
BUS 234	Business Law 3
ACC 202	Principles of Accounting II 3
CIS 103	Introduction to Computer Information
	Systems
ECO 201	Principles of Economics I 3
	15
Minimum H	ours Required 60
+ Electivemu	ust be selected from the following:
MTH 101	College Algebra3
MTH 130	Business Mathematics3
MTH 195	Technical Mathematics I3-



## AVIATION TECHNOLOGY --AIR TRAFFIC CONTROL OPTION

## (Associate Degree)

Mountain View offers a specialized degree program in air traffic control in conjunction with the Southwest Region ARTC. The program provides students with the background and general experience in aviation which may enable them to enter an air traffic control career with the FAA. Career opportunities in air traffic control include positions such as control tower operator, approach control, air route traffic control and flight service station specialist.

Students interested in admission to the air traffic control program must have completed 15 credit hours (Aviation Technology courses recommended) prior to enrollment into the specialized air traffic control courses and must meet FAA eligibility requirements.

	CREDIT
	HOURS
SEMESTER	
AVT 121	Ground School Private3
AVT 135	Flight Basic*2
AVT 137	Flight Private Pilot*1
AVT 210	FAA Regulations, Airspace and Air
	Traffic Control3
<b>AVT 221</b>	Advanced Navigation3
AVT 226	Meteorology
	15
SEMESTER	· ·
AVT 270	Orientation to Air Traffic Control 5
AVT 272	Aircraft Types/Air Traffic Control
	Communications2
AVT 274	Air Traffic Control Computer
	Operations3
<b>AVT 704</b>	Cooperative Work Experience4
	14
SEMESTER	l III
AVT 224	Ground School Instrument3
ENG 101	Composition I
MTH 195	Technical Mathematics I 3
PSY 131	Applied Psychology and Human
	Relations3
SC 101	Introduction to Speech Communication 3
	15
SEMESTER	
AVT 212	Airport Management or
MGT 136	Principles of Management3
AVT 223	Airline Management or
MGT 242	Human Resources Management 3
<b>AVT 714</b>	Cooperative Work Experience4
ENG 102	Composition II
	13



SEMESTER	₹ <b>V</b>	
AVT 804	Cooperative Work Experience	4
Minimum H	lours Required	61

\*Flight courses are flexible enrollment and may be taken in sequence regardless of semester.

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

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## AVIATION TECHNOLOGY --AIRCRAFT DISPATCHER OPTION

(Associate Degree)

The job performed by an aircraft dispatcher is an integral part of the overall flight operations for airlines. An individual in this position works in conjunction with an airline pilot and is responsible for regulation compliance, weather and loading procedures prior to take-off. In the Aircraft Dispatcher Program students may earn a certificate after approximately one year or choose to complete the Associate in Applied Arts and Sciences Degree.

Entry into either program will be in accordance with Federal Aviation Administration regulations and with instructor approval. Upon completion of the courses in the desired program, students may be recommended to apply to take the FAA written examination for aircraft dispatcher.

	CREDIT HOURS
SEMESTER	
AVT 110	Introduction to Aviation 3
AVT 121	Ground School Private 3
AVT 122	Aviation Law 3
AVT 210	FAA Regulations, Airspace and Air
A 1 2 10	Traffic Control 3
AVT 226	Meteorology 3
SEMESTER	
AVT 123	Ground School Commercial 3
AVT 128	Aero Engine and Systems 3
AVT 221	Advanced Navigation 3
CIS 103	Introduction to Computer Information
CI3 103	Systems 3
ENG 101	Composition I 3
LIVA IOI	15
SEMESTER	· · · · · · · · · · · · · · · · · · ·
AVT 224	Ground School Instrument 3
AVT 261	Aircraft Dispatcher 3
MTH 195	Technical Mathematics I 3
PSY 131	Applied Psychology and Human
	Relations 3
SC 101	Introduction to Speech Communication 3
OF MEOTER	
SEMESTER	
AVT 262	Practical Dispatching
AV 129	Systems
BUS 105	Introduction to Business 3
MGT 136	Principles of Management 3
MTH 196	Technical Mathematics II3
	15
Minimum H	lours Required

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

## AVIATION TECHNOLOGY --AIRCRAFT DISPATCHER

(Certificate)

The job performed by an aircraft dispatcher is an integral part of the overall flight operations for airlines. An individual in this position works in conjunction with an airline pilot and is responsible for regulation compliance, weather and loading procedures prior to take-off. In the Aircraft Dispatcher Program students may earn a certificate after approximately one year or choose to complete the Associate in Applied Arts and Sciences Degree.

Entry into either program will be in accordance with Federal Aviation Administration regulations and with instructor approval. Upon completion of the courses in the desired program, students may be recommended to apply to take the FAA written examination for aircraft dispatcher.

HOURS HOURS
Introduction to Aviation3
Ground School Private3
Aviation Law
FAA Regulations, Airspace and Air
Traffic Control3
Meteorology
Aircraft Dispatcher
18
1
Ground School Commercial 3
Aero Engine and Systems
Advanced Navigation3
Ground School Instrument 3
Practical Dispatching
15

Minimum Hours Required ......33



## AVIATION TECHNOLOGY --AIRLINE MARKETING OPTION

(Associate Degree)

The Airline Marketing Option stresses the significance and functions of marketing from the airline viewpoint. Students completing the program may opt to enter a variety of marketing related positions in the areas of customer service, sales and promotion, crew scheduling or entry level management.

		CREDIT
		<b>HOURS</b>
SEMESTER		
AVT 110	Introduction to Aviation	3.
AVT 121	Ground School Private	3
AVT 122	Aviation Law	3
AVT 210	FAA Regulations, Airspace and Air	
	Traffic Control	3
BU\$ 105	Introduction to Business	3
SEMESTER	·	15
AVT 249		
AVI 249	Air Transportation, Traffic and	
ACC 201	Cargo	3
ACC 201	Principles of Accounting I	3
CIS 103	Introduction to Computer Information	n
=110	Systems	3
ENG 101	Composition I	3
+ Elective	· · · · · · · · · · · · · · · · · · ·	
SEMESTER	· MI	15
AVT 212	Airport Management	3
AVT 223	Airline Management	3
ECO 201	Principles of Economics I	2
PSY 131	Applied Pscyhology and Human	•
	Relations or	•
PSY 101	Introduction to Psychology	3
SC 101	Introduction to Speech Communicat	ion 3
051450555	_	15
SEMESTER	· <del></del>	
AVT 225	Aviation Marketing	
+ Elective		
ACC 202	Principles of Accounting II	3
ECO 202	Principles of Economics II	3
+ + Electiv	/e <u>.</u> .	3
Minimum Hours Required 60		
+ Elective must be selected from the following:		
MTH 101	College Algebra	3
MTH 130	Business Mathematics	3
MTH 195	Technical Mathematics I	3
+ + Elective-must be selected from the following:		
MKT 206	Principles of Marketing	
MKT 230	Salesmanship	3 ,
MKT 233 BUS 234	Advertising and Sales Promotion	3
DUG 234	Business Law	3

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

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## AVIATION TECHNOLOGY --FIXED BASE OPERATIONS/AIRPORT MANAGEMENT OPTION

(Associate Degree)

This option provides students with a general administrative overview combining aviation and business courses stressing terminology, management techniques and functions as they apply to the aviation industry. Students completing this program may qualify for support or training positions in airport management, as staff members to operations superintendents or aviation authority boards. Positions as fixed base operators for aircraft dealers may include equipment sales and service and aircraft sales.

		CREDIT HOURS
SEMESTER	31	ПООПО
AVT 110	Introduction to Aviation	3
AVT 121	Ground School Private	3
AVT 122	Aviation Law	3
AVT 210	FAA Regulations, Airspace and Air	
	Traffic Control	3
BUS 105	Introduction to Business	3
	•	15
SEMESTER	t II	,10
AVT 226	Meteorology	3
AVT 249	Air Transportation, Traffic and	•
010	Cargo	
CIS 103	Introduction to Computer Informati	
	Systems	3
ENG 101	Composition I	· · · · -
+ Elective	••••••	
SEMESTER	t III	<sup>-</sup> 15
<b>AVT 223</b>	Airline Management	3
ACC 201	Principles of Accounting I	3
ECO 201	Principles of Economics I	3
PSY 131	Applied Psychology and Human	
	Relations or	
PSY 101	Introduction to Psychology	3
SC 101	Introduction to Speech Communication	
OCMESTER	•	15
SEMESTER AVT 212		_
MGT 153	Airport Management	3
ACC 202	Small Business Management	3
BUS 234	Principles of Accounting II	3
ECO 202	Business Law	3
ECO 202	Principles of Economics II	
	ours Required	15 60
+ Math electiv	e – must be selected from the following:	
MTH 101	College Algebra	3
MTH 195	Technical Mathematics I	3
MTH 130	Business Mathematics	3

# COMPUTER INFORMATION SYSTEMS -- BUSINESS COMPUTER INFORMATION SYSTEMS

(Associate Degree)

This option is designed to develop entry-level skills and knowledge in computer information systems. The option includes several business courses found in university degree programs as well as CIS courses which will prepare students for CIS course work at a university. A touch typing speed of 20 words per minute is suggested for most CIS courses with a lab component. Students are advised to develop this proficiency.

CREDIT

	CREDIT		
	HOURS HOURS		
SEMESTER	<u> </u>		
CIS 103	Introduction to Computer Information		
	Systems		
DUO 405	Introduction to Business or		
BUS 105			
MGT 136	Principles of Management 3		
MTH 111	Mathematics for Business and		
	Economics I		
ENG 101	Composition I		
+ Elective	3		
1 2.000.00	15		
SEMESTER	· <del>-</del>		
CIS 162	COBOL Programming I 4		
MTH 112	Mathematics for Business and		
	Economics II 3		
SC 101	Introduction to Speech Communication 3		
CIS 150	Computer Program Logic and Design . 3		
ACC 201	Principles of Accounting I* 3		
,	16		
SEMESTER	· ·		
	COBOL Programming II 4		
CIS 104	Debuglation of Formation 1		
ECO 201	Principles of Economics I 3		
	Principles of Accounting II 3		
+ + Electiv	'e3		
+ + + Elec	tive3-4		
	16-17		
SEMESTER	IV		
CIS 210	Assembly Language I 4		
FCO 202	Principles of Economics II 3		
	S or Accounting course 3		
	+ + + + Elective		
T T T T C	13-14		
	13-14		
Minimum H	ours Required: 60		
+ Elective-must be selected from the following:			
H\$T 101	History of the United States3		
GVT 201	American Government		
PSY 101	Introduction to Psychology		
SOC 101	Introduction to Sociology3		
+ + Elective-must be selected from the following:			
ENG 102	Composition II		
HUM 101	Introduction to the Humanities		



+ + + Recommended Electives

Any CIS or CS course (including CIS 701, 703, 704, 713 or 714)

Any 200 level accounting course not listed.

++++ Electives-must be selected from the following:

CIS 108	PC Software Applications4
CIS 114	Problem Solving With the Computer
CIS 118	Text Processing Applications
CIS 167	C Programming4
CIS 169	4th Generation Languages
CIS 170	RPG Programming
CIS 172	BASIC Programming
CIS 173	PASCAL Programming for Business3
CIS 218	Spreadsheet Applications

NOTE: Students may obtain credit toward a degree for only one of each of the pairs of courses listed below:

CIS 172 or CS 122 CIS 210 or CS 211

\*ACC 131 and ACC 132 may be substituted for ACC 201.

## COMPUTER INFORMATION SYSTEMS -- BUSINESS COMPUTER PROGRAMMER

(Associate Degree)

This option is intended for the preparation of entry-level computer programmers who will work in an applications setting to support the information processing function. It is designed as a two-year career program to prepare students for direct entry into the work environment. It is intended to provide a sufficient foundation so the graduate with experience and continued learning may advance in career paths appropriate to their own particular interests and abilities. Touch typing speed of 20 words per minute is suggested for most CIS courses with a lab component. Students are advised to develop this proficiency.

	,	CREDIT
SEMESTE	31	HOURS
CIS 103	Introduction to Computer Information	on _
BUS 105	Systems	3
MGT 136		•
MTH 115	Principles of Management	3
ENG 101	Composition I	3
PSY 131	Composition I	3 ,
	Human Relations**	2
	Human Relations**	15
SEMESTER		10
CIS 150	Computer Program Logic and Desig	nn 3
CIS 160	Data Communications	بار ع
<b>CIS 162</b>	COBOL Programming I	J
ACC 201	Principles of Accounting I***	3
SC 101	Introduction to Speech Communica	tion 3
		16
SEMESTER	HI	
CIS 164	COBOL Programming II	4
CIS 205	JCL and Operating Systems	4
ACC 202	Principles of Accounting II	3
+ Elective	***********	3-4
+ + Electi	/e	3
	<del>-</del>	17-18
SEMESTER		
CI\$ 210	Assembly Language I	4
CIS 225	Systems Analysis and Design	4
CIS 258	On-Line Applications or	
CIS 254	Data Base Systems	4
+ + + Elec	tive	3-4
	_	15-16
Minimum H	ours Required	63
+ Electives-m	ust be selected from the following:	
Any CIS or CS	course (including CIS 701, 703, 704, 713 or 71	4).
ACC 204 ACC 238	Managerial Accounting	3
ACC 250	Microcomputer-Based Accounting Applications	



+ + Electives-must be selected from the following:

ENG 102	Composition II
HUM 101	Introduction to the Humanities
PHI 103	Critical Thinking

## + + + Electives-must be selected from the following:

0.0	
CIS 108	PC Software Applications 4
CIS 114	Problem Solving With the Computer 4
CIS 118	Text Processing Applications
CIS 167	C Programming4
CIS 169	4th Generation Languages 4
CIS 170	RPG Programming 3
CIS 172	BASIC Programming 3
CIS 173	PASCAL Programming for Business
CIS.218	Spreadsheet Applications 4
Any 200 level	CIS course3-4

NOTE: Students may obtain credit toward a degree for only one of each of the pairs of courses listed below:

CIS 172 or CS 122 CIS 210 or CS 211

\*MTH 111 or MTH 130 may be substituted.

\*\*PSY 101 may be substituted.

\*\*\*ACC 131 and ACC 132 may be substituted for ACC 201.

# COMPUTER INFORMATION SYSTEMS -- PERSONAL COMPUTER SUPPORT

## (Associate Degree)

This program includes education/training to qualify students to provide support for personal computer users; to troubleshoot software and hardware problems, implementing corrections where possible; to evaluate new software and hardware, matching company standards to product specifics; to install hardware and software, including equipment assembly and diagnostics; and to assist in the development of training courses, providing training for users.

A touch typing speed of 20 words per minute is suggested for most CIS courses with a lab component. Students are advised to develop this proficiency.

	CI	REDIT
		OURS
SEMESTER	31	
CIS 108	PC Software Applications	. 4
BUS 105	Introduction to Business or	
MGT 136	Principles of Management	. 3
ENG 101	Composition I	
MTH 115	College Mathematics I*	. 3
PSY 131	Applied Psychology and Human	. •
	Relations**	3
	Relations**	16
SEMESTER		10
CIS 114	Problem Solving With the Computer	4
CIS 118	Text Processing Applications	
CIS 160	Data Communications	
ACC 201	Principles of Accounting I	
SC 101	Introduction to Speech	. •
	Communication	3
	Communication	16
SEMESTER		
CIS 218	Spreadsheet Applications	4
CIS 221	PC Operating Systems and Utilities	
CIS 223	PC Hardware	
OFC 231	Business Communications	
+ Elective		
		17
SEMESTER	RIV	••
CIS 228	Database Applications	. 4
CIS 239	User Documentation and Training	. 3
CIS 280	Applied Studies	. 3
CIS XXX	Any PC Programming Language	3-4
+ + CIS EI	lective	3-4
	16	-18
Minimum H	lours Required	65
+ Elective to b	be selected from the following:	
ENG 102	Composition II	3
HUM 101	Introduction to Humanities	3
PHI 103	Critical Thinking	3



+ + CIS elective to be selected from any CIS course offered (including CIS 701, 703 and 704).

\*Mathematics 111 or 130 may be substituted.

\*\*PSY 101 may be substituted.

## DRAFTING AND COMPUTER AIDED **DESIGN**

## (Associate Degree)

This program prepares the student for employment in a wide range of industries as a drafter or engineering aide. Information in related fields is provided to enable the student to work effectively with engineers and professional staff. Enrollment in drafting cooperative work experience courses (co-op) provides students with on-the-job experience while in the program.

	•	
		CREDIT
051450755		HOURS
SEMESTER		
DFT 135	Reproduction Processes	
DFT 183	Basic Drafting	4
COM 131	Applied Communications or	•
ENG 101	Composition I	3
MTH 195	Technical Mathematics I or	
MTH 101	College Algebra	3
**Elective		3-4
	·	15-16
SEMESTER	. 11	
DFT 160	Manufacturing Fundamentals	2
DFT 245	Computer Aided Design	3
+ DFT Cou	irse or	
+ + Coop	erative Work Experience	3-4
MTH 196	Technical Mathematics II or	
MTH 102	Plane Trigonometry	3
SC 101	Introduction to Speech	•
	Communication	3
	-	14-15
<b>SEMESTER</b>	HI	
+ DFT Cou	ırse	3
EGR 106	Descriptive Geometry	3
HD 105		
	Relationships or	
PSY 131	Applied Psychology and Human	
	Relations	3
**Elective	or	
+ + Coope	erative Work Experience	3-4
*Elective		
	-	15-16
<b>SEMESTER</b>	IV	
DFT 246	Advanced CAD-Electronic or	
<b>DFT 248</b>	Advanced CAD-Mechanical or	
<b>DFT 249</b>	Advanced CAD-Architectural	3
+ DFT Cou		
	erative Work Experience	3-4
PHY 131	Applied Physics	
<b>GVT 202</b>	American Government or	•
HST 102	History of the United States	3
**Elective		
555		16-18

Minimum Hours Required: . . . . . . . . . 60

+DFT Courses -must be selected from the	following:
---	------------

DFT 136	Geological and Land Drafting3
DFT 184	Advanced Mechanical Drafting
· · · <del>-</del> ·	And the street Death -
DFT 185	Architectural Drafting4
DFT 230	Structural Drafting
DFT 231	Electronic Drafting
DFT 232	Technical Illustration
DFT 234	Advanced Technical Illustration4
DFT 235	Building Equipment (Mechanical and Electrical)3
DFT 236	Pipe Drafting
DFT 246	Advanced CAD-Electronic
DFT 248	Advanced CAD-Mechnical3
DFT 249	Advanced CAD-Architectural
DFT 250	Sheet Metal Design
DFT 252	Advanced Computer Aided Design
DFT 255	Selected Topics in Drafting
+ + Drafting from the fol	g Cooperative Work Experience courses —must be select lowing:

DFT 704	Cooperative Work Experience	
DFT 714	Cooperative Work Experience	
DFT 803	Cooperative Work Experience	
DFT 813	Cooperative Work Experience	
	,	

## \*Elective - must be selected from the following:

Postkonning I

ACC 121

MUU 131	Bookkeeping I
ACC 201	Principles of Accounting I
BUS 105	Introduction to Business
ECO 201	Principles of Economics I
FR 101	Beginning French4
HUM 101	Introduction to the Humanities
MGT 136	Principles of Management
MUS 104	Music Appreciation
PHI 101	Introduction to Philosophy
SPA 101	Beginning Spanish4
THE 101	Introduction to Theatre

## \*\*Electives -must be selected from the following:

BPR 177	Blueprint Reading2
BPR 178	Blueprint Reading2
OFC 176	Keyboarding1
CIS 103	Introduction to Computer Information Systems3
GA 120	Printing Fundamentals3
This elective	may also be selected from Drofting courses as approve

This elective may also be selected from Drafting courses as approved by the Drafting Department.

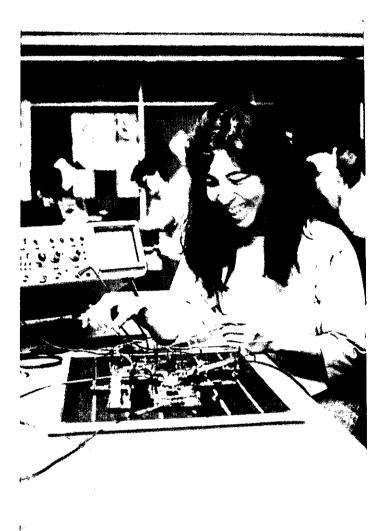
## **ELECTRONICS TECHNOLOGY**

## (Associate Degree)

This program prepares students for work as electronics technicians by familiarizing them with most electronic testing equipment, training them in technical communications and providing them with electronic theory and skills.

CREDIT

		HOURS
SEMESTER	1	ricons
ET 190	DC Circuits and Electrical Measure-	
200	ments or	(4)
ET 135	DC-AC Theory and Circuit Analysis	
COM 131	Applied Communications or	
ENG 101	Composition	3
<b>DFT 182</b>	Technician Drafting or	(2)
DFT 183	Basic Drafting or	(4)
<b>DFT 231</b>	Electronic Drafting	3
MTH 195	Technical Mathematics I or	
MTH 101	College Algebra	3
+ Elective		
		15-19
SEMESTER		
ET 191	AC Circuits	
	(Unless ET 135 Completed)	(4)
ET 193	Active Devices	
ET 194	Instrumentation	3
SC 101	Introduction to Speech	•
1 TI 1 400	Communication	3
MTH 196	Technical Mathematics II or	^
MTH 102	Plane Trigonometry	12.17
SEMESTER		13-17
ET 231	Special Circuits with Communi-	
L1 201	cations Applications	4
ET 232	Analysis of Electronic Logic and	
L1 202	Switching Circuits	4
ET 238	Linear Integrated Circuits	
ET 240	Electronic Theory and Application	• • • • •
	of Digital Computers	4
PHY 131	Applied Physics or	
PHY 117	Concepts in Physics	4
		20
SEMESTER IV		
ET 234	Electronic Circuits & Systems	
ET 237	Modular Memories & Microprocess	
ET 239	Microwave Theory	
+ + Electiv	e <u>.</u> <u>.</u>	7-8 17-18
		17-18
Minimum Us	ours Required:	ee.
winimum <b>H</b> C	zuis nequireu	



## + Electives - must be selected from the following:

GVT 201	American Government3
GVT 202	American Government
HST 101	History of the United States3
HST 102	History of the United States
HD 104	Educational and Career Planning3
HD 105	Basic Processes of Interpersonal Relationships3
PSY 101	Introduction to Psychology
PSY 131	Applied Psychology and Human Relations 3

## + + Electives - must be selected from the following:

ET 210	Basic CRT Display4
ET 268	Microprocessor Troubleshooting and Interface 4
ET 704	Cooperative Work Experience4
EGT 243	Robotics I

## ELECTRONICS TECHNOLOGY — AVIONICS OPTION

## (Associate Degree)

The Associate Degree program in Avionics is an option to the Electronics Technology Program. This option provides the student with an electronics backgound and specialized skills in avionics. In this program a level of knowledge and pratical skills adequate to gain entry level employment in the installation and maintenance of aircraft electronics systems (avionics) is gained by students.

CREDIT
<b>HOURS</b>

SEMESTER	1
ET 135	DC-AC Theory and Circuit Analysis or (6)
ET 190	DC Circuits and Electrical
<b></b> ; <b></b> ;	Measurements4
AV 129	Introduction to Aircraft
	Electrical Systems3
COM 131	Applied Communications or
ENG 101	Composition 1
MTH 195	Technical Mathematics I or
MTH 101	College Algebra3
	13-15
SEMESTER	· - · · ·
ET 191	AC Circuits
	(Unless ET 135 Completed) (4)
ET 193	Active Devices4
AV 235	Operational Testing of Aircraft
	Electronic Systems
SC 101	Introduction to Speech
	Communication3
MTH 196	Technical Mathematics II or
MTH 102	Plane Trigonometry3
PHY 131	
PHY 117	Concepts in Physics 4
	Applied Physics or Concepts in Physics
SEMESTER	
ET 231	Special Circuits with
	Communication Applications 4
ET 232	Analysis of Electronic Logic and
	Switching Circuits4
ET 238	Linear Integrated Circuits or
ET 704	Cooperative Work Experience 4
ET 240	Electronic Theory and Applications
	of Digital Computers 4
+ Elective	<u>3</u>
	19
SEMESTER	
ET 237	Modular Memories and
	Microprocessors 4
ET 239	Microwave Technology3
AV 132	Aircraft Electrical and Electronics
	Systems Installation4
MGT 153	Small Business Management3
	14



Minimum Hours Required	.`
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+ Elective - must be selected from the following:

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## ENGINEERING TECHNOLOGY — INDUSTRIAL TECHNOLOGY OPTION

## (Associate Degree)

The Industrial Technology Option prepares the student for technician level employment with a broad based curriculum involving electronics and computers, mechanical automation equipment, and fluid power devices and systems. Job opportunities exist in all types of manufacturing, equipment repair and maintenance, and research and development of new systems.

		CREDIT HOURS
SEMESTER	l	
DFT 182	Technician Drafting or	(2)
DFT 183	Basic Drafting	
ET 135	DC-AC Theory and Circuit Analysis	or (6)
ET 190	DC Circuits and Electrical	
	Measurements	4
EGT 243	Robotics I	3
MTH 195	Technical Mathematics I or	
MTH 101	College Algebra	3
COM 131	Applied Communications or	
ENG 101	Composition I	3
		17-19
SEMESTER		
EGT 141	Basic Hydraulics and Fluid	
	Mechanics	4
ET 191	AC Circuits	(4)
<del>.</del> .	(If ET 135 is not taken)	• • •
ET 193	Active Devices	4
MTH 196	Technical Mathematics II or	
MTH 102	Plane Trigonometry	3
SC 101	Introduction to Speech Communica	tion 3
		14
SEMESTER	III	
EGT 143	Technical Programming or	
ET 240	Electronic Theory and Application	
	of Digital Computers	4
EGT 230	Digital Machine Control	4
+ Elective		3
+ + Elective	9	7
	_	18
SEMESTER	IV	
QCT 121	Introduction to Quality Control	2
EGR 186	Manufacturing Processes or	(2)
ET 234	Manufacturing Processes or Electronic Circuits and Systems	3
PHY 131	Applied Physics or	
PHY 201	General Physics	
+ + Elective	8	
	_	16-17

Minimum Hours Required ......65



### + Electives - must be selected from the following:

ART 104	Art Appreciation 3	
HD 104	Education and Career Planning 3	
HD 105	Basic Processes of Interpersonal Relationships 3	
HUM 101	Introduction to Humanities	
MUS 104	Music Appreciation	
PHI 101	Introduction to Philosophy3	
PSY 101	Introduction to Psychology3	
PSY 131	Applied Psychology and Human Relations 3	
THE 101	Introduction to Theatre	
+ + Electives must be selected from the following:		

QCT 122 EGT 144	Dimensional Measurement
ET 194	Instrumentation
EGR 187	Manufacturing Processes
EGT 222	Fundamentals of Pneumatics 3
EGT 232	Applied Mechanics4
EGT 228	Amplifiers and Control Circuits or
ET 238	Linear Integrated Circuits4
EGT 239	Principles of Microcomputer Controls or
ET 237	Modular Memories and Microprocessors 4
EGT 242	Digital Control Circuits or
ET 232	Analysis of Electronic Logic and Switching
	Circuits
DFT 245	Computer Aided Design or (3)
MT 248	Computer Aided Design4
EGT 247	Robotics II
EGT 251	Advanced Robotics and Automated Systems 3
EGT 268	Microprocessor Interfacing and Troubleshooting . 4
EGT 270	Computer Integrated Manufacturing 4
EGT 704	Cooperative Work Experience
EG1 /04	Cooperative Front Expendition

## **ENGINEERING TECHNOLOGY — ROBOTICS TECHNOLOGY OPTION**

## (Associate Degree)

The Robotics Technology Option prepares the student for technician level employment in industrial robotics and automated manufacturing systems. The student also receives training in electronics and computers, manufacturing processes, control systems and computer aided design.

		CREDIT HOURS
SEMESTER	1	
DFT 182	Technician Drafting or	(2)
DFT 183	Basic Drafting	4
ET 135	DC-AC Theory and Circuit Analysis	or (6)
ET 190	DC Circuits and Electrical	رد) ا
4	Measurements	4
EGT 243	Robotics I	
MTH 195	Technical Mathematics I or	
MTH 101	College Algebra	2
COM 131	Applied Communications or	
ENG 101		•
ENG IOI	Composition I	47.40
SEMESTER		17-19
EGT 141	Basic Hydraulics and Fluid	
LG1 141		
ET 191	Mechanics	4
E1 191		(4)
ET 193	(If ET 135 is not taken)	
MTH 196	Active Devices  Technical Mathematics II or	4
MTH 196		
	Plane Trigonometry	
SC 101	Introduction to Speech Communication	
SEMESTER	111	14-18
EGT 143	Technical Programming or	
ET 240	Electronic Theory and Application	
L1 240	of Digital Computers	
EGT 230		
+ Elective	Digital Machine Control	
+ + Elective	es <u>.</u> .	/
SEMESTER	IV	18
QCT 121		2
EGR 186	Manufacturing Processes or	(2)
ET 234	Electronic Circuits and Systems	
=	Robotics II	
PHY 131	Applied Physics or	3
PHY 201	General Physics	A
T TEICUIV	es <u>.</u> .	
	,	16-17
Minimum Ho	ours Required	65



## + Electives - must be selected from the following:

ART 104 HD 104 HD 105 HUM 101 MUS 104 PHI 101 PSY 101 PSY 131 THE 101	Art Appreciation
+ + Electives -	-must be selected from the following:
OCT 122 EGT 144 ET 194 EGR 187 EGT 222 EGT 232 EGT 238 ET 238 EGT 239 ET 237 EGT 242	Dimensional Measurement
ET 232  DFT 245  MT 248  EGT 251  EGT 268  EGT 270  EGT 704	Analysis of Electronic Logic and Switching Circuits

# ENGINEERING TECHNOLOGY – ROBOTICS AND FLUID POWER CERTIFICATE

## (Certificate)

This one-year program provides the student with the basic skills needed in the industrial robotics and/or industrial hydraulics and pneumatics industry. All of the courses for the one-year certificate are applicable to the Engineering Technology Associate Degree, Robotics and Fluid Power option.

## CREDIT HOURS

	1100110
SEMESTER	RI
ET 190	DC Circuits and Electrical
	Measurements4
EGR 186	Manufacturing Processes2
EGT 141	Basic Hydraulics and Fluid Mechanics 4
EGT 243	Robotics I
MTH 195	Technical Mathematics I*3
	16
SEMESTER	R
DFT 182	Technician Drafting2
EGT 222	Fundamentals of Pneumatics3
EGT 225	Advanced Fluid Power Systems 4
EGT 247	Robotics II
MTH 196	Technical Mathematics II*
+Technic	al Elective2-4
	17-19
Minimum H	ours Required:33
+Technical E	lectives – must be selected from the following:
EGR 187	Manufacturing Processes2
EGT 144	Instrumentation and Testing4
EGT 143	Technical Programming4
EGT 251	Advanced Robotics and Automated Systems3
*MTH 101 and	MTH 102 may be substituted for MTH 195 and MTH 196.



## **MACHINE SHOP**

## (Associate Degree)

The Machine Shop Program will prepare the student for employment as an entry level machinist in the industry. It will also prepare the student for entry into an apprentice or trainee program for machinist, tool and die-maker, etc. Successful students will find access to supportive type jobs in the metal working field such as planner, programmer, etc.

Enrollment in machine shop courses will be open on the first Monday of October and November in the fall semster and the first Monday of February and March in the spring semester. In each case, such enrollment is subject to completion of specified prerequisite competencies. The program is designed to be self-paced by the student but students can generally plan to spend 18 months of study to complete the entire program.

		CREDIT
SEMESTER		
MS 133	Basic Lathe	5
MS 134	Basic Milling Machine	5
DFT 183	Basic Drafting*	4
MTH 195	Technical Mathematics I	3
		17
SEMESTER	•	
MS 135	Intermediate Lathe	
MS 136	Intermediate Milling Machine	
DFT 184	Advanced Mechanical Drafting*	
MTH 196	Technical Mathematics II	_
QCT 122	Dimensional Measurement	3
		19
SEMESTER		
MS 233	Advanced Lathe	
MS 234	Advanced Milling Machine	5
COM 131	Applied Communications or	
ENG 101	Composition I	3
EGR 186	Manufacturing Processes or	
MS 702	Cooperative Work Experience or	2
+ Elective		(1)
PHY 131	Applied Physics	4
	•	18-19
SEMESTER	IV .	
	Applied Lathe	
MS <sup>-</sup> 236	Applied Milling Machine	5
P\$Y 131	Applied Psychology and Human	
	Relations	
SC 101	Introduction to Speech Communication	tion 3
		16
Minimum Ho	ours Required	70



+ Elective --must be selected from the following:

MS 145 Special Topics .......

\*Students may substitute Blueprint Reading 177 for Drafting 183 and Blueprint Reading 178 for Drafting 184.

## MANAGEMENT CAREERS --ADMINISTRATIVE MANAGEMENT OPTION

## (Associate Degree)

The Administrative Management Option is designed for students seeking a broad program of study in all phases of business practices. This option focuses not only at the core of management (principles of management, organizational behavior, and personnel administration) but also encompasses the critical areas of business operations (principles of marketing, accounting, and business law).

	CREDIT HOURS
SEMESTER	ĺ
MGT 136	Principles of Management 3
BUS 105	Introduction to Business 3
ENG 101	Composition 1
MTH 111	Mathematics for Business and
	Economics I or
MTH 130	Business Mathematics 3
+ Elective	<u>3</u>
	15
SEMESTER	II
MKT 206	Principles of Marketing 3
ACC 201	Principles of Accounting I 3
ENG 102	Composition II 3
CIS 103	Introduction to Computer Information
	Systems
+ + Elective	e315
SEMESTER	
ACC 202	Principles of Accounting II 3
BUS 234	Business Law
EÇO 201	Principles of Economics I 3
PSY 131	Applied Psychology and
20.121	Human Relations
SC 101	Introduction to Speech Communication 3
051450T5D	15
SEMESTER	
MGT 242	Human Resources Management 3
MGT 237	Organizational Behavior 3
ECO 202	Principles of Economics II 3
OFC 231	Business Communications 3
	e 3
+ + + Elec	tive3
	10
Minimum Ho	ours Required:

## + Elective-must be selected from the following:

ART 104	Art Appreciation
HUM 101	Introduction to the Humanities
ENG 201	British Literature
ENG 202	British Literature
ENG 203	World Literature
ENG 204	World Literature
ENG 205	American Literature
ENG 206	American Literature3
MUS 104	Music Appreciation3
PHI 101	Introduction to Philosophy3
THE 101	Introduction to the Theatre
Foreign Lang	guage

## + + Electives-may be selected from the following:

MGT 153	Small Business Management
MGT 171	Introduction to Supervision
MGT 212	Special Problems in Business1
MGT 704	Cooperative Work Experience4
MKT 137	Principles of Retailing
MKT 230	Salesmanship
MKT 233	Advertising and Sales Promotion
OFC 160	Office Calculating Machines
OFC 172	Beginning Typing

## +++Elective-must be selected from the following:

GVT 201	American Government3
GVT 202	American Government3
HST 101	History of the United States3
HST 102	History of the United States3
SOC 101	Introduction to Sociology3
SOC 102	Social Problems
HD 105	Basic Processes of Interpersonal Relationships3
HD 106	Personal and Social Growth
ANT 100	Introduction to Anthropology3
PSY 101	Introduction to Psychology
PSY 103	Human Sexuality

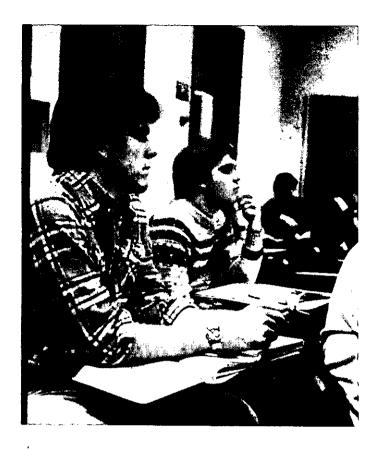
\*Students may substitute ACC 131 and ACC 132 for ACC 201. Only three hours may be applied to the required number of hours for granting the degree.

## MANAGEMENT CAREERS -MID-MANAGEMENT OPTION

## (Associate Degree)

The Mid-Management Program provides an opportunity for students to acquire knowledge in the management field and at the same time update and sharpen personal management skills. In addition to learning about supervision, personnel management, human relations psychology, problem-solving, decision-making, and other related business topics, students also participate in an on-the-job management training course with their present employers. These management training courses at work allow students to apply what is learned in the classroom environment and obtain the valuable practical experience necessary to become competent business managers. The Mid-Management Program allows students the opportunity to bridge the gap between theory and practice as professional managers.

		CREDIT HOURS
SEMESTER		
MGT 136	Principles of Management	3
MGT 171	Introduction to Supervision	3
MGT 704	Cooperative Work Experience	4
BUS 105	Introduction to Business	
ENG 101	Composition I	
SC 101	Introduction to Speech	
	Communication	3
	•	19
SEMESTER		
MGT 242	Human Resources Management .	3
MGT 714	Cooperative Work Experience	4
CIS 103	Introduction to Computer Information	on
	Systems	
MTH 111	Mathematics for Business and	
	Economics I or	
MTH 130	Business Mathematics	
ENG 102	Composition II	3
	_	16
SEMESTER		
MGT 237	Organizational Behavior	
MGT 804	Cooperative Work Experience	4
ACC 201	Principles of Accounting I*	3
ECO 201	Principles of Economics I	3
		13
SEMESTER		
MGT 244	Problem Solving and Decision	
	Making	3
MGT 814	Cooperative Work Experience	
+ Elective		
+ + Electiv	e	
		13
Minimum II-	nome De analus di	
Minimum HC	ours Required:	61



## + Elective-must be selected from the following:

ART 104	Art Appreciation
HUM 101	Introduction to the Humanities
ENG 201	British Literature
ENG 202	British Literature
ENG 203	World Literature
ENG 204	World Literature
ENG 205	American Literature
ENG 206	American Literature3
MUS 104	Music Appreciation
PHI 101	Introduction to Philosophy
THE 101	Introduction to the Theatre
Foreign Langu	

#### + + Elective-must be selected from the following:

ANT 100	Introduction to Anthropology
AST 101	Descriptive Astronomy
BIO 115	Biological Science 4
CHM 115	Chemical Science4
GEO 101	Physical Geology
GVT 201	American Government
HST 101	History of the United States
HD 105	Basic Processes of Interpersonal
	Relationships3
PSC 118	Physical Science 4
PHY 117 *	Concepts in Physics4
PSY 101	Introduction to Psychology
SOC 101	Introduction to Sociology

\*Students may substitute ACC 131 and ACC 132 for ACC 201. Only three hours may be applied to the required number of hours for granting the degree.

## MANAGEMENT CAREERS -- SMALL BUSINESS MANAGEMENT OPTION

## (Associate Degree)

The Small Business Management Option is designed for students who plan to become owners or managers of a small business. The practical aspects of planning, locating resources, financing, starting, and operating a business are emphasized. Owners and managers of small businesses may also benefit from the program.

	CREDIT HOURS	
SEMESTER		
MGT 136	Principles of Management 3	
MGT 153	Small Business Management 3	
BUS 105	Introduction to Business 3	
BU\$ 143	Personal Finance 3	
ENG 101	Composition I	
MTH 111	Mathematics for Business and Economics I or	
MTH 130	Business Mathematics 3	
SEMESTER	II .	
MKT 206	Principles of Marketing 3	
ACC 201	Principles of Accounting 1 3	
CIS 103	Introduction to Computer Information	
	Systems	
SC 101	Introduction to Speech Communication	
+ + Electiv	9	
	tive3-4	
	18-19	
SEMESTER	111	
MGT 211	Small Business Operations 3	
MGT 237	Organizational Behavior 3	
ECO 201	Principles of Economics I 3	
ACC 202	Principles of Accounting II 3	
+ Elective	<u>3</u> 15	
SEMESTER		
MGT 210	Small Business Capitalization,	
	Acquisition and Finance or	
ACC 205	Business Finance 3	
BUS 234	Business Law 3	
ECO 202	Principles of Economics II 3	
+ Electives		
Minimum Hours Required		
+ Three electives	res must be selected from the following Management-re-	

Managerial Accounting ......3

Cost Accounting ......3

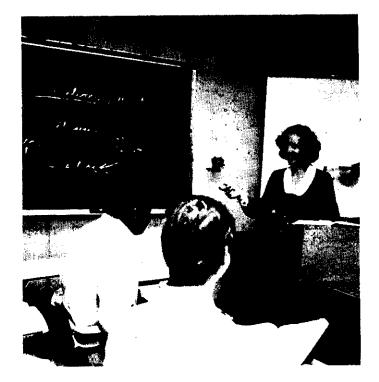
Letters of Credit ......2

ACC 204

ACC 238

ACC 239

FM 117



Special Problems in Business ................................1

Human Resource Management ...................................3

International Marketing Management ..........3

MG1 2/6	Intelligues warketing wanagement
MGT 277	Comparative Management
MKT 137	Principles of Retailing3
MKT 230	Salesmanship
MKT 233	Advertising and Sales Promotion3
MKT 245	Sales Management3
MKT 246	Marketing and Management Cases
OFC 160	Office Machines
OFC 172	Beginning Typing3
OFC 231	Business Communications
TRT 243	Export/Import Practices
+ + Elective	-must be selected from the following:
ART 104	Art Appreciation
HUM 101	Introduction to the Humanities
MUS 104	Music Appreciation3
PHI 101	Introduction to Philosophy3
THE 101	Introduction to the Theatre3
Foreign Lang	guage
+ + + Electiv	ves -must be selected from the following:
ANT 100	Introduction to Anthropology3
GVT 201	American Government3
GVT 202	American Government3
HST 101	History of the United States
HST 102	History of the United States3
HD 105	Basic Processes of Interpersonal
	Relationships
HD 106	Personal and Social Growth
PSY 101	Introduction to Psychology
PSY 103	Human Sexuality
SOC 101	Introduction to Sociology3
SOC 102	Social Problems

**MGT 160** 

MGT 171

**MGT 212** 

MGT 242

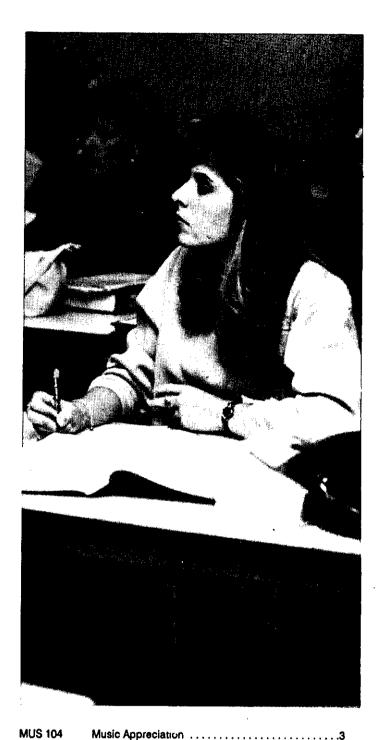
MGT 275 MGT 276

# MANAGEMENT CAREERS -POSTAL SERVICE ADMINISTRATION OPTION

## (Associate Degree)

The Postal Service Administration curriculum is designed as a two-year program that leads to an Associate Degree in Applied Arts and Sciences. The program aids the student in developing postal skills and provides the student with an insight into multi-level functions employed throughout the postal service system. Emphasis is directed to the areas of methodology, technology, management, and leadership concepts reflected in modern day technology as applied to public service related agencies.

		CREDIT
		<b>HOURS</b>
SEMESTER		
PSA 110	Introduction to Postal Service	
ENG 101	Composition I	3
SC 101	Introduction to Speech Communica	
MTH 111	Mathematics for Business and	
	Economics or	
MTH 130	Business Mathematics	3
MGT. 136	Principles of Management	3
		15
SEMESTER		
PSA 122	Customer Service	
ENG 102	Composition II	3
PSY 101	Introduction to Psychology	3 🗸
MGT 171	Introduction to Supervision	3
+ Elective	introduction to Supervision	3
-OFMEATED		15
-SEMESTER	• 1	•
PSA 120	Mail Processing	
CIS 103	Introduction to Computer Informatio	
140T aa-	Systems	3
MGT 237	Organizational Behavior	3
SOC 101	introduction to Sociology	3
MKT 206	Principles of Marketing or	
MKT 233	Advertising and Sales Promotion	3
SEMESTER		15
PSA 216		_
		3
MGT 242	Human Resources Management	3
GVT 201	American Government	3
+ + Electiv	e <u>.</u> .	6
	·	15
Minimum Ho	ours Required	60
The state of the s		😡
•	·	
+ Elective-mus	st be selected from the following:	4
ART 104	Art Appreciation	3
Foreign Langua	age	3.
HUM 101	Introduction to the Humanities	3



THE 101	Introduction to the Theatre
+ + Elective	es-must be selected from the following:
ACC 201	Principles of Accounting I
BUS 234	Business Law
CIS 218	Spreadsheet Applications
ECO 201	Principles of Economics I
GVT 202	American Government
HD 105	Basic Processes of Interpersonal
1.07.454	Relationships3
HST 101	History of the United States3
HST 102	History of the United States3

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

PHI 101

## OFFICE TECHNOLOGY

## (Associate)

The Office Technology freshman student is provided a core study related to working in an office environment. After completing this core, the sophomore student will begin the specialized program tracks of Administrative Assistant or Legal Secretary.

CREDIT HOURS

## CORE CURRICULUM

(For all first year students in Office Careers)

SEMESTER	1
ENG 101	Composition I
MTH 130	Business Mathematics 3
CIS 103	Introduction to Computer
010 100	Information Systems 3
OFC 160	Office Calculating Machines 3
OFC 172	Beginning Typing* 3
BUS 105	Introduction to Business 3
200 .00	18
SEMESTER	II
ENG 102	Composition II 3
OFC 150	Automated Filing Procedures 3
OFC 162	Office Procedures 3
OFC 173	Intermediate Typing* 3
ACC 131	Bookkeeping I or
ACC 201	Principles of Accounting 3
OFC 179	Office Information Systems
OFC 179	Concepts**#
OFC 182	Introduction to Word
0, 0 .0.	Processing**# 1
	18
	10
Minimum H	ours Required

\* Students may be placed in typing courses based on proficiency level determined by previous training, experience and/or placement tests. If a student places out, any OFC course may be taken to supplement the minimum hours required.

\*\*NOTE: OFC 145 equivalent to 143 and 144

OFC 190 equivalent to 179, 182 and 185

#Richland students must take OFC 190.

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

## OFFICE TECHNOLOGY --ADMINISTRATIVE ASSISTANT OPTION

## (Associate Degree)

The primary objective of the Administrative Assistant Option to the Office Technology program is to prepare students for positions as assistants to administrators within public or private firms and agencies. Emphasis in this program is on the development of organizational and management skills in addition to basic office skills.

	CREDIT	
	HOURS	
SEMESTER	S I and II	,
Core Currio	culum <u></u> 36	
	36	
SEMESTER	III	
OFC 231	Business Communications3	
SC 101	Introduction to Speech Communication 3	
PSY 131	Applied Psychology and Human	
	Relations or	
HD 105	Basic Processes of Interpersonal	
	Relationships3	
OFC 185	Basic Machine Transcription**	
OFC 282	Word Processing Applications1	
OFC 273	Advanced Typing Applications*2	
OFC 159	Reginning Shorthand or	
OFC 103	Speedwriting4	
	17	•
SEMESTER		
HUM 101	Introduction to the Humanities3	
OFC 283	Specialized Software I	
MGT 136	Principles of Management or	
MGT 237	Organizational Behavior	
OFC 166	Intermediate Shorthand or	
OFC 106	Speedwriting Dictation and	
	Transcription	
OFC 703	Cooperative Work Experience or	
OFC 704	Cooperative Work Experience 3-4	_
	14-15	
Minimum H	ours Required:67	

\*Students may be placed in typing courses based on proficiency level determined by previous training, experience and/or placement tests. If a student places out, any OFC course may be taken to supplement the minimum hours required.

\*\*NOTE: OFC 190 Equivalent to 179, 182 and 185

## OFFICE TECHNOLOGY --LEGAL SECRETARY OPTION

## (Associate Degree)

The primary objective of this option is to prepare students to become competent legal secretaries, capable of performing office and clerical duties within public and private firms and agencies. Students enrolled in the program will have an opportunity to secure intensive training in basic skills. An Associate in Applied Arts and Sciences Degree is awarded for successful completion.

	CREDIT
SEMESTER	HOURS HOURS
Core Currici	ulum <u> 36</u>
	36
SEMESTER	III
OFC 231	Business Communications 3
SC 101	Introduction to Speech Communication 3
PSY 131	Applied Psychology and Human
	Relations or
HD 105	Basic Processes of Interpersonal
	Relationships 3
OFC 185	Basic Machine Transcription** 1
OFC 282	Word Processing Applications 1
OFC 273	Advanced Typing Applications* 2
HUM 101	Introduction to the Humanities 3
TIOW TOT	
SEMESTER	16
<b>44</b>	• •
BUS 234	Business Law 3
OFC 167	Legal Terminology and Transcription 3
OFC 274	Legal Secretarial Procedures 3
OFC 285	Applied Machine Transcription 1
OFC 703	Cooperative Work Experience or (3)
OFC 704	Cooperative Work Experience 4
	13-14

\*Students may be placed in typing courses based on proficiency level determined by previous training, experience, and/or placement tests. If a student places out, any OFC course may be taken to supplement the minimum hours required.

Minimum Hours Required: . . . . . . . . . . . . . . . 65

\*\*NOTE: OFC 190 Equivalent to 179, 182 and 185

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

## OFFICE TECHNOLOGY -- GENERAL OFFICE

## (Certificate)

The General Office Certificate Program with a clerical emphasis is designed to provide the student with a basic working knowledge of office procedures.

	••	CREDIT		
SEMESTER	11			
<b>ENG 101</b>	Composition I	3		
MTH 130	Business Mathematics			
OFC 160	Office Calculating Machines			
OFC 172	Beginning Typing*	3		
<b>BUS 105</b>	Introduction to Business	3		
CIS 103	Introduction to Computer			
	Information Systems	3		
		18		
SEMESTER	I <b>II</b>			
OFC 162	Office Procedures	3		
OFC 173	Intermediate Typing*	3		
OFC 190	Principles of Word Processing**			
OFC 231	Business Communications			
ACC 131	Bookkeeping I or			
ACC 201	Principles of Accounting	3		
		16		
Minimum H	ours Required:	Minimum Hours Required:34		

\*Students may be placed in typing courses based on proficiency level determined by previous training, experience and/or placement tests. If students place out, any OFC course may be taken to supplement the minimum hours required.

\*\*NOTE: OFC 190 equivalent to 179, 182 and 185



## OFFICE TECHNOLOGY --OFFICE INFORMATION SYSTEMS SPECIALIST

## (Associate Degree)

This program introduces the skills for operators, supervisors, and managers in automated office environments. Office Information Systems involves the use of automated equipment and techniques that include speed gathering, processing, storing, and distributing printed materials.

This program develops the skills to work with a group of principals as a part of a team under the direction of an administrative support supervisor/information systems manager. The specialist handles transcription and manipulation of data using a variety of software applications and provides special secretarial services.

## **CREDIT** HOURS

SEMESTER I		
ENG 101	Composition I	
MTH 130	Business Mathematics 3	
OFC 160	Office Calculating Machines** 3	
OFC 173	Intermediate Typing* 3	
OFC 179	Office Information Systems	
	Concepts**# 2	
OFC 182	Introduction to Word	
	Processing***# 1	
	15	
<b>SEMESTER</b>	II	
ENG 102	Composition II 3	
OFC 162	Office Procedures 3	
OFC 185	Basic Machine Transcription**# 1	
OFC 273	Advanced Typing Applications* 2	
OFC 282	Word Processing Applications*** 1	
CIS 103	Introduction to Computer Information	
ACC 131	Systems	
ACC 131	Bookkeeping I or	
ACC 201	Principles of Accounting 3	
SEMESTER III		
SC 101	Introduction to Speech Communication 3	
PSY 131	Applied Psychology and Human	
	Relations or	
HD 105	Basic Processes of Interpersonal	
	Relationships 3	
OFC 150	Automated Filing Procedures 3	
OFC 231	Business Communications 3	
OFC 283	Specialized Software I*** or	
OFC 284	Specialized Software II*** 1	
OFC 285	Applied Machine Transcription 1	
+ Elective		



SEMESTER	V
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BUS 237	Organizational Benavior or	
MGT 136	Principles of Management	3
OFC 703	Cooperative Work Experience or	
OFC 704	Cooperative Work Experience or	
Elective(s)		3-4
+ Electives	**********	3
+ + Elective	es	3
	•	12-13

## + Electives-must be selected from the following:

OFC 182	Introduction to Word Processing***1
OFC 282	Word Processing Applications***
OFC 283	Specialized Software I or
OFC 284	Specialized Software II***1
+ + Elective	smust be selected from the following:

Minimum Hours Required: ......60

BUS 105	Introduction to Business
BUS 234	Business Law
MGT 136	Principles of Management

\*Students may be placed in typing courses based on proficiency level determined by previous training, experience, and/or placement tests.

\*\*Note: OFC 145 equivalent to 143 and 144

OFC 190 Equivalent to 179, 182 and 185

\*\*\*Must be repeated for credit two additional times using different emphasis/equipment/software.

#Richland students must take OFC 190.

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

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## **WELDING TECHNOLOGY**

## (Associate Degree)

The Welding Technology Program is designed to prepare the student in the basic processes of oxyacetylene and arc welding plus many specialized welding applications as options to fit the specific needs of the student. In addition, instruction is offered in related support areas such as metallurgy, tooling, drafting, pattern layout and characteristics of materials. Thus, the program offers preparation for both entry level jobs as well as welding inspectors.

The student will be required to purchase a basic set of tools which will be used in class and later on the job. Tool lists will be given out by the instructor during the first week of classes.

		CREDIT		
SEMESTER		1100110		
WE 111	Oxyfuel I	2		
WE 112	Oxyfuel II	2		
WE 113	Shielded Metal Arc Welding I	2		
WE 114	Shielded Metal Arc Welding II	2		
DFT 182	Technician Drafting	2		
MTH 195	Technical Mathematics I	3		
COM 131	Applied Communications or			
ENG 101	Composition 1	3		
		16		
SEMESTER				
WE 115	Shielded Metal Arc Welding II	4		
WE 117	General Metal Lavout	3		
WE 118	Welding Inspection and Quality			
	Control	4		
PSY 131	Applied Psychology and			
	Human Relations	3		
WE 704		(4)		
+ Elective	***********	3		
SC 101	Introduction to Speech Communicat	ion 3		
	_	17-18		
SEMESTER	***			
WE 211	Gas Tungsten Arc Welding I	2		
WE 212	Gas Tungsten Arc Welding II	2		
WE 214	Gas Metal Arc Welding I	2		
WE 215	Gas Metal Arc Welding II	2		
WE 217	Basic Welding Metallurgy	3		
PHY 131	Applied Physics	4		
		15		
SEMESTER	<del></del>			
WE 116	Shielded Metal Arch Welding IV	4		
WE 213	Gas Tungsten Arc Weiding III	4		
WE 216	Gas Metal Arc Welding III	4		
WE 219	Welding Design	3		
+ + Elective	+ + Elective			
		18		
Minimum Hours Required:65				

+ Electives—	must be selected from the following:
WE 218	Applied Welding Metallurgy3
WE 221	Special Welding Applications 1
WE 222	Special Welding Applications 2
WE 223	Special Welding Applications
MTH 111	Mathematics for Business and Economics I 3
+ + Electives	-must be selected from the following:
ACC 131	Bookkeeping ! 3
BUS 105	Introduction to Business
CIS 103	Introduction to Computer Information Systems 3
GVT 201	American Government
HST 101	History of the United States
HD 105	Basic Processes of Interpersonal Relationships 3
HD 106	Personal and Social Growth
HUM 101	Introduction to the Humanities
MGT 136	Principles of Management
MGT 153	Small Business Management

NOTE: Students enrolling in this program who plan to transfer to a four-year institution should consult an advisor or counselor regarding transfer requirements and the transferability of these courses to the four-year institution of their choice.

## WELDING TECHNOLOGY

(Certificate)

		CREDIT
		HOURS
SEMESTER	l	
WE 111	Oxyfuel I	2
WE 112	Oxyfuel II	
WE 113	Shielded Metal Arc Welding I	
WE 114	Shielded Metal Arc Welding II	
WE 211	Gas Tungsten Arc Welding I	
WE 212	Gas Tungsten Arc Welding II	
WE 214	Gas Metal Arc Welding I	2
WE 215	Gas Metal Arc Welding II	2
	_	16
<b>SEMESTER</b>	II .	
WE 115	Shielded Metal Arc Welding III	4
WE 116	Shielded Metal Arc Welding IV	
WE 117	General Metal Layout	3
WE 213	Gas Tungsten Arc Weiding III*	4
WE 216	Gas Metal Arc Welding III*	4
		19
Minimum Ho	ours Reqired:	35

\*WE 704 Cooperative Work Experience may be substituted for WE 213 or WE 216.

## **ACCOUNTING**

## (ACC) 131 Bookkeeping I (3)

The fundamental principles of double-entry bookkeeping are presented and applied to practical business situations. Emphasis is on financial statements, trial balances, work sheets, special journals, and adjusting and closing entries. A practice set covering the entire business cycle is completed. (3 Lec.)

## (ACC) 132 Bookkeeping II (3)

Prerequisite: Accounting 131. This course covers accruals, bad debts, taxes, depreciation, controlling accounts, and business vouchers. Bookkeeping for partnerships and corporations is introduced. (3 Lec.)

## (ACC) 201 Principles Of Accounting i (3)

This course covers the theory and practice of measuring and interpreting financial data for business units. Topics include the operating cycle, the preparation of financial statements, depreciation, inventory valuation, and credit losses. (This course is offered on campus and may be offered via television.) (3 Lec.)

## (ACC) 202 Principles Of Accounting II (3)

Prerequisite: Accounting 201. Accounting procedures and practices for partnerships and corporations are studied. Topics include cost data and budget controls. Financial reports are analyzed for use by creditors, investors, and management. (3 Lec.)

## (ACC) 203 Intermediate Accounting I (3)

Prerequisite: Accounting 202. This course is an intensive study of the concepts, principles, and practice of modern financial accounting. Included are the purposes and procedures underlying financial statements. (3 Lec.)

## (ACC) 204 Managerial Accounting (3)

Prerequisite: Accounting 202. This course is a study of accounting practices and procedures used to provide information for business management. Emphasis is on the preparation and internal use of financial statements and budgets. Systems, information, and procedures used in management planning and control are also covered. (3 Lec.)

## (ACC) 205 Business Finance (3)

Prerequisites: Economics 201 or 202 and Accounting 201. This course focuses on the financial structure in the free enterprise system. Topics include interest rates, value analysis, the financing of business firms and government, and security markets. Financial requirements for decision-making and capital formation are analyzed. (3 Lec.)

## (ACC) 207 Intermediate Accounting II (3)

This course continues Accounting 203. Principles and problems in fixed liabilities and capital stock are examined. Equities, business combinations, and the analysis and interpretation of supplementary statements are also included. (3 Lec.)

## (ACC) 238 Cost Accounting (3)

Prerequisite: Accounting 202. The theory and practice of accounting for a manufacturing concern are presented. The measurement and control of material, labor, and factory overhead are studied. Budgets, variance analysis, standard costs, and joint and by-product costing are also included. (3 Lec.)

## (ACC) 239 Income Tax Accounting (3)

Prerequisite: Accounting 202 or demonstrated competence approved by the instructor. This course examines basic income tax laws which apply to individuals and sole proprietorships. Topics include personal exemptions, gross income, business expenses, non-business deductions, capital gains and losses. Emphasis is on common problems. (3 Lec.)

## (ACC) 250 Microcomputer-Based Accounting Applications (3)

Prerequisites: Accounting 202 and Computer Information Systems 103. This course is designed to provide students with an overview of microcomputer-based accounting systems for small businesses. Actual "hands-on" experience will be provided utilizing systems for general ledger, accounts receivable, accounts payable, and payroll. Additional study may be devoted to financial planning and budgeting applications using electronic worksheet programs. Laboratory fee. (2 Lec., 2 Lab.)

## (ACC) 703 Cooperative Work Experience (3)

Prerequisites: Completion of Accounting 201 and 202 or instructor approval. This course combines work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Each student must complete three objectives and work a minimum of 15 hours per week for a total of three credit hours. Seminar topics include an orientation session, setting and writing job objectives, career planning, interpersonal skills, and an exit session. (1 Lec., 15 Lab.)

## (ACC) 704 Cooperative Work Experience (4)

Prerequisites: Completion of Accounting 201 and 202 or instructor approval. This course combines work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Each student must complete four objectives and work a minimum of 20 hours per week for a total of four credit hours. Seminar topics include an orientation session, setting and writing job objectives, career planning, interpersonal skills, and an exit session. (1 Lec., 20 Lab.)

## (ACC) 713 Cooperative Work Experience (3)

Prerequisite: Completion of Accounting 703 or 704. This course combines work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Each student must complete three new objectives and work a minimum of 15 hours per week for a total of three credit hours. Seminar topics include an orientation session, setting and writing job objectives, and additional independent study of business topics. The independent study topics in this course must be different from those included in the previous cooperative education course. (1 Lec., 15 Lab.)

## (ACC) 714 Cooperative Work Experience (4)

Prerequisite: Completion of Accounting 703 or 704. This course combines work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Each student must complete four new objectives and work a minimum of 20 hours per week for a total of four credit hours. Seminar topics include an orientation session, setting and writing job objectives, and additional independent study of business topics. The independent study topics in this course must be different from those included in the previous cooperative education course. (1 Lec., 20 Lab.)

## **ANTHROPOLOGY**

## (ANT) 100 Introduction To Anthropology (3)

This course surveys the origin of mankind involving the processes of physical and cultural evolution, ancient man, and preliterate man. Attention is centered on fossil evidence, physiology and family/group roles and status. (3 Lec.)

## (ANT) 101 Cultural Anthropology (3)

Cultures of the world are surveyed, and emphasis is given to those of North America. Included are the concepts of culture, social and political organization, language, religion and magic, and elementary anthropological theory. (This course is offered on campus and may be offered via television.) (3 Lec.)

## (ANT) 110 The Heritage Of Mexico (3)

This course (cross-listed as History 110) is taught in two parts each semester. The first part of the course deals with the archeology of Mexico beginning with the first humans to enter the North American continent and culminating with the arrival of the Spanish in 1519 A.D. Emphasis is on archaic cultures, the Maya, the Toltec, and Aztec empires. The second part of the course deals with Mexican history and modern relations between the United States and Mexico. The student may register for either History 110 or Anthropology 110 but may receive credit for only one of the two. (3 Lec.)

## **ART**

## (ART) 104 Art Appreciation (3)

Films, lectures, slides, and discussions focus on the theoretical, cultural, and historical aspects of the visual arts. Emphasis is on the development of visual and aesthetic awareness. (3 Lec.)

## (ART) 105 Survey Of Art History (3)

This course covers the history of art from prehistoric time through the Renaissance. It explores the cultural, geophysical, and personal influences on art styles. (3 Lec.)

## (ART) 106 Survey Of Art History (3)

This course covers the history of art from the Baroque period through the present. It explores the cultural, geophysical, and personal influences on art styles. (3 Lec.)

## (ART) 110 Design I (3)

Basic concepts of design with two-dimensional materials are explored. The use of line, color, illusion of space or mass, texture, value, shape, and size in composition is considered. (2 Lec., 4 Lab.)

## (ART) 111 Design II (3)

Basic concepts of design with three-dimensional materials are explored. The use of mass, space, movement, and texture is considered. Laboratory fee. (2 Lec., 4 Lab.)

## (ART) 114 Drawing I (3)

This beginning course investigates various media, techniques, and subjects. It explores perceptual and descriptive possibilities and considers drawing as a developmental process as well as an end in itself. (2 Lec., 4 Lab.)

## (ART) 115 Drawing II (3)

Prerequisite: Art 114. This course is an expansion of Art 114. It stresses the expressive and conceptual aspects of drawing, including advanced compositional arrangements, a range of wet and dry media, and the development of an individual approach to theme and content. (2 Lec., 4 Lab.)

## (ART) 116 Jewelry Design And Construction (3)

This course explores the uses of metal in design, basic fabrication techniques in metal, bezel setting of stones, and simple casting. Emphasis is on original design. Laboratory fee. (2 Lec., 4 Lab.)

## (ART) 117 Advanced Jewelry Design And Construction (3)

Prerequisite: Art 116. This course continues Art 116. Advanced fabrication, lost wax casting, setting of faceted stones, and forging and shaping of metal, including repousse and chasing are presented. Emphasis is on original design. Laboratory fee. (2 Lec., 4 Lab.)



#### (ART) 199 Problems In Contemporary Art (1)

Area artists, critics, and art educators speak with students about the work exhibited in the gallery and discuss current art styles and movements. They also discuss specific aspects of being artists in contemporary society. This course may be repeated for credit. (1 Lec.)

#### (ART) 201 Drawing III (3)

Prerequisites: Art 110, Art 111, Art 115, sophomore standing, or demonstrated competence approved by the instructor. This course covers the analytic and expressive drawing of the human figure. Movement and volume are stressed. Laboratory fee. (2 Lec., 4 Lab.)

#### (ART) 202 Drawing IV (3)

Prerequisites: Art 201, sophomore standing, or demonstrated competence approved by the instructor. This course continues Art 201. Emphasis is on individual expression. Laboratory fee. (2 Lec., 4 Lab.)

#### (ART) 205 Painting I (3)

Prerequisites: Art 110, Art 111, Art 115, or demonstrated competence approved by the instructor. This studio course stresses fundamental concepts of painting with acrylics and oils. Emphasis is on painting from still life, models, and the imagination. (2 Lec., 4 Lab.)

#### (ART) 206 Painting II (3)

Prerequisite: Art 205. This course continues Art 205. Emphasis is on Individual expression. (2 Lec., 4 Lab.)

#### (ART) 208 Sculpture i (3)

Prerequisites: Art 110, Art 111, Art 115, or demonstrated competence approved by the instructor. Various sculptural approaches are explored. Different media and techniques are used. Laboratory fee. (2 Lec., 4 Lab.)

#### (ART) 209 Sculpture II (3)

Prerequisite: Art 208. This course continues Art 208. Emphasis is on individual expression. Laboratory fee. (2 Lec., 4 Lab.)

#### (ART) 215 Ceramics I (3)

Prerequisites: Art 110, Art 111, Art 115 or demonstrated competence approved by the instructor. This course focuses on the building of pottery forms by coil, slab, and use of the wheel. Glazing and firing are also included. Laboratory fee. (2 Lec., 4 Lab.)

#### (ART) 216 Ceramics II (3)

Prerequisite: Art 215 or demonstrated competence approved by the instructor. Glaze technology is studied. Advanced problems in the creation of artistic and practical ceramic ware. Laboratory fee. (2 Lec., 4 Lab.)

#### (ART) 217 Watercolor I (3)

Prerequisites: Art 110, Art 111, and Art 115 or demonstrated competence approved by the instructor. This course explores studio techniques in water base media. Emphasis is placed on exploration of a variety of modes and techniques as a means to original expression. (2 Lec., 4 Lab.)

#### (ART) 218 Watercolor II (3)

Prerequisite: Art 217. This course continues the development of skills in water base media. (2 Lec., 4 Lab.)

#### **ASTRONOMY**

#### (AST) 101 Descriptive Astronomy (3)

This course surveys the fundamentals of astronomy. Emphasis is on the solar system. Included is the study of the celestial sphere, the earth's motions, the moon, planets, asteroids, comets, meteors, and meteorites. (3 Lec.)

#### (AST) 102 General Astronomy (3)

Stellar astronomy is emphasized. Topics include a study of the sun, the properties of stars, star clusters, nebulae, interstellar gas and dust, the Milky Way Galaxy, and external galaxies. (3 Lec.)

#### (AST) 103 Astronomy Laboratory I (1)

Prerequisite: Credit or concurrent enrollment in Astronomy 101. The student uses simple equipment to make elementary astronomical observations of the motions of celestial objects. Also covered are elementary navigational techniques, graphical techniques of calculating the position of a planet or comet, and construction of simple observing equipment. This laboratory includes night observations. Laboratory fee. (3 Lab.)

#### (AST) 104 Astronomy Laboratory II (1)

Prerequisite: Credit or concurrent enrollment in Astronomy 102. The student makes and uses elementary astronomical observations. Topics include timekeeping, the various uses of spectra, and the motions of stars and galaxies. This laboratory includes night observations. Laboratory fee. (3 Lab.)

### **AVIATION TECHNOLOGY**

#### (AVT) 110 Introduction To Aviation (3)

This course introduces various aspects of the aviation industry. It covers the history, development, and advances in aircraft from balloon flight to the supersonic transport. The industry's economic and sociological effects on people and communities are also included. Special emphasis is on the origin and growth of airlines and the aviation industry. (3 Lec.)

#### (AVT) 121 Ground School Private (3).

This course includes the study of Federal Aviation Regulations, flight dynamics, meteorology, navigation, use of the radio, and general service of aircraft. This course is designed to fulfill the Ground School Requirements for the FAA Private Pilot Certificate. (3 Lec.)

#### (AVT) 122 Aviation Law (3)

Prerequisite: Aviation Technology 110 or concurrent enrollment in Air Transportation. Procedural laws and regulations are studied. Local, national, and international procedures are included as well as those relating both to public and private sectors of air commerce. Topics include the development of aviation law, regulatory agencies, and quasi-official study and advisory groups. Special emphasis is on flight procedures (flight plans), ports of entry, customs, clearances, contraband, quarantines, aviation hazards, and liabilities. The present legal structure and possible future changes are covered, including reciprocity agreements. (3 Lec.)

# (AVT) 123 Ground School Commercial (3)

Prerequisite: Private Pilot Certificate. This course is an indepth analysis of all topics covered in the Commercial Pilot written examination. Emphasis is on problem development and solutions. Advanced exercises are included in the areas of aircraft operation, meteorology, navigation, communications, theory and hazards of attitude instrument flight, flight physiology, and emergency procedures. This course is designed to fulfill the Ground School Requirements of the FAA for the Commercial Pilot Certificate. (3 Lec.)

# (AVT) 128 Aero Engines And Systems (3)

Prerequisite: Credit or concurrent enrollment in Aviation Technology 110. Electronics Technology 235, or the equivalent. Basic power plant types and principles of operation are presented. Reciprocating, rotary, jet, and rocket engines are included. Also covered are configurations, such as in-line, radial, vee and horizontally opposed, turbo-prop, turbo-jet, fan-jet, and ram-jet. Also included are numerous systems, such as the fuel ignition, electrical, environmental, lubrication, hydraulics, pneumatics, fire detection and extinguishing, cooling, tachometer, monitoring, manual control, and power boosted systems. (3 Lec.)

#### (AVT) 135 Flight Basic (2)

This course provides 25 hours of flight instruction (15 hours dual, 10 hours solo flight). Two hours in the synthetic flight trainer are required. A current Second-Class Medical Certificate is required. Flight and laboratory fee. (9 Lab., 25 Flight)

#### (AVT) 137 Flight Private Pilot (1)

This course provides 20 hours of flight instruction (10 hours dual and 10 hours solo flight). Pre-flight instruction and briefing are included. Students receive credit for the course upon completion of the flight prerequisite for the Private Pilot Flight Examination. One hour in the synthetic flight trainer is required. Flight and simulator fee. (24 Contact Hours)

# (AVT) 210 Federal Aviation Regulations, Airspace And Air Traffic Control (3)

It is recommended that this course be taken concurrently with one of the ground school courses. This course is an in-depth study of Federal Aviation Regulations, Air Traffic Control Procedures, the National Airspace System, and NTSB Regulations. Rated pilots may take this course to prepare for the 24-month flight review. (3 Lec.)

#### (AVT) 212 Airport Management (3)

Prerequisites: Required core courses and Management 136. The major functions of airport management are presented. Topics include the adequacy of facilities and services, organization, personnel, maintenance, planning and zoning, operations, revenues and expenses, public relations, ecology, and safety. A study of the socioeconomic effect of airports on the communities they serve is also covered. (3 Lec.)

#### (AVT) 220 Aero Dynamics (3)

Prerequisite: Credit or concurrent enrollment in Mathematics 196. The aeronautical applications of physical laws are studied. Areas considered include gravitational laws, forces and stresses, Bernoulli's principle, gyroscopic principles, and velocity-sonic relationships. The dynamics of airfoils, high efficiency lift devices, energy conversion to reactive forces related to aerobatics, and precision flight are also covered. (3 Lec.)

#### (AVT) 221 Advanced Navigation (3)

Prerequisite: Credit or concurrent enrollment in Aviation Technology 226 or demonstrated competence approved by the instructor. This course covers flight planning. Consideration is given to adverse atmospheric conditions, navigational capabilities, and safety. The course also includes the analysis of atmospheric maps, charts, and weather radar. The Interpretation and use of all operational data are also presented. (3 Lec.)

#### (AVT) 223 Airline Management (3)

Prerequisites: Required core courses and Management 136. This course covers the organization, operation, and management of an airline. Topics include planning, facility requirements, financing, aircraft selection criteria, route feasibility studies, market and passenger trends, and population trends affecting load factors. Problems unique to airline operations are explored. (3 Lec.)

#### (AVT) 224 Ground School Instrument (3)

Prerequisite: Private or Commercial Pilot Certificate. This course presents aircraft attitude control, flight procedures, and maneuvering by reference solely to cockpit instruments. Completion of this course will qualify the student to take the FAA Instrument Rating Written Examination. (3 Lec.)

#### (AVT) 225 Aviation Marketing (3)

Prerequisites: Required core courses. The significance and functions of marketing are stressed from the airline viewpoint. Topics include market research, sales, advertising and promotion concepts, traffic, demand analysis, and price determination theory. (3 Lec.)

#### (AVT) 226 Meteorology (3)

Basic concepts of meteorology are studied. Weather data and measuring devices are covered. Topics include weather maps and symbols, U.S. Weather Bureau documents, structure and general circulation of the atmosphere, theories of air mass, fronts, pressure areas, temperature gradients and Inversions, violent atmospheric activities, and ecological considerations. (3 Lec.)

(AVT) 249 Air Transportation, Traffic And Cargo (3) Prerequisites: Required core courses and credit or concurrent enrollment in Management 136. Transportation methods of passengers and cargo are examined. The need, nature and structure of the air transportation segment of the aviation industry are studied. Emphasis is on the diagnosis and solution of problems at terminals. Topics include air cargo, air mail, air express, air freight, air taxi, air carrier, commuter, business and pleasure. (3 Lec.)

#### (AVT) 250 Flight Instructor Ground School (2)

Prerequisite: Commercial Pilot Certificate or Private Pilot Certificate with 200 hours logged flight time. Principles of flight and ground school instruction are presented. Instructional techniques, analysis of maneuvers, and Federal Aviation Regulations are included. Completion of this course should qualify the student to pass the Flight Instructor Written Examination. (2 Lec.)

#### (AVT) 251 Flight Instructor Airplane/Single Or Multi-Engine (2)

Prerequisite: Commercial Pilot Certificate or Private Pilot Certificate with 200 hours logged flight time. This course focuses on the science of flight instruction. Evaluation of student performance and maneuver analysis are included. The required instructional flight disciplines are covered in order to qualify students for the FAA Flight Instructor 71 Rating. Simulator fee. (40 Contact Hours)

#### (AVT) 252 Instrument Flight Instructor Ground School (3)

Prerequisites: Instrument Rating and Commercial Pilot Certificate; pass written examination on airspace and regulations or concurrent enrollment in Aviation Technology 210. Instructional techniques of the synthetic flight trainer are presented. Included are instrument flight rules, instrument charts, instrument procedures, and the use of aircraft instruments for instrument flight. Emphasis is on developing instructional techniques and materials. The course is designed to prepare students for the FAA Instrument Flight Instructor Flight Test and Written Test. Students will be required to conduct instruction in Synthetic Ground Trainers. (48 Contact Hours)

#### (AVT) 253 Flight Instructor-Airplane Instrument (1)

Prerequisite: Certified Flight Instructor Rating. This course including evaluation of student performance and maneuver analysis. The required flight disciplines that qualify the student for the FAA Flight Instructor-Airplane Instrument Rating are covered. Flight fee. (20 Contact Hours)

#### (AVT) 254 Flight Advanced I (1)

Prerequisite: A Private Pilot Certificate or a Commercial Pilot Certificate. This course includes 10 hours of flight instruction. All flying is in modern twin-engine aircraft and is designed to give the advanced pilot a greater depth of aircraft experience. The course includes pre-flight instruction and briefing. It leads to the FAA Multi-Engine Pilot Rating. Flight fee. (16 Contact Hours)

(AVT) 255 Type Rating Turbo Jet Ground School (3) Prerequisites: Commercial Pilot Certificate and Instrument Rating. This course will provide an analysis of normal. abnormal and emergency operation of the flight control. engine, fuel, electrical, pneumatic, navigation and auxiliary systems and use of the manufacturer's performance data for a specific make and model (type) of small, multi-engine. turbo-jet powered airplane. A review of procedures related to pre-flight, takeoffs, enroute flight, landings, engine-out procedures, no-flap landings, collision avoidance and wake turbulence avoldance will also be included. (48 Contact Hours)

#### (AVT) 256 Flight Advanced II-Jet Type Rating (1)

Prerequisites: Commercial Pilot Certificate and Instrument Rating. This course includes ten hours of flight instruction. and ten hours of pre- and post-flight instruction. All flying is in a small multi-engine, turbo-jet powered airplane. It leads to the FAA Multi-Engine Jet airplane type rating. Flight fee. (13 Contact Hours)

#### (AVT) 261 Aircraft Dispatcher I (3)

This course includes a survey of FAA regulations and duties of an aircraft dispatcher plus basic flight planning for transport category aircraft. (48 Contact Hours)

#### (AVT) 262 Practical Dispatching (3)

Prerequisite: Aviation Technology 261. The content of this course is described in the current FAA Aircraft Dispatcher Circular. The content is designed to prepare the student for the FAA written exam for aircraft dispatcher. Ten hours are required in the simulated flight trainer. (Simulated instrument flight hours can be accumulated both on and off campus but must be verified by the instructor). Simulator fee. (58 Contact Hours)

#### (AVT) 263 Flight Engineer Ground School (3)

Prerequisites: Aviation Technology 261 and Aviation Technology 262 or the equivalent experience and/or credentials. This course includes FAA regulations, flight theory and aerodynamics, basic meteorology with respect to engine operations, center of gravity computations, airplane systems and equipment, and normal and emergency operating procedures. This information prepares the student for the flight engineer's written tests. Specific emphasis is placed on the Boeing 727 and Boeing 707 as aircraft which are used for flight engineer training by civil United States air carriers. (48 Contact Hours)

#### (AVT) 264 Air Transport Pilot Ground School (3)

Prerequisites: Aviation Technology 261 and Aviation Technology 262 or the equivalent experience and/or credentials. This course is designed to prepare the student for the Air Transport Pilot Written Test and includes operations of air carrier aircraft, navigation by instruments, the general system and material relative to weather information collection and dissemination, meteorology, weather conditions, air navigation facilities, airplane weather observations and influence of terrain on meteorological conditions, radio communications, and basic principles of loading and weight distribution. (48 Contact Hours)

#### (AVT) 265 Flight Commercial I (2)

Prerequisite: Private Pilot Certificate. This course provides 30 hours of flight instruction (10 hours dual and 20 hours solo flight) to apply toward the Commercial Pilot Certificate. Pre-flight instruction and briefing are included. A current Second- Class Medical Certificate is required. Flight and laboratory fee. (8 Lab., 30 Flight)

#### (AVT) 266 Flight Commercial II (3)

Prerequisites: Aviation Technology 265 and concurrent enrollment in Aviation Technology 123. This course provides 46 hours of flight instruction (10 hours dual instrument instruction and 36 hours of solo flight) to apply toward the Commercial Pilot Certificate. Pre-flight instruction and briefing are included, as are 5 hours of night flight. Flight and laboratory fee. (8 Lab., 46 Flight)

#### (AVT) 267 Flight Commercial III - Instrument (3)

Prerequisites: Private Pilot Certificate, Aviation Technology 266 and completion of or concurrent enrollment in Aviation Technology 224. This course provides 45 hours of instrument flight instruction. Pre-flight instruction and briefing are included. Flight fee. (46 Flight)

#### (AVT) 268 Flight Commercial IV (3)

Prerequisites: Aviation Technology 123 and 267. This course provides 46 hours flight instruction (6 hours dual flight, 30 hours solo flight, and 10 hours dual and practice flight in a more sophisticated aircraft) to fulfill flight law requirements for the Commercial Pilot Certificate. Preflight instruction and briefing are included. Students receive course credit upon completion of the flight prerequisites to the Commercial Pilot Flight Examination. Flight fee and laboratory fee. (4 Lab., 46 Flight)

#### (AVT) 270 Orientation To Air Traffic Control (5)

This course is designed to acquaint new employees with the FAA organization, the options within the air traffic service, and the emergency readiness requirements. It provides a basic orientation to the history, structure, and functions of the FAA with emphasis on air traffic service. National, local, and individual policies and obligations are also presented. (80 Contact Hours)

# (AVT) 272 Aircraft Types And Characteristics/Air Traffic Control Communications (2)

This course is designed to introduce developmental controllers to the information necessary to identify the types of aircraft by name or model by their physical characteristics and to state the normal range of operating speeds, altitudes, the weight class and category, as well as developing the ability to identify the procedures, phraseology, and discipline pertaining to radio communications in accordance with FCC regulations. Emergency communications and visual communications used by air traffic control facilities are also presented. (32 Contact Hours)

# (AVT) 274 Air Traffic Computer Operations\* (3)

This course is designed to train the student to operate the components of the central computer complex in an enroute air traffic control center and includes computer operations, input and output devices and their operating characteristics and message format, content, and computer responses. (48 Contact Hours)

#### (AVT) 704 Cooperative Work Experience (4)

Prerequisite: 15 Credit Hours. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include job interview and job application techniques, job site interpersonal relations, and employer expectations of employees. (1 Lec., 20 Lab.)

#### (AVT) 714 Cooperative Work Experience (4)

Prerequisite: 15 Credit Hours. This course combines productive work experience with academic study. The student, employer and instructor will develop a written compentency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include dressing for success, how to advance in the job through off-duty education, and utilizing role models to achieve goals. (1 Lec., 20 Lab.)

#### (AVT) 804 Cooperative Work Experience (4)

Prerequisite: 15 Credit Hours. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include preparation of resumes, changing jobs, supervising subordinates, and building selfesteem. (1 Lec., 20 Lab.)

#### AVIONICS TECHNOLOGY

#### (AV) 129 Introduction To Aircraft Electronic Systems (3)

This course relates aircraft electronic systems to aircraft flight and navigation. Emphasis is on the operation and function of the electronic systems. The laboratory requirements include demonstrations of the operation of the systems and the use of some ramp test equipment. Laboratory fee. (2 Lec., 2 Lab.)

#### (AV) 132 Aircraft Electrical And Electronic Systems Installation (4)

Prerequisite: Avionics Technology 129. Suggested prerequisites:

Electronics Technology 191 or Electronics Technology 135. This is a course of study and practical experience in the installing of avionic systems in aircraft, mounting of electronic equipment, construction and installation of electrical wiring and cables, proper use of tools, selection of materials, and accepted methods and procedures to insure aircraft safety, mechanical integrity, electrical reliability, and compliance with applicable FAA regulations. Laboratory fee. (3 Lec., 3 Lab.)

#### (AV) 235 Operational Testing Of Aircraft Electronic Systems (4)

Prerequisite: Avionics Technology 129. Suggested prerequisites: Electronics Technology 191 or Electronics Technology 135. This course integrates technical drawing interpretation, wiring interface checkout and the application of ramp test equipment in common usage. In the laboratory, the student will perform functional checks of aircraft electrical and electronic systems using appropriate procedures for determining the operating condition of the equipment and techniques for correcting equipment malfunctions. The students will gain practical experience in avionics equipment in aircraft and on the bench. 73 Laboratory fee. (3 Lec., 3 Lab.)

# BIOLOGY

#### (BIO) 101 General Biology (4)

This course is intended for students majoring and minoring in biology and related disciplines. It is a prerequisite for all higher level biology courses. Topics include the scientific method, fundamental general and biological chemistry, cell structure and function including membrane transport, cell reproduction, cell energetics and homeostatic mechanisms. Laboratory fee. (3 Lec., 3 Lab.)

#### (BIO) 102 General Biology (4)

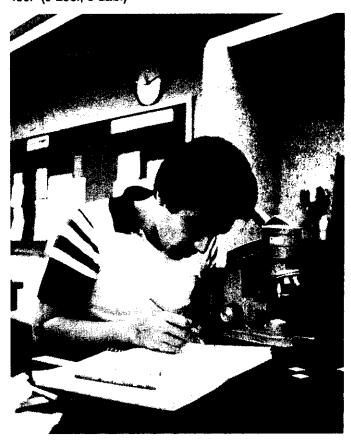
This course is a continuation of Biology 101 and is intended for students majoring and minoring in biology and related disciplines. Topics include Mendelian and molecular genetics, developmental biology, evolution and the diversity of life, and ecology. Laboratory fee. (3 Lec., 3 Lab.)

#### (BIO) 115 Biological Science (4)

Selected topics in biological science are presented to students not majoring in the sciences to promote their understanding of biological concepts and to enable them to use these concepts in their daily lives. Topics include chemistry and biochemistry, the cell, respiration, photosynthesis, cell reproduction, genetics, and reproduction and development. Laboratory fee. (3 Lec., 3 Lab.)

#### (BIO) 116 Biological Science (4)

Selected topics in biological science are presented to students not majoring in the sciences to promote their understanding of biological concepts and to enable them to use these concepts in their daily lives. Topics include plant and animal systems, diversity of life and population dynamics, taxonomy, evolution, and ecology. Laboratory fee. (3 Lec., 3 Lab.)



# (BIO) 120 Introduction To Human Anatomy And Physiology (4)

Prerequisite: Prior enrollment in Biology 115 is recommended for those with no previous high school biology. Major topics include cell structure and function, tissues, organization of the human body, and the following organ systems: skeletal, muscular, nervous, and endocrine. This course is a foundation course for specialization in Associate Degree Nursing and allied health disciplines. Other students interested in the study of structure and function of the human body should consult a counselor. Emphasis is on homeostasis. Laboratory fee. (3 Lec., 3 Lab.)

# (BIO) 121 Introduction To Human Anatomy And Physiology (4)

Prerequisite: Biology 120. This course is a continuation of Biology 120. Major topics include the following organ systems: digestive, circulatory, respiratory, urinary, and reproductive. Emphasis is on homeostasis. Laboratory fee. (3 Lec., 3 Lab.)

# (BIO) 216 General Microbiology (4)

Prerequisite: Biology 102 or 121 or demonstrated competence approved by the instructor. Topics include growth, reproduction, nutrition, genetics, and ecology of micro-ogranisms, as well as aspects of microbial disease, immunology and chemotherapy. Laboratory activities constitute a major part of the course. Laboratory fee. (3 Lec., 4 Lab.)

# **BLUEPRINT READING**

# (BPR) 177 Blueprint Reading (2)

Engineering drawings are described and explained. Topics include multiview projection, sections, auxiliaries, bill of materials, symbols, notes, conventions, and standards. The skills of visualization, dimensioning, and sketching of machine parts are covered. (1 Lec., 3 Lab.)

#### (BPR) 178 Blueprint Reading (2)

Prerequisite: Blueprint Reading 177. The different types of prints are read. More complex prints are included. Types of prints include machine, piping, architectural, civil, structural, electrical, electronic, numerical control documents, and aircraft. Calculations required in blueprint reading are emphasized. (1 Lec., 3 Lab.)

#### **BUSINESS**

#### (BUS) 105 Introduction To Business (3)

This course provides an introduction to business operations. Topics include: the business system, legal forms of business, organization and management, business functions (production, marketing, finance, risk management, information systems, accounting) and the environments affecting business (the economy, labor, government regulation, social responsibility, law, international business, and technology). (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (BUS) 143 Personal Finance (3)

Personal financial issues are explored. Topics include financial planning, insurance, budgeting, credit use, home ownership, savings, investment, and tax problems. (3 Lec.)

#### (BUS) 234 Business Law (3)

This course presents the legal principles affecting business decisions. The law of contracts, agency, sales, negotiable instruments, and secured transactions are specifically covered. (3 Lec.)

#### **CHEMISTRY**

#### (CHM) 101 General Chemistry (4)

Prerequisites: Developmental Mathematics 093 or equivalent and any one of the following: high school chemistry, Chemistry 115, or the equivalent. This course is for science and science- related majors. Fundamental concepts of chemistry are presented including states and properties of matter, the periodic table, chemical reaction types and energy relationships, chemical bonding, atomic and molecular structure, stoichiometry, gas laws and solutions. Laboratory fee. (3 Lec., 3 Lab.)

#### (CHM) 102 General Chemistry (4)

Prerequisite: Chemistry 101. This course is for science and science-related majors. It is a continuation of Chemistry 101. Previously learned and new concepts are applied. Topics include reaction kinetics and chemical equilibrium, acids, bases, salts and buffers, thermodynamics, colligative properties of solutions, electrochemistry, transition-metal chemistry, nuclear chemistry, qualitative inorganic analysis and an introduction to organic chemistry. Laboratory fee. (3 Lec., 3 Lab.)

#### (CHM) 115 Chemical Science (4)

Prerequisite: Developmental Mathematics 091 or the equivalent. This course is for non-science majors. Fundamental concepts are presented in lecture and laboratory including the periodic table, atomic structure, chemical bonding, reactions, stoichiometry, states of matter, properties of metals, nonmetals and compounds, acid-base theory, oxidation-reduction, solutions and nuclear chemistry. Descriptive chemistry is emphasized. Laboratory fee. (3 Lec., 3 Lab.)

#### (CHM) 116 Chemical Science (4)

Prerequisite: Chemistry 115 or demonstrated competence approved by the instructor. This course is for non-science majors. It surveys organic chemistry and biochemistry. The reactions, syntheses, nomenclature, uses, purposes and properties of the important classes of organic and biochemical compounds are studied. Laboratory fee. (3 Lec., 3 Lab.)

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#### (CHM) 201 Organic Chemistry 1 (4)

Prerequisite: Chemistry 102. This course is for science and science-related majors. It introduces the fundamental classes of organic (carbon) compounds and studies aliphatic and aromatic hydrocarbons in detail. It includes occurance, structure, stero-chemistry, nomenclature, and reactions and mechanisms of synthesis. Lab includes: synthesis, purification by distillation, recrystallization, extraction and chromatography, and identification by spectroscopic, physical and chemical methods. Laboratory fee. (3 Lec., 4 Lab.)

#### (CHM) 202 Organic Chemistry II (4)

Prerequisite: Chemistry 201. This course is for science and science-related majors. It is a continuation of Chemistry 201. Topics studied include properties and syntheses of aliphatic and aromatic systems of aldehydes, ketones, carboxylic acids, esters, ethers, amines, alcohols and amides. Further topics include polyfunctional and heterocyclic compounds, amino acids, proteins, lipids and carbohydrates. Laboratory includes qualitative organic analysis. Laboratory fee. (3 Lec., 4 Lab.)

#### (CHM) 203 Quantitative Analysis (4)

Prerequisite: Chemistry 102, Mathematics 101. A survey of methods used in analytical chemistry: gravimetric and volumetric methods based on equilibria, oxidation-reduction, and acid-base theory, spectrophotometry, chromatography and electroanalytical chemistry. (2 Lec., 6 Lab.)



# CHILD DEVELOPMENT

# (CD) 127 Early Childhood Development, 5-12 Years (3)

This course covers the principles of normal child growth and development from five through twelve years of age. Emphasis is on physical, intellectual, emotional, and social growth. Special attention is given to before- and afterschool care. (3 Lec.)

# (CD) 135 Introduction To Early Childhood Programs And Services (4)

This course is a study of historical and current early childhood development programs and services, as well as individuals influencing these programs. Laws and standards regulating these child-care facilities are covered. The laboratory experience includes observation of and participation with pre-schools and child-care centers in the community. Laboratory fee. (3 Lec., 2 Lab.)

# (CD) 137 Early Childhood Learning Environments, Activities And Materials (4)

This course is a study of appropriate learning experiences for young children in child-care facilities. Emphasis is on quality environments, learning activities, materials and effective teaching techniques. The laboratory experience includes observation and participation in the Parent/Child Study Center and community child-care facilities. Laboratory fee. (3 Lec., 2 Lab.)

# (CD) 140 Early Childhood Development, 0-3 Years (3)

This course covers the principles of normal child growth and development from conception through three years. Emphasis is on physical, intellectual, emotional, and social growth. (3 Lec.)

# (CD) 141 Early Childhood Development, 3-5 Years (3)

This course covers the principles of normal child growth and development from three through five years of age. Emphasis is on physical, intellectual, emotional, and social growth. (3 Lec.)

# (CD) 150 Nutrition, Health And Safety Of The Young Child (3)

Practical experience and information on the nutritional, health, and safety needs of the young child are provided. A survey of community services for parents and teachers is included. Students earn a first aid certificate during this course. Laboratory fee. (2 Lec., 2 Lab.)

#### (CD) 253 Abuse Within The Family (3)

The symptoms and causes of abusive behaviors within the family are the focus of this course. Emphasis is on developing skills and competencies in working with these families to help them lessen and alleviate abusive behaviors and experiences. Laboratory fee. (2 Lec., 2 Lab.)

# (CD) 804 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Child Development program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experience. Instructor and employer will evaluate the student's job performance. The seminars consist of discussing life's transitions (professional and personal), developing communication skills, appraising self and career performance and exploring stress management techniques. (1 Lec., 20 Lab.)

### **COLLEGE LEARNING SKILLS**

#### (CLS) 100 College Learning Skills (1)

This course is for students who wish to extend their learning skills for academic or career programs. Individualized study and practice are provided in reading, study skills, and composition. This course may be repeated for a maximum of three credits. (1 Lec.)

#### COMMUNICATIONS

#### (COM) 131 Applied Communications (3)

This course focuses on student writing. It emphasizes reading and analytical thinking skills and introduces research skills. Students practice writing for a variety of audiences and purposes, primarily job-related. (3 Lec.)

# COMPUTER INFORMATION SYSTEMS

# (CIS) 103 Introduction To Computer Information Systems (3)

This course presents an overview of computer information systems with an emphasis on business applications. Topics include terminology, systems and procedures, and the role of computers and their evolution in an information-oriented society. The fundamentals of computer problem solving are applied through the use of the BASIC programming language and application software packages. Laboratory fee. (This course is offered on campus and may be offered via television.) (3 Lec., 1 Lab.)

#### (CIS) 108 PC Software Applications (4)

This course surveys the use of the microcomputer in conducting professional activities and solving business problems. Topics include the study of hardware and software components of a microcomputer, the function of operating systems and the study and use of contemporary software application packages. Laboratory fee. (3 Lec., 4 Lab.)

(CIS) 111 Data Entry Applications And Concepts (3) Prerequisite: Office Careers 176 or one year typing in high school or demonstrated competence approved by the instructor. This course provides hands on experience using a personal computer for data entry applications. Students will learn to use a data entry utility program to create, change, and modify data sets, as well as enter variable data. Speed and accuracy will be stressed. Laboratory fee. (2 Lec., 4 Lab.)

(CIS) 114 Problem Solving With The Computer (4) Prerequisites: Business 105 or Management 136 and Computer Information Systems 103 or Computer Information Systems 108, or demonstrated proficiency approved by instructor. This course explores methods of solving business problems with the use of a microcomputer. Analysis and design methods are studied and applied to practical situations involving various business functions. Data security and privacy issues are also considered. (3 Lec., 2 Lab.)

#### (CIS) 118 Text Processing Applications (3)

Prerequisite: Computer Information Systems 103 or 108 or demonstrated competence approved by the instructor. The course covers the use of microcomputers in preparing and editing documents. Topics include entry and editing, reformatting, search and replace, cut-and-paste, file and print operations, utilities including spelling checkers, outliners, and office productivity tools. Office automation concepts including desktop publishing, facsimile and networking are covered. Students will learn to use commercially available text processors. Laboratory fee. (2 Lec., 3 Lab.)

(CIS) 150 Computer Program Logic And Design (3)
Prerequisite: Computer Information Systems 103 or
demonstrated competence approved by the instructor.
This course presents basic logic needed for problem solving with the computer. Topics include structured design
tools and their application to general business problems.
(3 Lec.)

#### (CIS) 160 Data Communications (3)

Prerequisite: Computer Information Systems 103 or 108. This course provides an introduction to data communications vocabulary, concepts, and uses. Topics include data communications hardware, software, networks, and protocols. (3 Lec.)

#### (CIS) 162 COBOL Programming 1 (4)

Prerequisites: Computer Information Systems 103, credit or concurrent enrollment in Computer Information Systems 150, or demonstrated competence approved by the instructor. This course develops structured programming skills using the COBOL language. Topics include input/output, comparisons, control breaks, introductory table concepts, and report formats. Skills in problem analysis, using design tools, coding, testing, and documentation are also developed. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 164 COBOL Programming II (4)

Prerequisites: Computer Information Systems 150 and 162 or demonstrated competence approved by the instructor. This course continues the development of programming skills using the COBOL language. Topics include advanced table concepts, sort techniques, disk file organizations and maintenance, debugging techniques, copy techniques, and subprograms. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 167 C Programming (4)

Prerequisite: Six credit hours in programming language courses or demonstrated competence approved by the instructor. This course covers the fundamentals of the C Programming language. Topics include structured programming and problem solving techniques. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 169 4th Generation Languages (4)

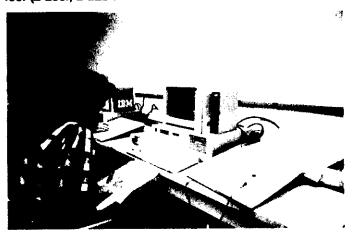
Prerequisite: Three credit hours in a programming language course or demonstrated competence approved by the instructor. This course presents an introduction to 4th generation languages and their relationship to software productivity. Topics include survey and definition of available products and their uses, current functions, evaluation standards, selection and implementation. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 170 RPG Programming (3)

Prerequisite: Three credit hours in a programming language course or demonstrated competence approved by the instructor. This course introduces programming skills using the RPG II language. Topics include basic listings with levels of totals, multi-record input, exception reporting, look-ahead feature, and multi-file processing. Laboratory fee. (2 Lec., 2 Lab.)

#### (CIS) 172 BASIC Programming (3)

Prerequisite: Computer Information Systems 103 or demonstrated competence approved by the instructor. This course covers the fundamentals of the BASIC programming language. Topics include structured program development, input/Output operations, interactive concepts and techniques, selection and iteration, arrays, functions, string handling, and file processing. Laboratory fee. (2 Lec., 2 Lab.)



#### (CIS) 173 Pascal Programming For Business (3)

Prerequisite: Three credit hours in a programming language course or demonstrated competence approved by the instructor. This course is an introduction to the Pascal programming language. Topics will include structured programming and problem-solving techniques as they apply to business applications. Laboratory fee. (2 Lec., 2 Lab.)

#### (CIS) 205 JCL And Operating Systems (4)

Prerequisite: Computer Information Systems 162 or 116 or demonstrated competence approved by the instructor. This course introduces mainframe operating system concepts, terminology, job control language, and utilities. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 210 Assembly Language! (4)

Prerequisite: Computer Information Systems 164 or demonstrated competence approved by the instructor. This course focuses on basic concepts and instructions using a current mainframe assembler language and structured programming techniques. Topics include decimal features, fixed point operations using registers, selected macro instructions, introductory table concepts, editing printed output, and reading memory dumps. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 215 Micro Assembly Language (4)

Prerequisite: Six credit hours in programming language courses or demonstrated competence approved by the instructor. The basic elements of the assembler language are introduced and structured programming and top-down design techniques are applied. Topics include architecture and machine definition, data description and other assembler pseudo-ops, logic and shift, arithmetic processing, table concepts, printing, string and screen processing, macro definition, and disk processing. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 218 Spreadsheet Applications (4)

Prerequisites: Computer Information Systems 108 and 114 or demonstrated competence approved by the instructor. The course covers the theory and uses of electronic spreadsheets using commercially available packages. Topics include formula creation, template design, formatting features, statistical, mathematical and financial functions, file operations, report generation, graphics, and macro programming. Laboratory fee. (3 Lec., 4 Lab.)

#### (CIS) 220 Assembly Language II (4)

Prerequisite: Computer Information Systems 210 or demonstrated competence approved by the instructor. Advanced programming skills will be developed using a current mainframe assembler language. Topics include advanced fixed point operations, indexing, disk file organization and maintenance, advanced table concepts, data and bit manipulation techniques, macro writing, subprogram linkages, advanced problem analysis, debugging techniques, and introduction to floating point operations. Laboratory fee. (3 Lec., 4 Lab.)

# (CIS) 221 PC Operating Systems And Utilities (4)

Prerequisites: Computer Information Systems 108 and 160. This course covers operatinew of PC hardware and the organization of components and devices into architectural configurations. Students will learn how to prepare and evaluate system specifications, troubleshoot minor hardware problems, and prepare and modify short assembler language programs. Laboratory fee. (3 Lec., 3 Lab.)

#### (CIS) 223 PC Hardware (3)

Prerequisite: Credit or concurrent enrollment in Computer Information Systems 221. This course presents a function systems-level review of PC hardware and the organization of components and devices into architectural configurations. Students will learn how to prepare and evaluate system specifications, trouble-shoot minor hardware problems, and prepare and modify short assembler language programs. Laboratory fee. (2 Lec., 2 Lab.)

# (CIS) 225 Systems Analysis And Design (4)

Prerequisite: Computer Information Systems 164 or demonstrated competence approved by the instructor. This course introduces and develops skills to analyze existing business systems, to design new systems using structured methodology, and to prepare documentation. Emphasis is on a case study involving all facets of systems analysis and design. (3 Lec., 4 Lab.)

### (CIS) 228 Database Applications (4)

Prerequisites: Computer Information Systems 108 and 114 or demonstrated competence approved by the instructor. This course covers microcomputer database management concepts using commerically available software. Topics include terminology, organizing data and designing files, report and menu generation, indexing, selection/queries, browsing, file operations, and program development. Laboratory fee. (3 Lec., 4 Lab.)

# (CIS) 239 User Documentation And Training (3)

Prerequisites: Speech Communication 101, Office Careers 231, and Computer Information Systems 118 or comparable word processing course or demonstrated competence approved by the instructor. This course covers the practical application of adult learning theory, product documentation, creating user guides and reference manuals, using tutorials, evaluating and using training materials, effective training experiences, concepts of desktop publishing, and presentation graphics. (3 Lec.)

#### (CIS) 254 Data Base Systems (4)

Prerequisite: Computer Information Systems 164 or demonstrated competence approved by the instructor. This course is an introduction to applications program development in a data base environment with emphasis on loading, modifying, and querying a data base. Topics include discussion and application of data structures, indexed and direct file organizations, data analysis, design, implementation, and data management. Laboratory fee. (3 Lec., 4 Lab.)

# (CIS) 258 On-Line Applications (4)

Prerequisites: Computer Information Systems 160 and 164 or demonstrated competence approved by the instructor. This course covers teleprocessing monitors and introduces the concepts required to program on-line applications. Topics include on-line applications design, the functions of a teleprocessing monitor, program coding techniques, testing methods, and file handling. The CICS Command Level interface to the COBOL language will be used. Laboratory fee. (3 Lec., 4 Lab.)

# (CIS) 260 Contemporary Topics In Computer Information Systems (1)

Prerequisite: Will vary based on topics covered and will be annotated in each semester's class schedule. Recent developments and topics of current interest are studied. May be repeated when topics vary. (1 Lec.)

# (CIS) 262 Contemporary Topics In Computer Information Systems (3)

Prerequisite: Will vary based on topics covered and will be annotated in each semester's class schedule. Recent developments and topics of current interest are studied. May be repeated when topics vary. (3 Lec.)

# (CIS) 263 Special Topics In Computer Information Systems (3)

Prerequisite: Will vary based on topics covered and will be annotated in each semester's class schedule. Current developments in the rapidly changing field of computer information systems are studied. May be repeated when topics vary. Laboratory fee. (2 Lec., 2 Lab.)

# (CIS) 265 Special Topics In Computer Information Systems (4)

Prerequisite: Will vary based on topics covered and will be annotated in each semester's class schedule. Current developments in the rapidly changing field of computer information systems are studied. May be repeated as topics vary. Laboratory fee. (3 Lec., 4 Lab.)

# (CIS) 272 Advanced BASIC Techniques (3)

Prerequisite: Computer Information Systems 172 or demonstrated competence approved by the instructor. This course continues the development of programming skills using the BASIC language and its application to typical business problems. Laboratory fee. (2 Lec., 2 Lab.)

#### (CIS) 280 Applied Studies (3)

Prerequisites: Computer Information Systems 223 and twelve additional credit hours from this option or demonstrated competence approved by instructor. This course applies PC analyst skills to real world situations. Topics include planning and implementing solutions to business-related problems, incorporating student knowledge of hardware, software, applications packages, training, documentation, communication skills, and problem solving skills. (3 Lec.)

#### (CIS) 701 Cooperative Work Experience (1)

Prerequisite: Completion of two courses in the Computer Information Systems program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Student must develop new learning objectives each semester. The seminar consists of topics which include job interview and application techniques, job site interpersonal relations, preparation of resumes, building self-esteem, setting and writing job objectives, time and stress management techniques, career interest/aptitude test, evaluation and planning, vendor presentation and professional development. (1 Lec., 5 Lab.)

#### (CIS) 703 Cooperative Work Experience (3)

Prerequisites: Completion of two courses in the Computer Information Systems program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Student must develop new learning objectives each semester. The seminar consists of topics which include job interview and application techniques, job site interpersonal relations, preparation of resumes, building self-esteem, setting and writing job objectives, time and stress management techniques, career interest/aptitude test, evaluation and planning, vendor presentation and professional development. (1 Lec., 15 Lab.)

#### (CIS) 704 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Computer Information Systems program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Student must develop new learning objectives each semester. The seminar consists of topics which include job interview and application techniques, job site interpersonal relations, preparation of resumes, building self-esteem, setting and writing job objectives, time and stress management techniques, career interest/aptitude test, evaluation and planning, vendor presentation and professional development. (1 Lec., 20 Lab.)

#### (CIS) 713 Cooperative Work Experience (3)

Prerequisite: Completion of one course in Computer Information Systems 701, 703 or 704. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Student must develop new learning objectives each semester. The seminar consists of topics which include setting and writing job objectives and directed independent studies of computer-related topics such as expert systems, new vendor products or presentation graphics. (1 Lec., 15 Lab.)

#### (CIS) 714 Cooperative Work Experience (4)

Prerequisite: Completion of one course in Computer Information Systems 701, 703 or 704. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Student must develop new learning objectives each semester. The seminar consists of topics which include setting and writing job objectives and directed independent studies of computer-related topics such as expert systems, new vendor products or presentation graphics. (1 Lec., 20 Lab.)

#### COMPUTER SCIENCE

#### (CS) 111 Computing Science I (3)

Prerequisite: Two years of high school algebra or Developmental Math 093 or demonstrated competence approved by the instructor. This introductory course is designed to meet the requirements for a four-year degree with a major or minor in computer science, mathematics, or a scientific field. Topics covered include computer organization and storage, number systems, and problem-solving using structured programming in Pascal. Laboratory fee. (3 Lec.)

#### (CS) 112 Computing Science II (3)

Prerequisites: Computer Science 111 and Math 101 or demonstrated competence approved by the instructor. This course is a continuation of Computer Science 111 and is designed to meet the requirements for a degree in computer science or a related field. Topics covered include a continuation of Pascal programming, structured problem-solving, elementary data structures including arrays, records, files, and the use of pointer variables. Laboratory fee. (2 Lec., 2 Lab.)

# (CS) 121 Introduction To FORTRAN Programming (3)

Prerequisite: Math 102 or demonstrated competence approved by the instructor. This course is intended primarily for students pursuing a degree in an engineering, science, or related field which requires a one-semester course in FORTRAN programming. Emphasis is on the use of the FORTRAN language in technical applications. Topics include input/output, structures, and formatting. Laboratory fee. (2 Lec., 2 Lab.)

#### (CS) 122 Introduction To BASIC Programming (3)

Prerequisite: Developmental Math 093 or demonstrated competence approved by the instructor. This course is an introduction to the BASIC programming language. Topics include input/output, looping, decision structures, functions, arrays, disk files, and formatting. Emphasis is placed on structured programming techniques and algorithm development. Laboratory fee. (2 Lec., 2 Lab.)

#### (CS) 123 Introduction To PL/I Programming (3)

Prerequisites: Developmental Math 093 and Computer Science 111 or Computer Information Systems 103 or demonstrated competence approved by the instructor. This course is an introduction to the PL/I programming language. Emphasis is placed upon the structured approach to program design using both mathematical and business applications. Topics include string processing, simple data structures, internal search/sort techniques, and sequential file processing. Laboratory fee. (2 Lec., 2 Lab.)

#### (CS) 211 Assembly Language (3)

Prerequisite: Computer Science 112 or demonstrated competence approved by the instructor. This course is designed to meet the requirements for a degree in computer science or a related field. Topics covered include a study of assembly language programming, machine representation of data and instructions, and addressing techniques. Laboratory fee. (2 Lec., 2 Lab.)

#### (CS) 221 Introduction To Computer Organization (3)

Prerequisite: Computer Science 112 or demonstrated competence approved by the instructor. This course introduces the organization and structuring of the major hardware components of computers, the mechanics of information transfer and control within a digital computer system, and the fundamentals of logic design. Laboratory fee. (2 Lec., 2 Lab.)

#### (CS) 222 Introduction To File Processing (3)

Prerequisite: Computer Science 112 or demonstrated competence approved by the instructor. This course introduces the concepts and techniques of structuring data. Experience is provided in the use of secondary storage devices and applications of data structures and file processing techniques. Laboratory fee. (2 Lec., 2 Lab.)

#### DANCE

#### (DAN) 116 Rehearsal and Performance (1)

This course supplements beginning dance technique classes. Basic concepts of approaching work on the concert stage--stage directions, stage areas, and the craft involved in rehearsing and performing are emphasized. This course may be repeated for credit. (4 Lab.)

#### (DAN) 155 Jazz I (1)

The basic skills of jazz dance are introduced. Emphasis is on technique and development, rhythm awareness, jazz styles, and rhythmic combinations of movement. Laboratory fee. (3 Lab.)

#### (DAN) 156 Jazz II (1)

Prerequisite: Dance 155 or demonstrated competence approved by the instructor. Work on skills and style in jazz dance is continued. Technical skills, combinations of steps and skills into dance patterns, and exploration of composition in jazz form are emphasized. Laboratory fee. (3 Lab.)

#### (DAN) 161 Beginning Ballet I (2)

This course explores basic ballet techniques. Included are posture, balance, coordination, rhythm, and flow of physical energy through the art form. Theory, terminology, ballet history, and current attitudes and events in ballet are also studied. Barre exercises and centre floor combinations are given. Laboratory fee. (1 Lec., 3 Lab.)

#### (DAN) 163 Beginning Ballet II (2)

Prerequisite: Dance 161. This course is a continuation of Dance 161. Emphasis is on expansion of combinations at the barre. Connecting steps learned at centre are added. Jumps and pirouettes are introduced. Laboratory fee. (1 Lec., 3 Lab.)

# (DAN) 165 Beginning Contemporary Dance I (2)

This course explores basic contemporary techniques. Emphasis is on technique development, and familiarity with contemporary meters and rhythms. An awareness of major influences on concert dance is developed. Laboratory fee. (1 Lec., 3 Lab.)

#### (DAN) 166 Beginning Contemporary Dance II (2)

Prerequisite: Dance 165. This course continues and further develops an exploration of Dance 165. Laboratory fee. (1 Lec., 3 Lab.)

#### (DAN) 200 Rehearsal and Performance (1)

Prerequisite: Dance 116 or demonstrated competence approved by the instructor. This course supplements intermediate dance technique classes. It is a continuation of Dance 116 with emphasis on more advanced concepts as they apply to actual rehearsals and performances. This course may be repeated for credit. (4 Lab.)

#### (DAN) 252 Coaching and Repertoire (1)

Prerequisite: Demonstrated competence approved by the instructor. Variations (male and female) and pas de deux from standard ballet repertoire are studied and notated. The dancer is given individual coaching, with special attention given to the correction of problems. This course may be repeated for credit. Laboratory fee. (2 Lab.)

#### (DAN) 253 Improvisation (1)

Prerequisite: Dance 156 or 163. This course consists of creative problem-solving utilizing basic elements of design. This course may be repeated for credit. Laboratory fee. (2 Lab.)

#### (DAN) 255 Jazz III (1)

Prerequisite: Dance 156. This course consists of the development of proper performance framing. Complex jazz rhythms, turns, jumps, and intricate elements of choreography are introduced. Laboratory fee. (3 Lab.)

#### (DAN) 256 Jazz IV (1)

Prerequisite: Dance 255. This course is a further exploration of Dance 255. This course may be repeated for credit. Laboratory fee. (3 Lab.)

#### (DAN) 258 Intermediate Ballet I (2)

Prerequisite: Dance 163. The development of ballet techniques is continued. More complicated exercises at the barre and centre floor are included. Emphasis is on long series of movements, adaglo and jumps. Precision of movement is stressed. Laboratory fee. (1 Lec., 3 Lab.)

#### (DAN) 260 Intermediate Ballet II (2)

Prerequisite: Dance 258. This course begins pointe work for women. Specialized beats and tour are begun for men. Individual proficiency and technical virtuosity are developed. This course may be repeated for credit. Laboratory fee. (1 Lec., 3 Lab.)

# DEVELOPMENTAL COMMUNICATIONS

#### (DC) 095 Communication Skills (3)

This course focuses on strengthening language communications. Topics include grammar, paragraph structure, reading skills, and oral communication. Emphasis is on individual testing and needs. (3 Lec.)

#### (DC) 120 Communication Skills (3)

This course is for students with significant communication problems. It is organized around skill development, and students may enroll at any time (not just at the beginning of a semester) upon the referral of an instructor. Emphasis is on individual needs and personalized programs. Special attention is given to oral language. Contacts are made with other departments to provide other ways of learning for the students. (2 Lec., 2 Lab.)

#### DEVELOPMENTAL LEARNING

#### (DL) 094 Learning Skills Improvement (1)

Learning skills are strengthened. Emphasis is on individual needs and personalized programs. This course may be repeated for a maximum of three credits. (2 Lab.)

#### DEVELOPMENTAL MATHEMATICS

Developmental Mathematics courses offer a review of mathematical skills. Developmental Mathematics 093 satisfies prerequisites for Mathematics 101, 111, 115, 116 and 117. Developmental Mathematics 091 satisfies prerequisites for Mathematics 130 and 195.

#### (DM) 090 Pre Algebra Mathematics (3)

This course is designed to develop an understanding of fundamental operations using whole numbers, fractions, decimals, and percentages and to strengthen basic skills in mathematics. The course is planned primarily for students who need to review basic mathematical processes. This is the first three-hour course in the developmental mathematics sequence. (3 Lec.)

#### (DM) 091 Elementary Algebra (3)

Prerequisite: Developmental Mathematics 090 or an appropriate assessment test score. This is a course in introductory algebra which includes operations on real numbers, polynomials, special products and factoring, rational expressions, and linear equations and inequalities. Also covered are graphs, systems of linear equations, exponents, roots, radicals, and quadratic equations. (3 Lec.)

#### (DM) 093 Intermediate Algebra (3)

Prerequisite: One year of high school algebra and an appropriate assessment test score or Developmental Mathematics 091. This course includes further development of the terminology of sets, operations on sets, properties of real numbers, polynomials, rational expressions, linear equations and inequalities, the straight line, systems of linear equations, exponents, roots, and radicals. Also covered are products and factoring, quadratic equations and inequalities, absolute value equations and inequalities, relations, functions, and graphs. (3 Lec.)

#### DEVELOPMENTAL READING

Students can improve their performance in English courses by enrolling in Developmental Reading courses. Developmental Reading 090 and 091 are valuable skill development courses for English 101. Reading 101 is especially helpful in courses that require a considerable amount of collegelevel reading. See the catalog descriptions in reading for full course content.

#### (DR) 090 Basic Reading Skills (3)

Development of comprehension and vocabulary skills, based on Individual needs, is the focus of this course. Basic study skills are introduced. A score of 12 to 19 on the Descriptive Test of Language Skills Reading Comprehension Test would indicate that a student has the reading skills needed for this course. (3 Lec.)

#### (DR) 091 Preparation For College Reading (3)

This course emphasizes development of comprehension and vocabulary skills, according to individual needs. Also included are critical reading, rate flexibility, and basic study skills. A score of 20 to 27 on the Descriptive Test of Language Skills Reading Comprehension Test would indicate that a student has the reading skills needed for this course. (3 Lec.)

#### **DEVELOPMENTAL WRITING**

Students can improve their writing skills by taking Developmental Writing. These courses are offered for one to three hours of credit.

#### (DW) 090 Developmental Writing (3)

This course introduces the writing process. Course topics include practice in getting ideas, writing and rewriting, making improvements, and correcting mistakes. A learning lab is available to provide additional assistance. (3 Lec.)

#### (DW) 091 Developmental Writing (3)

This course focuses on the writing process. Course topics include inventing, drafting, revising, and editing multi-paragraph papers. Building reading skills, using resources, developing thinking skills, and improving attitudes toward writing comprise other course topics. A learning lab is available to provide additional assistance. (3 Lec.)

#### (DW) 092 Developmental Writing (1)

This course is a writing workshop designed to support students enrolled in English 101 and other courses requiring writing. (3 Lab.)

# DRAFTING & COMPUTER AIDED DESIGN

#### (DFT) 135 Reproduction Processes (2)

Equipment and processes used to reproduce technical art are studied. Included are the graphic arts process camera, lithographic offset printing, photodrafting, microfilming, photocopying, silk screen printing, printed circuit board etching, thermography, typographics, xerography, engravings, and others. An introduction to computer graphics and desktop publishing is also covered. Lab work includes the preparation of flats for offset printing of brochures. Laboratory fee. (1 Lec., 3 Lab.)

#### (DFT) 136 Geological And Land Drafting (3)

Prerequisites: Drafting 183 or the equivalent and Mathematics 196. Equivalence is based on high school drafting courses or on student's work experience. Sample of drawings and/or high school transcript must be presented. This is a specialty course to prepare one to work in civil drafting. Various drawings are completed, such as relief maps, plan and profile drawings, roadways, pipelines, and petroleum and geophysical maps. Calculations are made from surveyor's notes to plot traverse and contour lines and to determine areas and volume. A set of drawings is prepared for a residential subdivision, a shopping center, or some other type of land development. The use of the computer to produce drawings is encouraged. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 183 Basic Drafting (4)

This course is for students who have had little or no previous experience in drafting. Skill in orthographic, axonometric, and oblique sketching and drawing is developed. Topics include lettering, applied geometry, fasteners, sectioning, tolerancing, and auxiliaries. Experience is provided in using handbooks and other resource materials and in developing design skills. U.S.A.S.I., government, and industrial standards are used. Emphasis is on both mechanical skills and graphic theory. The use of the computer to produce drawings is introduced. Laboratory fee. (2 Lec., 6 Lab.)

#### (DFT) 184 Advanced Mechanical Drafting (3)

Prerequisite: Drafting 183 or the equivalent. Equivalence is based on high school drafting courses or on student's work experience. Samples of drawings and/or a high school transcript must be presented. Drafting problems, design function, and specialized drafting areas are examined. Included are the detailing and assembling of machine parts, gears, cams, jigs, fixtures, metals, and metal forming processes. Drawing room standards and reproduction of drawings are studied. Detail and assembly drawings are made. The use of the computer to produce drawings is encouraged. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 185 Architectural Drafting (4)

This course begins with architectural lettering and drafting of construction details. Emphasis is on technique and use of appropriate material symbols and conventions. Working drawings are prepared, including plans, elevations, sections, and details. Drawings for buildings using steel, concrete, and timber structural components are covered. Reference materials are used to provide skills in locating data and in using handbooks. The use of the computer to produce drawings is encouraged. Laboratory fee. (2 Lec., 6 Lab.)

#### (DFT) 230 Structural Drafting (3)

Prerequisites: Drafting 184 and Mathematics 196. Stresses and thermal and elastic qualities of various materials are studied. Beams, columns, and other materials are included. Structural plans, details, and shop drawings of components are developed for buildings using steel, reinforced concrete, and timber structures. Emphasis is on drafting appropriate drawings for fabrication and erection of structural components. The use of the computer to produce drawings is encouraged. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 231 Electronic Drafting (3)

Prerequisite: Drafting 183. This course focuses on drawings used in the electronics industry. Topics include block and logic diagrams, schematic diagrams, interconnecting wiring diagrams, printed circuit boards, integrated circuits, component packaging, chassis design and current practices. The use of the computer to produce drawings is encouraged. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 232 Technical illustration (3)

Prerequisite: Drafting 183. The rendering of three-dimensional drawings is covered. Orthographic views and engineers' sketches are developed into isometric, dimetric, perspective, and diagrammatic drawings of equipment and their environments. Technical sketching, hand mechanical lettering, air brush retouching of photographs, handling of commercially prepared pressure sensitive materials, and layout of schematics, charts, and graphs are practiced. The use of the computer to produce drawings is encouraged. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 245 Computer Aided Design (3)

Prerequisite: Drafting 183 or the equivalent. Capabilities and limitations of the electronic computer as an aid to the designer are studied. Drafting procedures using an interactive system with computer graphics are practiced. Forms and uses of computer aided products are viewed in perspective with the overall design process. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 248 Advanced CAD-Mechanical (3)

Prerequisites: Drafting 184 and Drafting 245 or the equivalent. Advanced uses of the electronic computer as an aid to the designer are studied. Special emphasis is given to three- dimensional design, specifically mechanical. Menu and library construction will be practiced while using the interactive graphic systems. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 252 Advanced Computer Aided Design (3)

Advanced CAD software for personal computers is studied. Increasing productivity of computer drafting and design systems through task analysis and the creation of menus, macros, and programmed routines is the emphasis in this course. Extracting data from drawings containing blocks with attributes is also covered. Laboratory fee. (2 Lec., 4 Lab.)

#### (DFT) 704 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Drafting and Computer Aided Design program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of an introduction to cooperative education, orientation to learning on the job, writing the learning plan, college resources available, and college degree plans. (1 Lec., 20 Lab.)

#### (DFT) 714 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Drafting and Computer Aided Design program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of the world of education, work and retirement; setting goals; writing a resume; and how to look for a job. (1 Lec., 20 Lab.)

#### (DFT) 803 Cooperative Work Experience (3)

Prerequisites: Completion of two courses in the Drafting and Computer Aided Design program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of transitions in life, communication skills, performance appraisals, and effective use of power. (1 Lec., 15 Lab.)

#### (DFT) 813 Cooperative Work Experience (3)

Prerequisites: Completion of two courses in the Drafting and Computer Aided Design program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of human potential, motivation, what to look for in a career, and trends in drafting occupations. (1 Lec., 15 Lab.)

#### **ECONOMICS**

#### (ECO) 201 Principles Of Economics I (3)

Sophomore standing is recommended. The principles of macroeconomics are presented. Topics include economic organization, national income determination, money and banking, monetary and fiscal policy, macroeconomic applications of international trade and finance, economic fluctuations, and growth. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (ECO) 202 Principles Of Economics II (3)

Prerequisite: Economics 201 or demonstrated competence approved by the instructor. The principles of microeconomics are presented. Topics include the theory of demand, supply, and price of factors. Income distribution and theory of the firm are also included. Emphasis is given to microeconomic applications of international trade and finance as well as other contemporary microeconomic problems. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### **ELECTRONICS TECHNOLOGY**

#### (ET) 135 DC-AC Theory And Circuit Analysis (6)

Prerequisite: Credit or concurrent enrollment in Mathematics 195 or the equivalent. This is an accelerated course combining DC circuits (ET 190) and AC circuits (ET 191) in one semester for students with previous electronics experience or a good mathematics background. Topics include the analysis of resistive, capacitive, inductive, and combination circuits. Magnetism, resonance, schematic symbols, and sine wave analysis are also included. Series, parallel, and series-parallel circuits are covered. Laboratory fee. (5 Lec., 3 Lab.)

(ET) 170 Printed Circuit Board Manufacturing (1)
The student will build a working printed circuit board.

The student will build a working printed circuit board. The course will begin with a schematic and parts list and progress through all steps necessary to produce a single sided photographically produced board. Laboratory fee. (1 Lec., 1 Lab.)

#### (ET) 172 Soldering (1)

This course is intended to ensure that the student understands the theory and use of tools and equipment for proper industrial soldering techniques. The prime emphasis is to build the student's skill in soldering. Laboratory fee. (1 Lec., 1 Lab.)

#### (ET) 174 Oscilloscope Utilization (1)

This course will cover all front panel controls on basic laboratory calibrated oscilloscopes. Emphasis will be placed on utilization of oscilloscope in troubleshooting a circuit. Laboratory fee. (1 Lec., 1 Lab.)

# (ET) 190 DC Circuits And Electrical Measurements (4)

The mathematical theory of direct current circuits is presented in combination with laboratory fundamentals. Emphasis is on elementary principles of magnetism, electric concepts and units, diagrams, and resistance. Electromagnetism, series and parallel circuits, simple meter circuits, conductors, and insulators are also stressed. Laboratory fee. (3 Lec., 3 Lab.)

#### (ET) 191 A.C. Circuits (4)

Prerequisites: Electronics Technology 190 and credit or concurrent enrollment in Mathematics 195 or the equivalent. This course covers the fundamental theories of alternating current. The theories are applied in various circuits. Included are laboratory experiments on power factor, sine wave analysis, resonant circuits, capacitance, inductance, Q of coils, magnetism, and resistance. Laboratory fee. (3 Lec., 3 Lab.)

#### (ET) 193 Active Devices (4)

Prerequisites: Electronics Technology 190 and credit or concurrent enrollment in Electronics Technology 191. Semiconductors (active devices) are the focus of this course. Topics include composition, parameters, linear and non-linear characteristics, in-circuit action, amplifiers, rectifiers, and switching. Laboratory fee. (3 Lec., 3 Lab.)

#### (ET) 194 Instrumentation (3)

Prerequisites: Electronics Technology 190 and credit or concurrent enrollment in Electronics Technology 191 and 193. Electrical devices for measurement and instrumentation are studied and applied to work situations. Included are basic AC and DC measurement meters, impedance bridges, oscilloscopes, signal generators, signal-tracers, and tube and transistor testers. The course concludes with a study of audio frequency test methods and equipment. Laboratory fee. (2 Lec., 3 Lab.)

#### (ET) 200 Special Applications Of Electronics (4)

This course is intended for use by any given group of students that desire specific topics to be covered. This course may substitute for any 200 level electronics course with the demonstrated competence approved by the instructor. This course is repeatable for credit as topics vary. Laboratory fee. (3 Lec., 3 Lab.)

# (ET) 210 Basic CRT Display And Television Theory and Service (4)

Prerequisite: Electronics Technology 190, 191, 193 and 194. This course is designed to introduce CRT display and television theory and to give the student hands on experience in basic servicing of all major sections of modern television receivers and CRT displays for computers. Laboratory fee. (3 Lec., 3 Lab.)

# (ET) 231 Special Circuits With Communications Applications (4)

Prerequisites: Electronics Technology 193 and 194. Active devices are applied to circuitry common to most communications equipment. Both the theory of operation and practical applications of the circuits in laboratory experiments are included. Circuits including power supplies, voltage regulators, tuned and untuned amplifiers, filters, oscillators, modulators, and detectors, with application to various types of intelligence transmission and reception are emphasized in the course. Laboratory fee. (3 Lec., 3 Lab.)

# (ET) 232 Analysis Of Electronic Logic And Switching Circuits (4)

Prerequisites: Electronics Technology 193 and 194. The course presents circuitry common to electronic control systems and automatic measuring systems. Typical circuit systems functions covered include clamping, gating, switching, and counting. Circuits include voltage discriminators, multi-vibrators, dividers, counters, and gating circuits. Boolean algebra and binary numbers are reviewed. Emphasis is on semiconductor devices. Fluidic switching devices are introduced. Laboratory fee. (3 Lec., 3 Lab.)

# (ET) 234 Electronic Circuits And Systems (3)

Prerequisites: Completion of all electronics technology courses up to and including Electronics Technology 231; and may take Electronics Technology 232 and Electronics Technology 231 concurrently with Electronics Technology 234. The design, layout construction, and calibration of an electronic project are covered. Students develop independent project and prepare term papers on functions of components, operating specifications and schematics. Laboratory fee. (6 Lab.)

# (ET) 237 Modular Memories And Microprocessors (4)

Prerequisite: Electronics Technology 232. Read only memories (ROM's), random access memories (RAM's) and microprocessors are presented. Emphasis is on specifications, applications, and operation. Control busses data busses, addressing, coding, and programming of typical microprocessor units are included. Micro processor system is tested, coded, and programmed. Laboratory fee. (3 Lec., 3 Lab.)

#### (ET) 238 Linear Integrated Circuits (4)

Prerequisites: Electronics Technology 190, 191, and 193. Differential amplifiers, operational amplifiers, and integrated circuit timers are investigated. Topics include comparators, detectors, inverting and non-inverting amplifiers, OP AMP adders, differentiating and integrating amplifiers, and instrumentation amplifiers. Digital to analog converters, analog to digital converters, special OP AMP applications, and integrated circuits timers are also included. Limitations and specifications of integrated circuits are covered. Laboratory fee. (3 Lec., 3 Lab.)

#### (ET) 239 Microwave Technology (3)

Prerequisites: Electronics Technology 194 and Electronics Technology 231. Microwave concepts such as propagation, transmission lines including waveguides, standing waves, impedance matching, basic antennas and various basic microwave measurements are covered. Microwave measurement techniques such as power and frequency meter measurements and calibration, VSWR determinations, klystron characteristics, and waveguide tuning will be demonstrated. A basic radar system is discussed as time permits. (3 Lec.)

# (ET) 240 Electronic Theory And Application Of Digital Computers (4)

Prerequisites: Mathematics 196 and Electronics Technology 193. The course presents the electronic switching circuits for digital computer systems. Logic symbology, gates, and related Boolean algebra are covered. Computer terminology and number systems are included. An introduction to BASIC language programming for electronic circuit analysis is also included. Laboratory experiments in addition to computer programming include basic logic gate analysis and test procedures. Laboratory fee. (3 Lec., 3 Lab.)

# (ET) 268 Microprocessor Troubleshooting And Interface (4)

Prerequisite: Electronic Technology 267. This course studies troubleshooting techniques on microprocessor, disk controls, CRT controls and interfaces. Emphasis is on hardware troubleshooting and peripheral interface. Laboratory fee. (3 Lec., 3 Lab.)

# (ET) 704 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Electronics Technology, Digital Electronics Technology, or Electronic Telecommunications Technology programs, or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences related to the electronics field. The seminar consists of group or individual meetings with the instructor, individualized plans for job-related or self improvement (i.e. job interview, job application procedures, job site interpersonal relations, employer expectations of employees) or combinations of both. (1 Lec., 20 Lab.)

# (ET) 714 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Electronics Technology, Digital Electronics Technology, or Electronic Telecommunications Technology programs, or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences related to the electronics field. The seminar consists of group or individual meetings with the instructor, individualized plans for job-related or self improvement (i.e. preparation of resumes, changing jobs, supervising subordinates, building self-esteem), or combinations of both. (1 Lec., 20 Lab.)

#### **ENGINEERING**

### (EGR) 106 Descriptive Geometry (3)

Prerequisite: Drafting 183 or Engineering 105. This course provides training in the visualization of three dimensional structures and computer transformations of geometric models. Emphasis is on accurately representing these structures in drawings by analyzing the true relationship between points, lines, and planes. Included are the generation and classification of lines, surfaces, intersections, development, auxiliaries, and revolutions. Laboratory fee. (2 Lec., 4 Lab.)

#### (EGR) 107 Engineering Mechanics I (3)

Prerequisite: Credit or concurrent enrollment in Mathematics 124. This course is a study of the statics of particles and rigid bodies with vector mathematics in three dimensional space. Topics include the equilibrium of forces and force systems, resultants, free body diagrams, friction, centroids and moments of inertia, virtual works, and potential energy. Distributed forces, centers of gravity, and analysis of structures, beams, and cables are also presented. (3 Lec.)

#### (EGR) 186 Manufacturing Processes (2)

This course introduces the student enrolled in technical programs to the many steps involved in manufacturing a product. This is accomplished by involving the class in producing a device with precision. The student gains practical experience with working drawings, a variety of machine tools and the assembly of components. The student is made aware of the factors involved in selecting materials and economical utilization of materials. Laboratory fee. (1 Lec., 2 Lab.)

#### (EGR) 187 Manufacturing Processes (2)

Prerequisite: Engineering 186. This course is a continuing study of the metal-working processes with emphasis on automation, programming and operation of CNC machines. Laboratory fee. (1 Lec., 2 Lab.)

# **ENGINEERING TECHNOLOGY**

(EGT) 141 Basic Hydraulics And Fluid Mechanics (4) Principles of hydraulics and fluid mechanics are examined. Hydraulic pumps, motors, cylinders, and values are studied. Emphasis is on the application of formulas related to the properties of fluids and the laws which govern fluid flow. Various hydraulic components are tested, and basic hydraulic circuits are set up and evaluated. (3 Lec., 3 Lab.)

#### (EGT) 143 Technical Programming (4)

Prerequisite: Mathematics 195 or demonstrated competence approved by the instructor. This course introduces the engineering technician to the world of technology. Skills are developed in using hand calculators and computers to solve engineering problems. Basic computer programming techniques are introduced in the microcomputer laboratory using high-level languages such as BASIC. Laboratory fee. (3 Lec., 3 Lab.)

# (EGT) 222 Fundamentals Of Pneumatics (3)

Pneumatic-power units, pneumatic controls, and pneumatic cylinders are studied. Both construction and operation are covered. Pneumatic circuits, power operated holding devices, safety circuits, and remote controlled circuits are presented. Manual, mechanical, pilot, and solenoid operated circuits are all included. Laboatory fee. (2 Lec., 3 Lab.)

#### (EGT) 225 Advanced Fluid Power Systems (4)

This course examines fluid power systems. Included is the design of hydraulic and pneumatic systems. Circuit calculations are made for force, torque, power, speed, fluid pressure, flow rate, and velocity. Emphasis is on the selection of pumps, cylinders, valves, motors, compressors, filters, and other fluid power components. The set-up, operation, and testing of various fluid power circuits are covered. Laboratory fee. (3 Lec., 3 Lab.)

# (EGT) 228 Amplifier And Analog Control Circuits (4) Prerequisite: Electronics Technology 193. This course treats analog circuits including conventional amplifiers and operational amplifiers. The use of these circuits in controls,

sensing, and testing is stressed. The laboratory emphasis is on application and characteristics of these circuits as applied to electro mechanical controls. Reliance on preassembled or commercially available circuits is emphasized, especially semiconductor and integrated circuits. Laboratory fee. (3 Lec., 3 Lab.)

#### (EGT) 230 Digital Machine Control (4)

Prerequisite: Electronics Technology 191. This course emphasizes electromechanical controls, solid state industrial controls, and programmable controllers. Control components, control and power circuit diagrams, manual and automatic AC and DC machine control, solid state logic elements and programmable controllers are studied. Laboratory fee. (3 Lec., 3 Lab.)

#### (EGT) 232 Applied Mechanics (4)

Prerequisite: Mathematics 196 or the equivalent. The theory and applications of mechanics are presented. Basic static and dynamic concepts are included. Topics include forces, vectors, equilibrium, moments, friction, moment of inertia, rectilinear and angular motion, work, energy and power. The construction, testing and analysis of linkage and drive elements in laboratory supports lecture material on related topics. (3 Lec., 3 Lab.)

#### (EGT) 233 Electrical Machinery (3)

Prerequisite: Electronics Technology 191 or concurrent enrollment in Electronics Technology 191. The theory and function of power electricity, including AC and DC machines. Electrical and mechanical aspects are stressed. The laboratory provides hands-on experience in operation of machinery, quantitative analysis of performance characteristics, electrical measurements on power circuits and demonstration of principles discussed in class. Safety practices are stressed. Laboratory fee. (2 Lec., 3 Lab.)

# (EGT) 239 Principles Of Microcomputer Control (4)

Prerequisite: Electro-Mechanical Technology 242. The control of automated industrial systems with digital elements as subsystems is studied. Included are the functions of the various control elements and their interface with other components. The conversion of control information between analog and binary forms is examined. The use and implementation of logical decision elements are covered. Emphasis is on the operation and function of micro-computers in modern control systems. Laboratory fee. (3 Lec., 3 Lab.)

#### (EGT) 242 Digital Control Circuits (4)

Prerequisite: Electronics Technology 193 or the equivalent. This course covers number systems used in computer systems. Alphanumeric and interchange codes are included. Binary arithmetic, including octal, hexadecimal and BCD, is covered with logic functions and Boolean algebra presented at a conceptual level. Logic gates, flip-flops, registers, encoders, decoders, counters, timing circuits, ALU's and memory units are included. Lecture material is supported by laboratory work. Laboratory fee. (3 Lec., 3 Lab.)

#### (EGT) 243 Robotics I (3)

This course provides an introduction to robot technology. The basic components and systems used in industrial robots are studied. The set-up and operation of robots and associated automatic control systems are emphasized. Laboratory fee. (2 Lec., 3 Lab.)

#### (EGT) 247 Robotics II (3)

Prerequisite: Engineering Technology 243 or demonstrated competence approved by the instructor. This course includes a study of robot end effectors, sensors, programmable controllers, power systems and software. The development of workcells and complete robotic systems is emphasized. Laboratory fee. (2 Lec., 3 Lab.)

# (EGT) 251 Advanced Robotics And Automated Systems (3)

Prerequisite: Engineering Technology 247 or demonstrated competence approved by the instructor. In this course, the student will interface industrial robots with programmable controllers and other types of equipment used in automated manufacturing. An introduction to Computer Integrated Manufacturing and Artificial Intelligence related to robotics is included. Hands-on laboratory work is emphasized. Laboratory fee. (2 Lec., 3 Lab.)

# (EGT) 268 Microprocessor Interfacing And Troubleshooting (4)

Prerequisite: Engineering Technology 239. This course is a study of microcomputer hardware interface concepts and necessary input/output software. An overall system approach is used to learn practical troubleshooting techniques that are applicable to any microprocessor system. Actual troubleshooting tools are used. Laboratory fee. (3 Lec., 3 Lab.)

### (EGT) 701 Cooperative Work Experience (1)

Prerequisites: Completion of two courses in the Engineering Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of discussions on the writing of effective competency-based learning objectives and other work related skills such as time management, resume writing, and human relations. (1 Lec., 5 Lab.)

# (EGT) 702 Cooperative Work Experience (2)

Prerequisites: Completion of two course in the Engineering Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of discussions on the writing of effective competency-based learning objectives and other work related skills such as time management, resume writing, and human relations. (1 Lec., 10 Lab.)

# (EGT) 703 Cooperative Work Experience (3)

Prerequisites: Completion of two courses in the Engineering Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of discussions on the writing of effective competency-based learning objectives and other work related skills such as time management, resume writing, and human relations. (1 Lec., 15 Lab.)

# (EGT) 704 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Engineering Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of discussions on the writing of effective competency-based learning objectives and other work related skills such as time management, resume writing, and human relations. (1 Lec., 20 Lab.)

#### **ENGLISH**

(Also see Developmental Reading and Developmental Writing.) Additional instruction in writing and reading is available through the Learning Skills Center.

#### (ENG) 101 Composition i (3)

Prerequisite: An appropriate assessment test score (ACT, DCCCD test, or SAT). This course focuses on student writing. It emphasizes reading and analytical thinking and introduces research skills. Students practice writing for a variety of audiences and purposes. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (ENG) 102 Composition II (3)

Prerequisite: English 101. In this course students refine the writing, research, and reading skills introduced in English 101. A related goal is the development of critical thinking skills. Writing assignments emphasize argumentation and persuasion. Students will also write a formal research paper. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### **English In The Sophomore Year**

English 201, 202, 203, 204, 205, 206, 215, and 216 are independent units of three credit hours each, from which any combination of two will be selected to satisfy degree requirements in sophomore English.

#### (ENG) 201 British Literature (3)

Prerequisite: English 102. This course includes significant works of British writers from the Old English Period through the 18th century. (3 Lec.)

#### (ENG) 202 British Literature (3)

Prerequisite: English 102. This course includes significant works of British writers from the Romantic Period to the present. (3 Lec.)

#### (ENG) 203 World Literature (3)

Prerequisite: English 102. This course includes significant works of Continental Europe and may include works from other cultures. It covers the Ancient World through the Renaissance. (3 Lec.)

#### (ENG) 204 World Literature (3)

Prerequisite: English 102. This course includes significant works of Continental Europe and may include selected works of other cultures from the Renaissance to the present. (3 Lec.)

#### (ENG) 205 American Literature (3)

Prerequisite: English 102. This course includes significant works of American writers from the Colonial through the Romantic Period. (3 Lec.)

### (ENG) 206 American Literature (3)

Prerequisite: English 102. This course includes significant works of American writers from the Realistic Period to the present. (3 Lec.)

#### (ENG) 209 Creative Writing (3)

Prerequisite: English 102. The writing of fiction is the focus of this course. Included are the short story, poetry, and short drama. (3 Lec.)

# (ENG) 210 Technical Writing (3)

Prerequisites: English 101 and English 102. The technical style of writing is introduced. Emphasis is on the writing of technical papers, reports, proposals, progress reports, and descriptions. (3 Lec.)

#### (ENG) 215 Studies In Literature (3)

Prerequisite: English 102. This course includes selections in literature organized by genre, period, or geographical region. Course descriptions are available each semester prior to registration. This course may be repeated for credit. (3 Lec.)

# (ENG) 216 Studies in Literature (3)

Prerequisite: English 102. This course includes selections in literature organized by theme, interdisciplinary content or major author. Course titles and descriptions are available each semester prior to registration. This course may be repeated for credit. (3 Lec.)

# **ENGLISH AS A SECOND LANGUAGE**

The English-as-a-Second Language (ESL) credit curriculum is designed to develop students' language proficiency in the areas of listening, speaking, reading, and writing. The plan of study consists of thirteen courses divided into three skill areas and four levels (Listening-Conversation, Reading, and Writing). The student enters the program by taking the Michigan Test of English Language Proficiency (MTELP). (The Michigan Test of Aural Comprehension, the MTAC, is used optionally on each campus.) The credit ESL curriculum is designed to interface both with Continuing Education ESL programs and with developmental studies or college level programs on each campus.

#### (ESL) 031-034 (Listening-Conversation)

These courses prepare students to communicate orally in English. They can (but do not necessarily) precede the Reading (ESL 041-044) and Writing (ESL 051-054, ESL 063) courses.

#### (ESL) 041-044 (Reading)

These courses prepare a student for reading English in daily life and for reading college textbooks. ESL students needing additional academic preparation should enroll for regular Developmental Reading courses upon completion of the ESL-Reading program.

#### (ESL) 051-054 (Writing)

These courses are designed to help students increase fluencey and build confidence in writing. The courses focus on writing as a process. Through inventing, drafting, and revising, students write for specific audiences and purposes.

#### (ESL) 061-064 (Grammar)

These courses are designed to complement the ESL 051-054 writing series. They provide instruction and practice with discrete grammar points necessary for effective writing.

# INGLES COMO SEGUNDO IDIOMA

El programa de credito de Ingles-Como-Segundo. Idioma (ESL) esta disenado para proporcionar al estudiante la habilidad de ser diestro en el desarrollo del idioma Ingles en las areas de escuchar, conversar, leer y escribir. El plan de estudio consiste de Trece cursos divididos en tres secciones y cuatro niveles: eseuchar-conversar, leer y escribir. El estudiante inicia el programa tomando un examen llamado Michigan Test of English Language Profiency (MTELP) (Examen Michigan para la evaluacion de la destreza en el idioma Ingles). (El examen Michigan para la evaluacion de la comprension auditiva (MTAC) es utilizado opcionalmente por cada uno de los colegios). El programa de ESL se entrelaza con los programas de Educacion Continua (Continuing Education) y con los programas de Desarrollo o de nivel de educacion superior en cada uno de los colegios.

# (ESL) 031-034 (Escuchar y Conversar)

Estos cursos preparan al estudiante a comunicarse oralmente en ingles. Estos pueden (pero no necesariamente) preceder a los cursos de Lectura (ESL 041-044) y Escritura (ESL 051-054, ESL 063).

#### (ESL) 041-044 (Lectura)

Estos cursos preparan al estudiante en la lectura del ingles en la vida diaria y a leer libros de texto en nivel de educacion superior. Por lo tanto los estudiantes que necesiten preparacion academica adicional se les recomienda inscribirse en cursos regulares de Desarrollo de la Lectura (Developmental Reading) una vez concluidos los cursos de Lectura de ESL (ESL-Reading).

# (ESL) 051, (ESL) 052, (ESL) 053, (ESL) 054

Estos cursos estan disenados con el objeto de ayudar los alumnos a obtener fluidez y confianza en escritura. Los cursos se enfocan en el proceso de escritura. A traves de crear, planear y revisar, los estudiantes produciran escritos para diferentes audiencias y con diversos propositos.

# **ENGLISH-AS-A-SECOND LANGUAGE**

# (ESL) 031 ESL Conversation - Listening (3)

This course is designed to develop academic and social skills needed to speak and understand English more effectively in school, in the market place, and in social situations. (3 Lec.)

# (ESL) 032 ESL Conversation - Listening (3)

This course strengthens competencies initiated in ESL031. Special emphasis is placed on academic listening and speaking skills. (3 Lec.)

# (ESL) 033 ESL Conversation - Listening (3)

This course is designed to improve formal and informal conversation skills including listening comprehension, note-taking, oral reporting, and class discussion techniques. (3 Lec.)

# (ESL) 034 ESL Conversation - Listening (3)

This course develops academic, professional, and social aural/oral skills. Emphasis is placed on analysis and critical thinking in English. (3 Lec.)

#### (ESL) 041 ESL Reading (3)

This course focuses on language development through reading activities. It includes reading comprehension, vocabulary, and word recognition. (3 Lec.)

# (ESL) 042 ESL Reading (3)

This course is designed for students needing more practice in the skills and information introduced in ESL 041. Topics include reading comprehension, vocabulary development, word recognition, language and culture. (3 Lec.)

#### (ESL) 043 ESL Reading (3)

This course covers pre-reading strategy, specific reading comprehension skills, critical reading skills, vocabulary development, idioms, and use of the dictionary and library. (3 Lec.)

# (ESL) 044 ESL Reading (3)

This course is designed for students needing more practice in the skills and information introduced in ESL 043. Topics include pre-reading strategies, specific reading comprehension skills, critical reading skills, vocabulary development, idioms, and use of the dictionary and library. (3 Lec.)

# (ESL) 051 ESL Writing (3)

This course stresses the creation of sentences and groups of sentences. It also introduces basic spelling rules and vocabulary development. (3 Lec.)

### (ESL) 052 ESL Writing (3)

This course introduces the development of controlled and guided paragraphs using a variety of organizational structures and stresses logic patterns of English. (3 Lec.)

### (ESL) 053 ESL Writing (3)

This course stresses the process of paragraph writing and the characteristics of effective paragraph structure. It also introduces modes of discourse such as description, causeeffect, and comparison-contrast. (3 Lec.)

#### (ESL) 054 ESL Writing (3)

This course emphasizes modes of discourse in expository writing for academic purposes. Particular attention is given to improving unity, coherence, transition, and style as students progress to multi-paragraph compositions. Paraphrasing and summarizing are also introduced. (3 Lec.)

### (ESL) 061 ESL Grammar (3)

This course introduces the basic aspects of English grammar needed to write simple and compound sentences. It includes the study of basic verb tenses, parts of speech, subject-verb agreement, and question formation. (3 Lec.)

#### (ESL) 063 ESL Grammar (3)

This course reviews grammar points studied in ESL 061 and ESL 062 and introduces elements necessary for students to write effective one-paragraph essays. It continues the study of verb tenses, parts of speech, and modals and introduces adverb, adjective, and noun clauses. (3 Lec.)

#### **FRENCH**

#### (FR) 101 Beginning French (4)

The essentials of grammar and easy idiomatic prose are studied. Emphasis is on pronunciation, comprehension, and oral expression. Laboratory fee. (3 Lec., 2 Lab.)

#### (FR) 102 Beginning French (4)

Prerequisite: French 101 or the equivalent. This course is a continuation of French 101. Emphasis is on idiomatic language and complicated syntax. Laboratory fee. (3 Lec., 2 Lab.)

#### (FR) 201 Intermediate French (3)

Prerequisite: French 102 or the equivalent. Reading, composition, and intense oral practice are covered in this course. Grammar is reviewed. (3 Lec.)

#### (FR) 202 Intermediate French (3)

Prerequisite: French 201 or the equivalent. This course is a continuation of French 201. Contemporary literature and composition are studied. (3 Lec.)

#### **GEOGRAPHY**

### (GPY) 101 Physical Geography (3)

The physical composition of the earth is surveyed. Topics include weather, climate, topography, plant and animal life, land, and the sea. Emphasis is on the earth in space, use of maps and charts, and place geography. (3 Lec.)



# (GPY) 102 Economic Geography (3)

The relation of humans to their environment is studied. Included is the use of natural resources. Problems of production, manufacturing, and distributing goods are explored. Primitive subsistence and commercialism are considered. (3 Lec.)

#### **GEOLOGY**

#### (GEO) 101 Physical Geology (4)

This course is for science and non-science majors. It is a study of earth materials and processes. Included is an introduction to geochemistry, geophysics, the earth's interior, and magnetism. The earth's setting in space, minerals, rocks, structures, and geologic processes are also included. Laboratory fee. (3 Lec., 3 Lab.)

#### (GEO) 102 Historical Geology (4)

This course is for science and non-science majors. It is a study of earth materials and processes within a developmental time perspective. Fossils, geologic maps, and field studies are used to interpret geologic history. Laboratory fee. (3 Lec., 3 Lab.)

#### (GEO) 103 Introduction To Oceanography (3)

The physical and chemical characteristics of ocean water, its circulation, relationship with the atmosphere, and the effect on the adjacent land are investigated. The geological development of the ocean basins and the sediment in them is also considered. Laboratory fee. (2 Lec., 2 Lab.)

#### (GEO) 205 Field Geology (4)

Prerequisites: Eight credit hours of geology or demonstrated competence approved by the instructor. Geological features, landforms, minerals, and fossils are surveyed. Map reading and interpretation are also included. Emphasis is on the identification, classification and collection of specimens in the field. This course may be repeated for credit. (3 Lec., 3 Lab.)

# (GEO) 207 Geologic Field Methods (4)

Prerequisites: Geology 101 and 102. This course covers basic geologic and topographic mapping, observation of geologic structures, and examination of petrologic systems in an actual field setting. Students will spend a major portion of the course collecting data for and constructing topographic and geologic maps and geologic cross sections and columns. (3 Lec., 3 Lab.)

# **GOVERNMENT**

#### (GVT) 201 American Government (3)

Prerequisite: Sophomore standing recommended. This course is an introduction to the study of political science. Topics include the origin and development of constitutional democracy (United States and Texas), federalism and intergovernmental relations, local governmental relations, local government, parties, politics, and political behavior. (This course is offered on campus and may be offered via television.) (3 Lec.)

# (GVT) 202 American Government (3)

Prerequisite: Sophomore standing recommended. The three branches of the United States and Texas government are studied. Topics include the legislative process, the executive and bureaucratic structure, the judicial process, civil rights and liberties, and domestic policies. Other topics include foreign relations and national defense. (This course is offered on campus and may be offered via television.) (3 Lec.)

(GVT) 211 Introduction To Comparative Politics (3)
A comparative examination of governments, politics, problems and policies with illustrative cases drawn from a variety of political systems. (3 Lec.)

#### **HISTORY**

# (HST) 101 History Of The United States (3)

The history of the United States is presented, beginning with the European background and first discoveries. The pattern of exploration, settlement, and development of institutions is followed throughout the colonial period and the early national experience to 1877. (This course is offered on campus and may be offered via television.) (3 Lec.)

# (HST) 102 History Of The United States (3)

The history of the United States is surveyed from the Reconstruction era to the present day. The study includes social, economic, and political aspects of American life. The development of the United States as a world power is followed. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (HST) 103 World Civilizations (3)

This course presents a survey of ancient and medieval history with emphasis on Asian, African, and European cultures. (3 Lec.)

### (HST) 104 World Civilizations (3)

This course is a continuation of History 103. The modern history and cultures of Asia, Africa, Europe, and the Americas, including recent developments, are presented. (3 Lec.)

#### (HST) 105 Western Civilization (3)

The civilization in the West from ancient times through the Enlightenment is surveyed. Topics include the Mediterranean world, including Greece and Rome, the Middle Ages, and the beginnings of modern history. Particular emphasis is on the Renalssance, Reformation, the rise of the national state, the development of parliamentary government, and the influences of European colonization. (3 Lec.)

#### (HST) 106 Western Civilization (3)

This course is a continuation of History 105. It follows the development of civilization from the Enlightenment to current times. Topics include the Age of Revolution, the beginning of industrialism, 19th century, and the social, economic, and political factors of recent world history. (3 Lec.)

# (HST) 110 The Heritage Of Mexico (3)

This course (cross-listed as Anthropology 110) is taught in two parts each semester. The first part of the course deals with the archaeology of Mexico beginning with the first humans to enter the North American continent and culminating with the arrival of the Spanish in 1519 A.D. Emphasis is on archaic cultures, the Maya, the Toltec, and the Aztec empires. The second part of the course deals with Mexican history and modern relations between the United States and Mexico. The student may register for either History 110 or Anthropology 110, but may receive credit for only one of the two. (3 Lec.)

# (HST) 112 Latin American History (3)

This course presents developments and personalities which have influenced Latin American history. Topics include Indian cultures, the Conquistadors, Spanish administration, the wars of independence, and relations with the United States. A brief survey of contemporary problems concludes the course. (3 Lec.)

### (HST) 205 Advanced Historical Studies (3)

Prerequisite: Six hours of history. An in-depth study of minority, local, regional, national, or international topics is presented. (3 Lec.)

# **HUMAN DEVELOPMENT**

#### (HD) 100 Educational Alternatives (1)

The learning environment is introduced. Career, personal study skills, educational planning, and skills for living are all included. Emphasis is on exploring career and educational alternatives and learning a systematic approach to decision- making. A wide range of learning alternatives is covered, and opportunity is provided to participate in personal skills seminars. This course may be repeated for credit. (1 Lec.)

# (HD) 104 Educational And Career Planning (3)

This course is designed to teach students the on-going process of decision-making as it relates to career/life and educational planning. Students identify the unique aspects of themselves (interests, skills, values). They investigate possible work environments and develop a plan for personal satisfaction. Job search and survival skills are also considered. (3 Lec.)

# (HD) 105 Basic Processes Of Interpersonal Relationships (3)

This course is designed to help the student develop a self-awareness that will enable him/her to relate more effectively to others. Students are made aware of their feelings, values, attitudes, verbal and non-verbal behaviors. The course content, which utilizes an experiential model, also focuses on developing communication and problem-solving skills. (3 Lec.)

### (HD) 106 Personal And Social Growth (3)

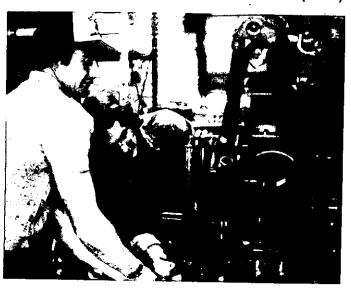
This course focuses on the interactions between the individual and the social structures in which he lives. Roles, social influences and personal adjustments to the world around us are explored in readings and classroom discussion. Human behavior, the diversity of lifestyles and the components of a healthy personality are studied in an effort to develop a pattern for growth that demonstrates a responsibility to self and society. (3 Lec.)

# (HD) 107 Developing Leadership Behavior (3)

The basic purpose of this course is to help the student develop leadership and human relation skills. Topics include individual and group productivity, value systems, appropriate communication skills, and positive attitudes in a group environment. The concepts of leadership are explored through both theory and practice. These leadership activities can be applied to the student's personal, business, and professional interactions. (3 Lec.)

# (HD) 110 Assessment Of Prior Learning (1)

Prerequisite: Limited to students in Technical-Occupational Programs. Demonstrated competence approved by the instructor is required. This course is designed to assist students in documenting prior learning for the purpose of applying for college credit. Students develop a portfolio which includes a statement of educational/career goals, related non-collegiate experiences which have contributed to college-level learning, and documentation of such experiences. This course may be repeated for credit. (1 Lec.)



#### **HUMANITIES**

(HUM) 101 Introduction To The Humanities (3) Introduction to the Humanities focuses on the study and appreciation of the fine and performing arts and the ways in which they reflect the values of civilizations. (This course is offered on campus and may be offered via television. Laboratory fee required for television course.) (3 Lec.)

#### (HUM) 102 Advanced Humanities (3)

Prerequisite: Humanities 101 or demonstrated competence approved by the instructor. Human value choices are presented through the context of the humanities. Universal concerns are explored, such as a person's relationship to self and to others and the search for meaning. The human as a loving, believing and hating being is also studied. Emphasis is on the human as seen by artists, playwrights, filmmakers, musicians, dancers, philosophers, and theologians. The commonality of human experience across cultures and the premises for value choices are also stressed. (3 Lec.)

#### **JOURNALISM**

(JN) 101 Introduction To Mass Communications (3) This course surveys the field of mass communications. Emphasis is on the role of mass media in modern society. (3 Lec.)

# **MACHINE SHOP**

#### (MS) 133 Basic Lathe (5)

Practical experience is provided in the use of hand tools, layout, and hand threading. Various types of drill press work and engine lathe operations are introduced. Emphasis is on safety measures. The types and uses of machine oils, greases, coolants, and cutting oils are also included. Laboratory fee. (1 Lec., 8 Lab.)

#### (MS) 134 Basic Milling Machine (5)

This course focuses on hand threading. Drill press work and milling machine operations are presented. Machine parts, cutters, and arbors are covered. Emphasis is on safety measures. The types and uses of machine oils, greases, coolants, and cutting oils are also included. Laboratory fee. (1 Lec., 8 Lab.)

#### (MS) 135 Intermediate Lathe (5)

Prerequisite: Machine Shop 133. This course is the intermediate study of the engine lathe. Workpieces are more complicated and tolerances more exacting. Various machines and work holding methods are used. Precision layout and measuring tools are used. Precision layout and measuring tools are introduced. Additional work in determining cutting speeds and feeds is also included. Laboratory fee. (1 Lec., 8 Lab.)

# (MS) 136 Intermediate Milling Machine (5)

Prerequisite: Machine Shop 134. This course is the intermediate study of the milling machine. Workpieces are more complicated and tolerances more exacting. Various machines and work holding methods are used. Precision layout and measuring tools are introduced. Additional work in determining cutting speeds and feeds is also included. Laboratory fee. (1 Lec., 8 Lab.)

#### (MS) 145 Special Topics (1)

This course is for those people who are working as machinists, toolmakers, diemakers, etc., who wish to review old or little used skills or to acquire skills needed in today's rapidly changing metal working field. This course may be repeated for credit when the topics vary. Laboratory fee. (1 Lec.)

# (MS) 151 Basic Machine Operation For Weld Tooling (3)

Simple weld tooling is studied. Shop safety is stressed. Actual weld fixture components and weld fixtures are made using engine lathes, the milling machine, and drill presses. Laboratory fee. (1 Lec., 4 Lab.)

#### (MS) 233 Advanced Lathe (5)

This course is the advanced study of the engine lathe. Skill is developed in making open setups and in locating holes by means of layout and triangulation. Various attachments and accessories are used. Surface grinding and grinding wheel safety are introduced. Laboratory fee. (1 Lec., 8 Lab.)

# (MS) 234 Advanced Milling Machine (5)

This course is the advanced study of the milling machine. Skill is developed in making open setups and in locating holes by means of layout and triangulation. Various attachments and accessories are used. Surface grinding and grinding wheel safety are introduced. Laboratory fee. (1 Lec., 8 Lab.)

#### (MS) 235 Applied Lathe (5)

Students are encouraged to take Machine Shop 236 concurrently with Machine Shop 235. In this course the student must independently carry out assignments on the lathe. Emphasis is on the interchangeability of workpieces, fits, and finishes. Initiative and ingenuity are encouraged. Tool and cutter grinding is introduced. Laboratory fee. (1 Lec., 8 Lab.)

#### (MS) 236 Applied Milling Machine (5)

The student is encouraged to take Machine Shop 235 concurrently with Machine Shop 236. In this course the student must independently carry out assignments on the milling machine. Emphasis is on the interchangeability of workpleces, fits, and finishes. Initiative and ingenuity are encouraged. Tool and cutter grinding is introduced. Laboratory fee. (1 Lec., 8 Lab.)

#### (MS) 702 Cooperative Work Experience (2)

Prerequisite: Completion of two courses in the Machine Shop program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include job interview and job application techniques, job site interpersonal relations, and employer expectations of employees. (1 Lec., 10 Lab.)

# (MS) 704 Cooperative Work Experience (4)

Prerequisite: Completion of two courses in the Machine Shop program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include job interview and job application techniques, job site interpersonal relations, and employer expectations of employees. (1 Lec., 20 Lab.)

# (MS) 712 Cooperative Work Experience (2)

Prerequisite: Completion of two courses in the Machine Shop program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include preparation of resumes, changing jobs, supervising subordinates, and building self-esteem. (1 Lec., 10 Lab.)

# (MS) 714 Cooperative Work Experience (4)

Prerequisite: Completion of two courses in the Machine Shop program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. The seminar consists of topics which include preparation of resumes, changing jobs, supervising subordinates, and building self-esteem. (1 Lec., 20 Lab.)

# **MANAGEMENT**

# (MGT) 136 Principles Of Management (3)

This course emphasizes the managerial functions of planning, organizing, staffing, directing, and controlling. Communication, motivation, leadership, and decision making are included. (This course is offered on campus and may be offered via television.) (3 Lec.)

# (MGT) 153 Small Business Management (3)

Small Business Management presents an introductory view of the basic entrepreneurial strategies for planning, financing, establishing, and operating a small business. Resources for both initial start-up and day-to-day operations are emphasized including market research, site selection, and such services as financial, legal, and accounting. (3 Lec.)

# (MGT) 160 Principles Of Purchasing (3)

An introduction to the purchasing function is provided. The course covers purchasing tasks and responsibilities, analytical' techniques in buying, organizational interrelationships and coordination, measurement and control, and legal implications. Special emphasis is placed on the five tenets of buying: quality, quantity, time, price and source. (3 Lec.)

#### (MGT) 171 Introduction To Supervision (3)

This course is a study of today's supervisors and their problems. The practical concepts of modern-day, first-line supervision are described. Emphasis is on the supervisor's major functions, such as facilitating relations with others, leading, motivating, communicating, and counseling. (3 Lec.)

# (MGT) 210 Small Business Capitalization, Acquisition And Finance (3)

Prerequisite: Accounting 201 or demonstrated competence approved by instructor. The student studies alternative strategies of financial planning, capitalization, profits, acquisition, ratio analysis, and other related financial operations required of small business owners. The preparation and presentation of a loan proposal are included. (3 Lec.)

# (MGT) 211 Small Business Operations (3)

Skills in decision making necessary for the operation of a small business are covered. Topics include strategic planning, forecasting, organizational structure, and the expansion of such business functions as human resources, marketing, finance and accounting, purchasing, and control processes. (3 Lec.)

#### (MGT) 212 Special Problems In Business (1)

Each student will participate in the definition and analysis of current business problems. Special emphasis will be placed on relevant problems and pragmatic solutions that integrate total knowledge of the business process in American society. This course may be repeated for credit up to a maximum of three credit hours. (1 Lec.)

#### (MGT) 237 Organizational Behavior (3)

The persisting human problems of administration in modern organizations are covered. The theory and methods of behavioral science as they relate to organizations are included. (3 Lec.)

# (MGT) 242 Human Resources Management (3)

This course presents the fundamentals, theories, principles, and practices of people management. Emphasis is on people and their employment. Topics include recruitment, selection, training, job development, interactions with others, labor/management relations, and government regulations. The managerial functions of planning, organizing, staffing, directing, and controlling are also covered. (3 Lec.)

# (MGT) 244 Problem Solving And Decision-Making (3)

The decision-making process and problem-solving as key components are the focus of this course. Topics include: individual, group, and organizational decision-making; logical and creative problem-solving techniques; and the use of decision aids by managers. Application of theory is provided by experiential activities such as small group discussions, case studies, and simulations. (3 Lec.)

# (MGT) 275 International Business And Trade (3)

The techniques for entering the international marketplace are covered. Topics include the impact of socio-cultural, demographic, economic, legal, technological, and political factors upon the development of international marketing strategies. Market behavior and trends, forecasting, pricing, and distribution are also included. (3 Lec.)

# (MGT) 276 International Marketing Management (3)

Opportunities for international trade are explored. Topics include patterns of world trade, the foreign trade environment, internationalization of the firm, and the development of international export/import marketing and financial plan. (3 Lec.)



# (MGT) 277 Comparative Management (3)

Cross-cultural comparisons of management practices are made. Emphasis is placed upon geographic distinctions and cultural antecedents that affect behavior and the effects of socio- cultural, economic, and political environments upon communication and decision making. (3 Lec.)

# (MGT) 704 Cooperative Work Experience (4)

Prerequisite: Previous credit in or concurrent enrollment in Management 171 or demonstrated competence approved by the instructor. This course is designed to develop the student's managerial skills through the completion of a written competency- based learning plan describing varied student learning objectives and planned work experience. Emphasis is on improving leadership skills and goal-setting. (1 Lec., 20 Lab.)

#### (MGT) 714 Cooperative Work Experience (4)

Prerequisite: Previous credit in or concurrent enrollment in Management 242 or demonstrated competence approved by the instructor. This course is designed to develop the student's managerial skills through the completion of a written competency-based learning plan describing varied student learning objectives and planned work experience. Emphasis is on the role of managers in job analysis/job descriptions and interviewing techniques. (1 Lec., 20 Lab.)

# (MGT) 804 Cooperative Work Experience (4)

Prerequisite: Previous credit in or concurrent enrollment in Management 237 or demonstrated competence approved by the instructor. This course is designed to develop the student's managerial skills through the completion of a written competency-based learning plan describing varied student learning objectives and planned work experience. Emphasis is on improving motivational techniques and communicating. (1 Lec., 20 Lab.)

# (MGT) 814 Cooperative Work Experience (4)

Prerequisite: Previous credit in or concurrent enrollment in Management 244 or demonstrated competence approved by the instructor. This course is designed to develop the competency- based learning plan describing varied student learning objectives and planned work experience. Emphasis is on individual and group decision-making and rational and creative problem solving. (1 Lec., 20 Lab.)

# POSTAL SERVICE ADMINISTRATION

# (PSA) 110 Introduction To Postal Service (3)

This course depicts and compares the private, corporate, and government agencies which have been responsible for mail services throughout the world. The current U.S. Postal Organization, mandated by public law, is studied as well as postal philosophy, policies, procedures, rules, regulations, planning, and organization cost control. (3 Lec.)

### (PSA) 120 Mail Processing (3)

Through discussions of mail processing and transportation procedures of the U.S. Postal Service, this course will provide the student with an in-depth view of flow characteristics involved in movement of mail from sender to recipient. The course will also include a study of the systems devised to attain maximum efficiency in mail handling with a minimum of errors. (3 Lec.)

### (PSA) 122 Customer Services (3)

This course provides functional information about mail delivery and collection systems and in-depth information about services provided for postal customers. Included in the course are rural and city delivery/systems, marketing of postal products and service, and techniques of effective public relations. (3 Lec.)

#### (PSA) 216 Postal Management (3)

This course will provide an overview of the laws and practices leading to the current labor situation in the postal service. Discussion will focus on the Equal Employment Opportunity Act, the development of labor unions, national and local agreements, grievance procedures and disciplinary action procedures. The student is given an opportunity to apply practical Postal Service and management theories in system analysis, problem solving grids and other tools of management decision making to arrive at solutions of Postal Service problems. (3 Lec.)

# **MARKETING**

# (MKT) 137 Principles Of Retailing (3)

The operation of the retail system of distribution is examined. Topics include consumer demand, requirements, computer use, store location and layout, and credit policies. Interrelationships are emphasized. (3 Lec.)

#### (MKT) 206 Principles Of Marketing (3)

The scope and structure of marketing are examined. Marketing functions, consumer behavior, market research, sales forecasting, and relevant state and federal laws are analyzed. (3 Lec.)

#### (MKT) 230 Salesmanship (3)

The selling of goods and ideas is the focus of this course. Buying motives, sales psychology, customer approach, and sales techniques are studied. (3 Lec.)

# (MKT) 233 Advertising And Sales Promotion (3)

This course introduces the principles, practices, and media of persuasive communication. Topics include buyer behavior, use of advertising media, and methods of stimulating sales people and retailers. The management of promotion programs is covered, including goals, strategies, evaluation, and control of promotional activities. (3 Lec.)

#### **MATHEMATICS**

(See Developmental Mathematics also. Supplementary instruction in mathematics is available through the Learning Resources Center.)

#### (MTH) 101 College Algebra (3)

Prerequisites: Two years of high school algebra and an appropriate assessment test score or Developmental Mathematics 093. This course is a study of relations and functions including polynomial, rational, exponential, logarithmic, and special functions. Other topics include variation, complex numbers, systems of equations and inequalities, theory of equations, progressions, the binomial theorem, proofs, and applications. (3 Lec.)

#### (MTH) 102 Plane Trigonometry (3)

Prerequisite: Mathematics 101 or equivalent. This course is a study of angular measures, functions of angles, identities, solutions of triangles, equations, inverse trigonometric functions, and complex numbers. (3 Lec.)

# (MTH) 111 Mathematics For Business And Economics I (3)

Prerequisites: Two years of high school algebra and an appropriate assessment test score or Developmental Mathematics 093. This course includes equations, inequalities, matrices, linear programming; linear, quadratic, polynomial, rational, exponential, and logarithmic functions; and probability. Applications to business and economics problems are emphasized. (3 Lec.)

# (MTH) 112 Mathematics For Business And Economics II (3)

Prerequisite: Mathematics 111. This course includes limits, differential calculus, integral calculus, and appropriate applications. (3 Lec.)

#### (MTH) 115 College Mathematics I (3)

Prerequisites: Two years of high school algebra and an appropriate assessment test score or Developmental Mathematics 093. Designed for liberal arts students, this course includes the study of sets, logic, sets of numbers, and mathematical systems. Additional topics will be selected from mathematics of finance, introduction to computers, introduction to statistics, and introduction to matrices. Recreational and historical aspects of selected topics are also included. (3 Lec.)

# (MTH) 116 College Mathematics II (3)

Prerequisites: Two years of high school algebra and an appropriate assessment test score or Developmental Mathematics 093. Designed for liberal arts students, this course includes the study of algebra, linear programming, permutations, combinations, probability, and geometry. Recreational and historical aspects of selected topics are also included. (3 Lec.)

#### (MTH) 121 Analytic Geometry (3)

Prerequisite: Mathematics 102 or equivalent. This course is a study of the real numbers, distance, the straight line, conics, transformation of coordinates, polar coordinates, parametric equations, and three-dimensional space. (3 Lec.)

#### (MTH) 124 Calculus I (5)

Prerequisite: Mathematics 109 or 121 or equivalent. This course is a study of limits, continuity, derivatives, and integrals of algebraic and transcendental functions, with applications. (5 Lec.)

#### (MTH) 130 Business Mathematics (3)

Prerequisites: One year of high school algebra and an appropriate assessment test score or Developmental Mathematics 091 or the equivalent. This course is intended primarily for students in specialized occupational programs. It is a study of simple and compound interest, bank discount, payrolls, taxes, insurance, mark up and mark down, corporate securities, depreciation, and purchase discounts. (3 Lec.)

#### (MTH) 139 Applied Mathematics (3)

The course is a study of commercial, technical, and other applied uses of mathematics. Topics vary to fit the needs of the students enrolled in a particular technical/occupational program. The prerequisite will vary accordingly and be determined by the needed skills. (3 Lec.)

#### (MTH) 195 Technical Mathematics I (3)

Prerequisites: One year of high school algebra and an appropriate assessment test score or Developmental Mathematics 091 or the equivalent. This course is designed for technical students. It covers the basic concepts and fundamental facts of plane and solid geometry, computational techniques and devices, units and dimensions, the terminology and concepts of elementary algebra, functions, coordinate systems, simultaneous equations, and stated problems. (3 Lec.)

#### (MTH) 196 Technical Mathematics II (3)

Prerequisite: Mathematics 195. This course is designed for technical students. It includes a study of topics in algebra, an introduction to logarithms, and an introduction to trigonometry, trigonometric functions, and the solution of triangles. (3 Lec.)

#### (MTH) 202 introductory Statistics (3)

Prerequisite: Two years of high school algebra or demonstrated competence approved by the instructor. This course is a study of collection and tabulation of data, bar charts, graphs, sampling, measures of central tendency and variability, correlation, index numbers, statistical distributions, probability, and application to various fields. (3 Lec.)

#### (MTH) 225 Calculus !! (4)

Prerequisite: Mathematics 124 or the equivalent. This course is a study of techniques of integration, polar coordinates, parametric equations, topics in vector calculus, sequences, series, indeterminate forms, and partial differentiation with applications. (4 Lec.)

#### (MTH) 226 Calculus III (3)

Prerequisite: Mathematics 225 or the equivalent. This course is a study of topics in vector calculus, functions of several variables, and multiple integrals, with applications. (3 Lec.)

#### (MTH) 230 Differential Equations (3)

Prerequisite: Mathematics 225 or demonstrated competence approved by the instructor. This course is a study of ordinary differential equations, including linear equations, systems of equations, equations with variable coefficients, existence and uniqueness of solutions, series solutions, singular points, transform methods, boundary value problems, and applications. (3 Lec.)

#### **MUSIC**

#### (MUS) 104 Music Appreciation (3)

The basic elements of music are surveyed and examined in the music literature of western civilization, particularly from the Baroque Period to the present. Cultural influences on the music of each era are observed. (3 Lec.)

#### (MUS) 110 Music Literature (3)

The music of recognized composers in the major periods of music history is examined. Topics include the characteristics of sound, elements of music, performance media, and musical texture. Emphasis is on the music of the late Gothic, Renaissance, and Baroque eras. (3 Lec.)

#### (MUS) 111 Music Literature (3)

This course is a continuation of Music 110. The compositional procedures and forms used by composers are studied. Emphasis is on the Classical, Romantic, and Modern periods. (3 Lec.)

#### (MUS) 113 Foundations Of Music 1 (3)

This course is the initial course to prepare students with limited music training for Music 145. It focuses on notation (music reading), musical terminology, analysis, listening to and creating rhythmic and melodic responses. (3 Lec.)

#### (MUS) 114 Foundations Of Music II (3)

Prerequisite: Music 113 or demonstrated competence approved by the instructor. This course prepares students with limited music training for Music 145 and increases their general music understanding. Emphasis is on rhythmic and melodic training, chord functions, melody, textures, and basic analysis of music. (3 Lec.)



#### (MUS) 117 Piano Class I (1)

This course is primarily for students with no piano background. It develops basic musicianship and piano skills. This course may be repeated for credit. (2 Lab.)

#### (MUS) 118 Piano Class II (1)

Prerequisite: Music 117 or demonstrated competence approved by the instructor. The study of piano is continued. Included are technique, harmonization, transposition, improvisation, accompanying, sight reading, and performing various styles of repertoire. This course may be repeated for credit. (2 Lab.)

#### (MUS) 119 Guitar Class I (1)

This course is primarily for students with limited knowledge in reading music or playing the guitar. It develops basic guitar skills. This course may be repeated for credit. (2 Lab.)

#### (MUS) 120 Guitar Class II (1)

Prerequisite: Music 119 or demonstrated competence approved by the instructor. This course is a continuation of Music 119. Emphasis is on classical guitar techniques and music reading skills. This course may be repeated for credit. (2 Lab.)

#### (MUS) 121-143 Applied Music-Minor (1)

This course is open to students enrolled in music theory, ensembles, and other music major and minor courses. It provides private instruction in the student's secondary area and consists of a one-half hour lesson a week. Private music may be repeated for credit. Laboratory fee required. (1 Lec.)

#### (MUS) 145 Music Theory I (3)

Prerequisite: Music 113 and 114 or demonstrated competence approved by the instructor. This course is designed for music majors and minors. Emphasis is on notation, cadences, classification of diatonic triads, scales, and modes. It is recommended that students enrolled in Music 161 enroll in this course. (3 Lec.)

#### (MUS) 146 Music Theory II (3)

Prerequisite: Music 145 or demonstrated competence approved by the instructor. This course focuses on part-writing and harmonization with triads and their inversions. Also included is a chord vocabulary expanded to include materials from the common practice period as well as contemporary periods. It is recommended that students enrolled in Music 162 enroll in this course. (3 Lec.)

#### (MUS) 147 Synthesizer Class i (1)

Prerequisite: Music 117 or prior keyboard experience. This course is an entry-level performance course designed to teach students the basic theoretical concepts and performance skills necessary to perform on synthesizers. (3 Lab.)

# (MUS) 149 Digital Music Production (3)

Prerequisite: One year of music theory and keyboard or demonstrated competence approved by the instructor. This course meets the specific needs of experienced songwriters, performers, composers/arrangers, and musicians working in or actively interested in music production. (2 Lec., 1 Lab.)

#### (MUS) 150 Chorus (1)

Prerequisite: Demonstrated competence approved by the instructor. A wide variety of music representing the literature of the great eras of music history is studied and performed. This course may be repeated for credit. (3 Lab.)

#### (MUS) 151 Voice Class I (1)

This course is for non-voice majors. It presents the principles of breathing, voice production, tone control, enunciation, and phrasing in two group lessons a week. This course may be repeated for credit. (2 Lab.)

#### (MUS) 152 Voice Class II (1)

This course is a continuation of Music 151. It is open to all non-voice majors. Emphasis is on solo singing, appearance in studio recital, stage deportment, and personality development. Two group lessons are given a week. This course may be repeated for credit. (2 Lab.)

#### (MUS) 155 Vocal Ensemble (1)

Prerequisite: Demonstrated competence approved by the instructor. Activities include study and performance of specialized choral literature suitable for more advanced students. (3 Lab.)

# (MUS) 156 Madrigal Singers (1)

A group of vocalists read and perform literature for small ensembles. Membership is by audition with the appropriate director. This course may be repeated for credit. (3 Lab.)

#### (MUS) 160 Band (1)

Prerequisite: Demonstrated competence approved by the instructor. The band studies and performs a wide variety of music in all areas of band literature. This course may be repeated for credit. (3 Lab.)

#### (MUS) 161 Musicianship I (1)

Prerequisite: Music 113 and 114 or demonstrated competence approved by the instructor. Keyboard skills and aural skills (including sight-singing and ear training) are developed. It is recommended that students enrolled in Music 145 enroll in this course. (3 Lab.)

#### (MUS) 162 Musicianship II (1)

Prerequisite: Music 161. This course is a continuation of Music 161. It is recommended that students enrolled in Music 146 enroll in this course. (3 Lab.)

# (MUS) 166 History Of Jazz/Rock Music (3)

The study of social and musical influences on Jazz/Rock music and the influence of Jazz/Rock Music on society and the music industry. (3 Lec.)

#### (MUS) 174 Keyboard Ensemble (1)

Prerequisite: Demonstrated competence approved by the instructor. A group of keyboard instrumentalists read and perform literature for small ensembles. This course may be repeated for credit. (3 Lab.)

#### (MUS) 181 Lab Band (1)

Prerequisite: Demonstrated competence approved by the instructor. Students study and perform various forms of commercial music, such as jazz, pop, avant-garde, and fusion. Student arranging, composing, and conducting are encouraged. This course may be repeated for credit. (3 Lab.)

#### (MUS) 217 Piano Class III (1)

Prerequisite: Music 117 and 118 or demonstrated competence approved by the instructor. This course is a continuation of functional keyboard skills, including harmonization, sightreading, accompanying styles, improvisation, and technical exercises. It is designed for the music major preparing for the piano proficiency exam, but is also open to any interested student. It is recommended that music majors also study privately. (2 Lab.)

#### (MUS) 218 Piano Class IV (1)

Prerequisite: Music 217 or demonstrated competence of the instructor. This course is a continuation of functional keyboard skills in Music 217 with greater emphasis on advanced harmonization and appropriate technical skills. It is designed as a preparation for the piano proficiency exam for the music major, but is also open to any interested student. It is recommended that music majors also study privately. (2 Lab.)

#### (MUS) 221-243 Applied Music-Concentration (2)

This course is open to students enrolled in music theory, ensembles, or other music major and minor courses. It provides private instruction in the area of the student's concentration and consists of one hour of instruction per week. Laboratory fee required. (1 Lec.)

#### (MUS) 245 Music Theory III (3)

Prerequisite: Music 145 and 146 or demonstrated competence approved by the instructor. This course is a continuation of the study of music theory. It includes the materials of modulation, larger forms, and thematic development, and more advanced analysis. It is recommended that students enrolled in Music 271 enroll in this course. (3 Lec.)

#### (MUS) 246 Music Theory IV (3)

Prerequisite: Music 245 or demonstrated competence approved by the instructor. This course is a continuation of the topics developed in Music 245. The preceding materials are expanded to include melody, harmony, tonality, and the formal processes of 20th century music. It is recommended that students enrolled in Music 272 enroll in this course. (3 Lec.)

#### (MUS) 251-270 Applied Music-Major (3)

This course is primarily for music performance majors and is open to students enrolled in music theory, ensembles, or other music major and minor courses. It provides private instruction in the area of the student's major instrument and consists of one hour of instruction per week. Laboratory fee. (1 Lec.)

#### (MUS) 271 Musicianship III (1)

Prerequisite: Music 161 and 162 or demonstrated competence approved by the instructor. Keyboard and aural skills (including sight-singing and ear training) are developed. It is recommended that students enrolled in Music 245 enroll in this course. (3 Lab.)

#### (MUS) 272 Musicianship IV (1)

Prerequisite: Music 271 or demonstrated competence approved by the instructor. This course is a continuation of Music 271. It is recommended that students enrolled in Music 246 enroll in this course. (3 Lab.)

#### OFFICE TECHNOLOGY

# (OFC) 143 Contemporary Topics In Office Technology (1)

Prerequisites: Demonstrated competence approved by the instructor. This course emphasizes current topics of interest in office technology fields. Realistic solutions to problems relevant to the needs of industry are presented. This course may be repeated for credit with different emphasis up to six hours. (1 Lec.)

# (OFC) 144 Contemporary Topics In Office Technology (2)

Prerequisites: Will vary based on topics covered and will be annotated in each semester's class schedule. Current developments in the rapidly changing field of office technology are studied. (2 Lec.)

# (OFC) 145 Contemporary Topics In Office Technology (3)

Prerequisites: Will vary based on topics covered and will be annotated in each semester's class schedule. Current developments in the rapidly changing field of office technology are studied. (3 Lec.)

#### (OFC) 150 Automated Filing Procedures (3)

Prerequisite: Office Technology 172 or demonstrated competence approved by the instructor. This course introduces the basic principles and procedures of records storage and control. Topics include records storage methods; procedures for the operation and control of manual and automated storage systems; rules for indexing; and principles for the selection of records equipment and supplies. (2 Lec., 2 Lab.)

#### (OFC) 159 Beginning Shorthand (4)

Prerequisite: Credit or concurrent enrollment in Office Technology 172 or demonstrated competence approved by the instructor. The principles of Gregg Shorthand are introduced. Included is the development of the ability to read, write, and transcribe shorthand outlines. Knowledge of the mechanics of English is also developed. Laboratory fee. (3 Lec., 2 Lab.)

#### (OFC) 160 Office Calculating Machines (3)

This course focuses on the development of skills in using electronic calculators. Emphasis is on developing the touch system for both speed and accuracy. Business math and business applications are included. Laboratory fee. (3 Lec.)

#### (OFC) 162 Office Procedures (3)

Prerequisites: Office Technology 173 or concurrent enrollment or demonstrated competence approved by the instructor. This course bridges the gap between the basic skills courses and current office practices. Topics include records management, electronic filing, reprographics, mail, telephone usage, financial transactions, and interpersonal relations. (3 Lec.)



#### (OFC) 166 Intermediate Shorthand (4)

Prerequisites: Office Technology 159 and Office Technology 172 or demonstrated competence approved by the instructor. The principles of Gregg Shorthand are studied. Emphasis is on increased speed dictation, accuracy in typing from shorthand notes, and beginning techniques of transcription skills. Also included are oral reading, speed building, and grammar. Office Careers 166 is equivalent to Office Technology 187, 188, and 189. Laboratory fee. (3 Lec., 2 Lab.)

(OFC) 167 Legal Terminology And Transcription (3) Prerequisites: Office Technology 173 and Office Technology 185 or concurrent enrollment or demonstrated competence approved by the instructor. Legal terms are the focus of this course. Included are the spelling and use of legal terms and Latin words and phrases. Intensive practice is provided in building speed and accuracy in the transcription of legal terms. Laboratory fee. (3 Lec.)

#### (OFC) 172 Beginning Typing (3)

This course is for students with no previous training in typing. Fundamental techniques in typing are developed. The skills of typing manuscripts, business letters, and tabulations are introduced. Office Technology 172 is equivalent to Office Technology 176, 177, and 178. Laboratory fee. (2 Lec., 3 Lab.)

# (OFC) 173 Intermediate Typing (3)

Prerequisites: Office Technology 172 or demonstrated competence approved by the instructor. Typing techniques are developed further. Emphasis is on problem-solving. Increasing speed and accuracy in typing business forms, correspondence, and manuscripts are also covered. Laboratory fee. (2 Lec., 3 Lab.)

#### (OFC) 176 Keyboarding (1)

This course is for students with no previous training in typing. The course introduces the typewriter parts. Alphabetic keys, numeric keys, and symbol keys are covered. Fundamental techniques are refined, and speed is developed. Laboratory fee. (1 Lec., 1 Lab.)

(OFC) 179 Office Information Systems Concepts (2) This course introduces information/word processing and describes its effect on traditional office operations. Basic information/word processing principles, concepts, terminology and advantages of word processing environment system are introduced. This course does not include the operation of a dedicated wordprocessor or microcomputer. (2 Lec.)

(OFC) 182 Introduction To Word Processing (1)
Prerequisites: Office Technology 173 and Office Technology 179 or concurrent enrollment. This course introduces the fundamental techniques required in the operation of word processing equipment/software. Basic concepts of electronic storage and retrieval involved in creating, printing, centering, and revising documents are introduced. May be repeated for credit using different emphasis/equipment. Laboratory fee. (2 Lab.)

(OFC) 183 Keyboarding For Speed And Accuracy (1) This course provides intensive practice drills for developing speed and accuracy on one-, three-, and five-minute writings. May be taken concurrently with Intermediate Typing or Advanced Typing Applications. May be repeated for credit. Laboratory fee. (2 Lab.)

#### (OFC) 185 Basic Machine Transcription (1)

Prerequisites: Office Technology 173 or concurrent enrollment. This course introduces the basic equipment, techniques, and skills required to transcribe recorded business information into mailable documents: Emphasis Is placed on grammar, punctuation, and spelling skills required in word processing operations. Automated equipment and audio transcription machines are used. Laboratory fee. (1 Lec., I Lab.)

#### (OFC) 192 Office Machines I (1)

Business mathematical skills needed to operate office calculators are reviewed. Speed and accuracy skills using ten-key touch are developed. Laboratory fee. (1 Lec.)

# (OFC) 231 Business Communications (3)

Prerequisites: Office Technology 172 or demonstrated competence approved by the instructor and English 101. This practical course includes a study of letter forms, the mechanics of writing and the composition of various types of communications. A critical analysis of the appearance and content of representative business correspondence, proposals, and reports is made. (3 Lec.)

#### (OFC) 266 Advanced Shorthand (4)

Prerequisites: Office Technology 166 and Office Technology 173 or demonstrated competence approved by the instructor. Emphasis is on building dictation speed. Producing mailable, typed transcriptions under timed conditions is also stressed. Vocabulary and extensive production work capabilities are developed. Laboratory fee. (3 Lec., 2 Lab.)

# (OFC) 273 Advanced Typing Applications (2)

Decision-making and production of all types of business materials under timed conditions are emphasized. A continuation of skill development and a review of typing techniques are also stressed. Accuracy at advanced speeds is demanded. Laboratory fee. (1 Lec., 2 Lab.)

#### (OFC) 274 Legal Secretarial Procedures (3)

Prerequisite: Office Technology 167. This course focuses on procedures of the legal secretary. Topics include reminder and filing systems, telephone usage, dictation and correspondence, the preparation of legal documents, and the court system. Client contacts, use of law library, research techniques, timekeeping, billing, bookkeeping, and ethics are also covered. Ways to obtain a position as a legal secretary are described. (3 Lec.)

#### (OFC) 282 Word Processing Applications (1)

Prerequisites: Office Technology 190 or 182 and completion of or concurrent enrollment in Office Technology 185. This course is designed for students who have a basic knowledge of word processing equipment. Advanced word processing concepts and machine functions are developed on a specific keyboard. Special emphasis is placed on producing mailable documents. May be repeated for credit using different emphasis/equipment. Laboratory fee. (2 Lab.)

#### (OFC) 283 Specialized Software I (1)

Prerequisites: Office Technology 282 or demonstrated competence approved by the instructor. Current information/word processing technology is presented. Specialized applications are performed using automated equipment which the student has previously mastered. Applications may include graphics, math functions, spreadsheets, desktop publishing, and the use of other software packages. Word processing equipment or microcomputers will be used in this course. May be repeated for credit using different emphasis/equipment. Laboratory fee. (2 Lab.)

#### (OFC) 284 Specialized Software II (1)

Prerequisite: Office Technology 283 or demonstrated competence approved by the instructor. Current information/word processing technology is presented. Specialized applications are performed using automated equipment that the student has previously mastered. More advanced applications may include graphics, math functions, spreadsheets, and desktop publishing. This course may be repeated for credit using different emphasis/equipment. (2 Lab.)

#### (OFC) 285 Applied Machine Transcription (1)

Prerequisites: Office Technology 173 or 190 and Office Technology 185 or demonstrated competence approved by the instructor. This course is designed for students with basic skills in machine transcription. Emphasis is placed on increasing accuracy and speed in the timed transcription of recorded information. Composing and dictating business communications are introduced. Laboratory fee. (1 Lec., 1 Lab.)

# (OFC) 703 Cooperative Work Experience (3)

Prerequisites: Completion of two courses in the Office Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. Students must complete three objectives and work a minimum of 15 hours per week for a total of three credit hours. This seminar consists of orientation, setting/writing job objectives, interpersonal skills, career interest/aptitude test and evaluation, time management, career planning, and exit seminar. (1 Lec., 15 Lab.)

#### (OFC) 704 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Office Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must complete four objectives and work a minimum of 20 hours per week for a total of four credit hours. This seminar consists of orientation, setting/writing job objectives, interpersonal skills, career interest/aptitude test and evaluation, time management, career planning, and exit seminar. (1 Lec., 20 Lab.)

#### (OFC) 713 Cooperative Work Experience (3)

Prerequisites: Completion of two courses in the Office Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives each semester. Students must complete three objectives and work a minimum of 15 hours per week for a total of three credit hours. This seminar consists of orientation, setting/writing job objectives, stress management, Certified Professional Secretary, communication skills, job search, professional image, and exit seminar. (1 Lec., 15 Lab.)

#### (OFC) 714 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in the Office Technology program or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. Students must complete four objectives and work a minimum of 20 hours per week for a total of four credit hours. This seminar consists of orientation, setting/writing job objectives, stress management, Certified Professional Secretary, communication skills, job search, professional image, and exit seminar. (1 Lec., 20 Lab.)

#### (OFC) 803 Cooperative Work Experience (3)

Prerequisites: Completion of previous Office Technology 703 or 704 and 713 or 714. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. Students must complete three objectives and work a minimum of 15 hours per week for a total of three credit hours. This seminar consists of orientation, setting/writing job objectives, and independent study of business topics. (1 Lec., 15 Lab.)

#### (OFC) 804 Cooperative Work Experience (4)

Prerequisites: Completion of previous Office Technology 703 or 704 and 713 or 714. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences. Students must develop new learning objectives each semester. Students must complete four objectives and work a minimum of 20 hours per week for a total of four credit hours. This seminar consists of orientation, setting/writing job objectives, and independent study of business topics. (1 Lec., 20 Lab.)

#### **PHILOSOPHY**

#### (PHI) 101 Introduction To Philosophy (3)

The fundamental problems in philosophy are surveyed. Methods to deal with the problems are discussed. Ancient and modern views are examined as possible solutions. (3 Lec.)

#### (PHI) 105 Logic (3)

The principles of logical thinking are analyzed. The methods and tools of logic are applied to real-life situations. Fallacies, definitions, analogies, syllogisms, Venn diagrams, and other topics are discussed. (3 Lec.)

# (PHI) 202 Introduction To Social And Political Philosophy (3)

The relationships of philosophical ideas to the community are presented. Emphasis is on concepts of natural rights, justice, education, freedom, and responsibility. (3 Lec.)

#### (PHI) 203 Ethics (3)

The classical and modern theories of the moral nature of the human are surveyed. Alternative views of responsibilities to self and society are posed. Ethical issues and their metaphysical and epistemological bases are vivified. Emphasis is on applying ethical principles in life. (3 Lec.)

#### **PHOTOGRAPHY**

# (PHO) 110 Introduction To Photography And Photojournalism (3)

Photography and photojournalism are introduced. Topics include the general mechanics of camera lenses and shutters and the general characteristics of photographic films, papers, and chemicals. Darkroom procedures are presented, including enlarging, processing, contact printing, and exposing films and papers. Artificial lighting is studied. Laboratory fee. (2 Lec., 4 Lab.)

# (PHO) 111 Advanced Photography And Photojournalism (3)

Techniques learned in Photography 110 are refined. Emphasis is on photographic communication. Laboratory fee. (2 Lec., 4 Lab.)

#### (PHO) 122 Commercial Photography I (3)

Commercial or contract photography is studied. Field, studio, and darkroom experience for various kinds of photography is discussed. Included are social photography, portrait and studio photography, fashion and theatrical portfolio, publicity photography, and convention photography. The use of natural, stationary, flash, and strobe artificial lights is covered. Laboratory fee. (2 Lec., 4 Lab.)

#### PHYSICAL EDUCATION

#### (PEH) 100 Lifetime Sports Activities (1)

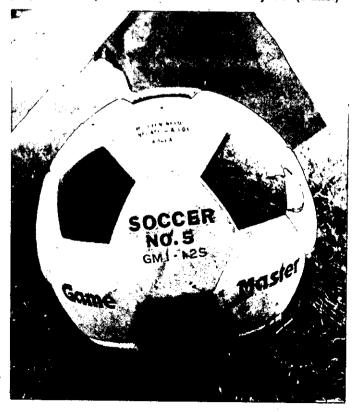
Beginning level skills in various lifetime sports are presented as well as rules, etiquette, safety, strategy, offensive and defensive elements, and conditioning activities where appropriate. Physical Education 100 may be repeated for credit when students select different activities. Laboratory fee. (3 Lab.)

#### (PEH) 101 Health For Today (3)

Emphasis is placed on relating course content to lifestyle to foster a better understanding of the major health issues of today. Current issues include, but are not limited to: emotional health, chemical use and abuse, human sexuality, major diseases, physical fitness, nutrition, aging, death and dying. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (PEH) 104 Beginning Soccer (1)

Course content emphasizes the basic playing skills of both indoor and outdoor soccer at the beginner level, as well as rules, strategies, safety, offensive and defensive patterns of play, and competitive activities. Laboratory fee. (3 Lab.)



#### (PEH) 112 Beginning Softball (1)

Course content includes the basic playing skills of softball at the beginner level, as well as rules, strategies, safety, offensive and defensive elements, and competitive activities. These common elements will be applied to fast pitch, slow pitch, and coed softball. Laboratory fee. (3 Lab.)

#### (PEH) 113 Beginning Racquetball (1)

Basic racquetball skills, rules and strategies are taught and class tournaments are conducted. Laboratory fee. (3 Lab.)

#### (PEH) 114 Beginning Badminton (1)

Course content emphasizes the basic playing skills of badminton at the beginner level, as well as rules, strategies, safety, offensive and defensive elements, and competitive activities. Each of the above elements will be applied to the singles, doubles, and mixed-double games. Laboratory fee. (3 Lab.)

#### (PEH) 115 Physical Fitness (1)

Students are introduced to health related concepts and activities for the purpose of gaining knowledge and skills necessary to evaluate personal fitness level and to develop a personal lifelong fitness program. Activities include, but are not limited to: aerobics, circuit training, muscular development flexibility, agility exercises, weight training and body composition. Laboratory fee. (3 Lab.)

#### (PEH) 117 Beginning Archery (1)

The beginning level skills of target and field shooting and bow hunting are emphasized. History, rules of competition, preparation and care of equipment and safety are included. Equipment is furnished. Laboratory fee. (3 Lab.)

#### (PEH) 118 Beginning Golf (1)

Course content emphasizes the basic skills involved in club selection, golf course analysis, shot selection and execution of the golf swing. Rules, scoring, handicapping, and etiquette are included. Equipment is furnished. Laboratory fee. (3 Lab.)

#### (PEH) 119 Beginning Tennis (1)

This course emphasizes the acquisition of beginning level skills in the execution of forehand strokes, backhand strokes, the serve, and the volley. Rules, strategies of the singles and doubles games, etiquette, safety, and competitive activities are included. Equipment is furnished. Laboratory fee. (3 Lab.)

#### (PEH) 120 Beginning Bowling (1)

Basic bowling skills at the beginner level as well as rules, strategies, safety, scoring and competitive activities are emphasized. All classes are conducted at an off-campus bowling lane. Lane fee. Laboratory fee. (3 Lab.)

#### (PEH) 122 Beginning Gymnastics (1)

Beginning level skills in both men's and women's all-around gymnastic events are emphasized. Men's events include horizontal bar, pommel horse, rings, vaulting, floor exercise, and parallel bars. Women's events include floor exercise, vaulting, balance beam, and uneven parallel bars. Basic tumbling skills are also included. All appropriate events will be incorporated into a beginner's level routine. Laboratory fee. (3 Lab.)

#### (PEH) 123 Beginning Swimming (1)

This course is designed to teach a non-swimmer or a shallow water swimmer to become a safe and efficient deep water swimmer. After the development of sufficient skills to perform a modified crawl stroke, the elementary back stroke, survival floating, jumping Into deep water, leveling off and changing directions, swimmers will be able to swim in deep water. Laboratory fee. (3 Lab.)

#### (PEH) 124 Social Dance (1)

This course is for students who have limited experience in dance. Ballroom and social dancing are offered. Included are fundamental steps and rhythms of the fox-trot, waltz, tango, and recent dances. "Country" dancing includes the two-step, cotton- eyed Joe, square dance, and other dances. Laboratory fee. (3 Lab.)

#### (PEH) 125 Conditioning Exercise (1)

This course focuses on understanding exercise and its effect on the body. Cardiovascular endurance, muscular strength, endurance and flexibility are improved through a variety of conditioning activities. Laboratory fee. (3 Lab.)

#### (PEH) 126 Aerobics (1)

This course emphasizes the development of cardiovascular endurance by utilizing choreographed routines which may combine basic dance patterns with walking, jogging, jumping, etc. Individual fitness levels are accommodated by the intensity of the workout. Laboratory fee. (3 Lab.)

(PEH) 127 Beginning Basketball And Volleyball (1)
Basic basketball and volleyball skills are taught. Rules,
game strategies and competitive activities are included.
Laboratory fee. (3 Lab.)

#### (PEH) 129 Modern Dance (1)

This beginning course is designed to emphasize basic dance technique, body alignment and placement, floor work, locomotor patterns, and creative movement. Laboratory fee. (3 Lab.)

(PEH) 131 Weight Training And Conditioning (1)

Instruction in weight training and conditioning techniques are stressed. Emphasis is placed on muscular strength and endurace. Laboratory fee. (3 Lab.)

#### (PEH) 132 Self-Defense (1)

Various forms of self-defense are introduced. The history and philosophy of the martial arts are explored. The student should progress from no previous experience in self-defense to an adequate skill level covering basic self-defense situations. Both mental and physical aspects of the arts are stressed. Uniform required. Laboratory fee. (3 Lab.)

#### (PEH) 134 Outdoor Education (1)

Knowledge and skills in outdoor education and camping are presented. Planned and incidental experiences take place, including a week-end camp-out. Laboratory fee. (3 Lab.)

# (PEH) 144 Introduction To Physical Education (3)

This course is for students majoring in physical education and is designed for professional orientation in physical education, health, and recreation. The history, philosophy, and modern trends of physical education are surveyed. Topics include teacher qualifications, vocational opportunities, expected competencies, and skill testing. (3 Lec.)

# (PEH) 200 Lifetime Sports Activities II (1)

Intermediate and Intermediate/advanced skills in a variety of lifetime sports are presented. Students participate in a selected sport. Physical Education 200 may be repeated for credit when students select different activities. Laboratory fee. (3 Lab.)

#### (PEH) 217 Intermediate Archery (1)

Prerequisite: Demonstrated competence approved by the instructor. Course content includes refinement for basic archery skills and competitive target shooting and field archery. Equipment is furnished. Laboratory fee. Laboratory fee. (3 Lab.)

#### (PEH) 218 Intermediate Golf (1)

Prerequisite: Demonstrated competence approved by the instructor. Basic skills and techniques are refined beyond the beginner level. Analysis and practice of the golf swing, swing theory and methods, strategy, and actual golf course playing are emphasized. Equipment is furnished. Green fees. Laboratory fee. (3 Lab.)

#### (PEH) 219 Intermediate Tennis (1)

Prerequisite: Demonstrated competence approved by the instructor. Emphasis is placed on refinement of basic skills and specialty shots. Competitive activities in singles, doubles and mixed doubles will be included. Equipment is furnished. Laboratory fee. (3 Lab.)

# (PEH) 222 Intermediate Gymnastics (1)

Prerequisite: Demonstrated competence approved by the instructor. Basic tumbling and the all-around events for men and women will be emphasized at the intermediate performance level. Course emphasis is placed on the development, preparation and presentation of gymnastic routines. Laboratory fee. (3 Lab.)

# (PEH) 223 Intermediate Swimming (1)

Prerequisite: Demonstrated competence approved by the instructor. The correct performance of the crawl, elementary back stroke, side and breast strokes will be emphasized. Some speed and endurance swimming will be required. Laboratory fee. (3 Lab.)

#### (PEH) 225 Scuba Diving (2)

Prerequisite: Demonstrated competence approved by the instructor. This course includes instruction in the proper use of equipment, safety, physiology and open water diving. Students completing course requirements receive certification through one of several major accredited associations. Equipment rental fee. Laboratory fee. (1 Lec., 2 Lab.)

#### (PEH) 226 Advanced Life Saving (1)

Prerequisite: Demonstrated competence approved by the instructor. Successful completion of this course qualifies students for the Red Cross Advanced Life Saving Certificate. Laboratory fee. (3 Lab.)

# PEH) 228 Advanced Open Water Scuba (2)

Prerequisite: Physical Education 225 or appropriate certifying agency entry level certificate or 10 log book hours. Instruction will include the introductory knowledge and skill development in the open water environment for the student to participate in underwater investigation, deep diving, search and light salvage, and limited visibility/night diving. Safety, special equipment, dive planning and dive buddy procedures will be covered. Upon successful completion of the course, the student will receive advanced open water certification through a qualified certifying agency. Laboratory fee. (1 Lec., 2 Lab.)

#### (PEH) 231 Intermediate Weight Training (1)

Prerequisite: Demonstrated competence approved by the instructor. Skills and instruction in weight training techniques are developed beyond the beginner level. Laboratory fee. (3 Lab.)

# (PEH) 232 Intermediate Self-Defense (1)

Prerequisite: Demonstrated competence approved by the instructor. Students will be introduced to intermediate forms of defense and combinations of self defense methods. Emphasis is on practical application of self defense movements. Uniform required. Laboratory fee. (3 Lab.)

#### (PEH) 233 Intermediate Jogging (1)

Prerequisite: Demonstrated competence approved by the instructor. Improvement of physical fitness through jogging is developed beyond the beginner stage. A higher level of fitness is expected. Laboratory fee. (3 Lab.)

#### (PEH) 234 'Water Safety Instructor (2)

Prerequisite: Current Advanced Life Saving Card. The principles and techniques for instructors in water safety and life saving classes are covered. Completion of the course qualifies the student to test for certification by the Red Cross as a water safety instructor. A uniform is required. Laboratory fee. (1 Lec., 2 Lab.)

# (PEH) 257 Advanced First Aid And Emergency Care (3)

The Advanced First Aid and Emergency Care course of the American Red Cross is taught, presenting both theory and practice. Various aspects of safety education also are included. (3 Lec.)

#### **PHYSICS**

# (PHY) 111 Introductory General Physics (4)

Prerequisite: Two years of high school algebra, including trigonometry, or the equivalent. This course is for pre-dental, biology, pre-medical, pre-pharmacy, and pre-architecture majors and other students who need a two-semester technical course in physics. Mechanics and heat are studied. Laboratory fee. (3 Lec., 3 Lab.)

#### (PHY) 112 Introductory General Physics (4)

Prerequisite: Physics 111. This course is a continuation of Physics 111. Electricity, magnetism, light, and sound are studied. Laboratory fee. (3 Lec., 3 Lab.)

#### (PHY) 117 Concepts In Physics (4)

This course is for non-science majors. It introduces principles of physics and does not require a mathematical background. Emphasis is on classical mechanics and thermodynamics. Historical developments and their impact on daily life are included. The principle of energy conservation is stressed, and current problems of world-wide energy production are examined. Laboratory fee. (3 Lec., 3 Lab.)

#### (PHY) 118 Concepts In Physics (4)

This is for non-science majors. It introduces principles of physics and does not require a mathematical background. Emphasis is on modern developments in physics. Topics include acoustics, electricity and magnetism, light and the electromagnetic spectrum, atomic physics, and relativity. Laboratory fee. (3 Lec., 3 Lab.)

#### (PHY) 131 Applied Physics (4)

Prerequisite: Mathematics 195 or concurrent enrollment in Mathematics 195. This course is primarily for students in technical programs. The properties of matter, mechanics, and heat are introduced. Emphasis is on uses and problem-solving. Laboratory fee. (3 Lec., 3 Lab.)

#### (PHY) 201 General Physics (4)

Prerequisite: Credit or concurrent enrollment in Mathematics 124. This course is designed primarily for physics, chemistry, mathematics, and engineering majors. The principles and applications of mechanics, wave motion, and sound are studied. Emphasis is on fundamental concepts, problem-solving, notation, and units. The laboratory includes a one-hour problem session. Laboratory fee. (3 Lec., 3 Lab.)

#### (PHY) 202 General Physics (4)

Prerequisites: Physics 201 and credit or concurrent enrollment in Mathematics 225. This course presents the principles and applications of heat, electricity, magnetism, and optics. Emphasis is on fundamental concepts, problem-solving, notation and units. The laboratory includes a one-hour problem session. Laboratory fee. (3 Lec., 3 Lab.)

#### **PSYCHOLOGY**

# (PSY) 101 Introduction To Psychology (3)

Introduction to Psychology surveys major topics in the study of behavior. Factors which determine and affect behavior are examined. Psychological principles are applied to the human experience. (This course is offered on campus and may be offered via television.) (3 Lec.)

# (PSY) 131 Applied Psychology And Human Relations (3)

Psychological principles are applied to human relations problems in business and industry. Topics include group dynamics and adjustment factors for employment and advancement. (3 Lec.)

# (PSY) 201 Developmental Psychology (3)

Prerequisite: Psychology 101. This course is a study of human growth, development, and behavior. Emphasis is on psychological changes during life. Processes of life from prenatal beginnings through adulthood and aging are included. (This course is offered on campus and may be offered via television). (3 Lec.)

#### (PSY) 202 Applied Psychology (3)

Prerequisite: Psychology 101. Psychological facts and principles are applied to problems and activities of life. Emphasis is on observing, recording, and modifying human behavior. Some off-campus work may be required. (3 Lec.)

#### (PSY) 205 Psychology Of Personality (3)

Prerequisite: Psychology 101. This course is an introduction to the study of personality. Topics of personality and adjustment will be studied in the context of various personality theories. Emphasis will be on the application of those topics. (3 Lec.)

#### (PSY) 207 Social Psychology (3)

Prerequisite: Psychology 101 or Sociology 101. Students may register for either Psychology 207 or Sociology 207 but may receive credit for only one. Theories of individual behavior in the social environment are surveyed. Topics include the socio- psychological process, attitude formation and change, interpersonal relations, and group processes. (3 Lec.)

# **QUALITY CONTROL**

# (QCT) 121 Introduction To Quality Control (2)

Prerequisite: Credit or concurrent enrollment in Math 195. This course introduces some of the concepts and techniques currently being used by industry to prevent defective products from reaching the consumer. Included are reliability analysis, control charts, inspection and sampling plans. The language, terminology and organization of typical industry quality control functions are studied. Elementary probability and statistics concepts are presented as background. (2 Lec.)

# (QCT) 122 Dimensional Measurement (3)

Prerequisite: Credit or concurrent enrollment in Quality Control Technology 121 or demonstrated competence approved by the instructor. This course provides an opportunity to obtain a practical and theoretical understanding of many types of mechanical and optical measuring devices which are used in dimensional inspection. Laboratory fee. (2 Lec., 2 Lab.)

### READING

# (RD) 101 College Reading And Study Skills (3)

Comprehension techniques for reading college texts are emphasized. Also included are vocabulary development, critical reading, and rate flexibility. Study skills addressed include listening, notetaking, underlining, concentrating, and memory. (3 Lec.)

# (RD) 102 Speed Reading And Learning (3)

Reading and learning skills are addressed. Speed reading techniques and comprehension are emphasized. Learning and memory skills are also covered. (3 Lec.)

#### **REAL ESTATE**

# (RE) 130 Real Estate Principles (3)

This course provides an overview of licensing for the real estate broker and salesman, ethics of practice, titles to and conveyancing of real estate, legal descriptions, law of agency, deeds, encumbrances and liens. Distinctions between personal and real property, contracts, appraisal, finance and regulations, closing procedures, and real estate mathematics are also included. Three classroom hours will be devoted to federal, state and local laws governing housing discrimination, housing credit discrimination, and community reinvestment. (3 Lec.)

# (RE) 131 Real Estate Finance (3)

Prerequisite: Real Estate 130 or concurrent enrollment in Real Estate 130 or equivalent. This course covers monetary systems, primary and secondary money markets, sources of mortgage loans, federal government programs and loan applications, processes, and procedures. Closing costs, alternative financial instruments, equal credit opportunity act, community reinvestment act, and state housing agency are also included. (3 Lec.)

# (RE) 133 Real Estate Marketing (3)

Prerequisite: Real Estate 130 or concurrent enrollment in Real Estate 130 or the equivalent. The emphasis of this course is on real estate professionalism and ethics and the satisfaction of all parties. Topics covered include characteristics of successful salesmen, time management, psychology of marketing, listing procedures, advertising, negotiating and closing, financing, and the Deceptive Trade Practices-Consumer Protection Act, as amended, Section 17.01 et seq, Business and Commerce Code. (3 Lec.)

# (RE) 135 Real Estate Appraisal (3)

Prerequisites: Real Estate 130 and 131 or the equivalent. This course focuses on principles and methods of appraising. Topics include central purposes and functions of an appraisal, social and economic determinants of value, appraisal case studies, cost, market data and income approaches to value estimates, final correlations, and reporting. (3 Lec.)

#### (RE) 136 Real Estate Law (3)

Prerequisite: Real Estate 130 or concurrent enrollment in Real Estate 130 or the equivalent. This course examines the legal concepts of real estate land description, real property rights and estates in land, contracts, conveyances, encumbrances, foreclosures, recording procedures, and evidence of titles. (3 Lec.)

#### RELIGION

# (REL) 101 Religion In American Culture (3)

This course examines the nature of religion in America. It covers important influences from the past and characteristics of current religious groups and movements. Emphasis is on understanding the role of religion in American life. (3 Lec.)

# (REL) 102 Contemporary Religious Problems (3)

Both classic and recent issues are explored. Such topics as the nature of religion, the existence of God, world religions, mysticism, sexuality and religion, and the interpretation of death are included. This course may be offered with emphasis on a specific topic, such as death and dying. (3 Lec.)

#### (REL) 201 Major World Religions (3)

This course surveys the major world religions. Hindulsm, Buddhism, Judaism, Islam, and Christianity are included. The history of religions is covered, but the major emphasis is on current beliefs. Other topics may also be included, such as the nature of religion, tribal religion, and alternatives to religion. (3 Lec.)

### SOCIOLOGY

# (SOC) 101 Introduction To Sociology (3)

This course is a study of the nature of society and the sources of group life, culture and social conflict. Topics include institutions, social change, processes, and problems. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (SOC) 102 Social Problems (3)

This course is a sociological study of social problems which typically include: crime, poverty, minorities, deviance, population, and health care. Specific topics may vary from semester to semester to address contemporary concerns. (3 Lec.)

# (SOC) 231 Urban Social Problems (3)

The sociology of social institutions is studied. Topics include urbanization, theories of formation, and the impact of urbanization on the individual. (3 Lec.)

#### **SPANISH**

# (SPA) 101 Beginning Spanish (4)

The essentials of grammar and easy Idiomatic prose are studied. Emphasis is on pronunciation, comprehension, and oral expression. Laboratory fee. (3 Lec., 2 Lab.)

# (SPA) 102 Beginning Spanish (4)

Prerequisite: Spanish 101 or the equivalent or demonstrated competence approved by the instructor. This course is a continuation of Spanish 101. Emphasis is on idiomatic language and complicated syntax. Laboratory fee. (3 Lec., 2 Lab.)

# (SPA) 201 Intermediate Spanish (3)

Prerequisite: Spanish 102 or the equivalent or demonstrated competence approved by the instructor. Reading, composition, and intense oral practice are covered. Grammar is reviewed. (3 Lec.)

# (SPA) 202 Intermediate Spanish (3)

Prerequisite: Spanish 201 or the equivalent or demonstrated competence approved by the instructor. This course is a continuation of Spanish 201. Contemporary literature and composition are studied. (3 Lec.)

# SPEECH COMMUNICATION

(SC) 101 Introduction To Speech Communication (3) Theory and practice of speech communication behavior in one-to-one, small group, and public communication situations are introduced. Students learn more about themselves, improve skills in communicating with others, and make formal oral presentations. This course requires college-level skills in reading and writing. (3 Lec.)

(SC) 105 Fundamentals Of Public Speaking (3)
Public speaking is introduced. Topics include the principles of reasoning, audience analysis, collection of materials, and outlining. Emphasis is on giving well prepared speeches. (3 Lec.)

# (SC) 109 Voice And Articulation (3)

Students may register for either Speech Communication 109 or Theatre 109 but may receive credit for only one of the two. The mechanics of speech are studied. Emphasis is on Improving voice and pronunciation. (3 Lec.)

# (SC) 203 Oral Interpretation (3)

Techniques of analyzing various types of literature are examined. Practice is provided in preparing and presenting selections orally. Emphasis is on individual improvement. (3 Lec.)

### THEATRE

# (THE) 101 Introduction To The Theatre (3)

The various aspects of theatre are surveyed. Topics include plays, playwrights, directing, acting, theatres, artists, and technicians. (3 Lec.)

# (THE) 102 Contemporary Theatre (3)

This course is a study of the modern theatre. The historical background and traditions of each style are included. Emphasis is on understanding the social, culture, and aesthetic significance of each style. A number of modern plays are read and selected video tapes are viewed. (3 Lec.)

#### SOCIOLOGY

#### (SOC) 101 Introduction To Sociology (3)

This course is a study of the nature of society and the sources of group life culture and social conflict. Topics include institutions social change processes and problems. (This course is offered on campus and may be offered via television.) (3 Lec.)

#### (SOC) 102 Social Problems (3) --

This course is a sociological study of social problems which typically include crime poverty minorities deviance population and health care. Specific topics may vary from semester to semester to address contemporary concerns (3 Lec.)

#### (SOC) 231: Urban Social Problems (3)

The sociology of social institutions is studied. Topics in clude urbanization theories of formation and the impact of urbanization on the individual (3 Lec.)

#### **SPANISH**

#### (SPA) 101 Beginning Spanish (4)

The essentials of grammar and easy idlomatic prose are studied Emphasis is on pronunciation comprehension and oral expression Laboratory fee (3 Lec 2 Lab)

#### (SPA) 102 Beginning Spanish (4)

Prerequisite Spanish 101 or the equivalent or demonstrated competence approved by the instructor This course is a continuation of Spanish 101 Emphasis is on idiomatic language and complicated syntax Laboratory fee (3 Lec 2 Lab)

#### (SPA) 201 Intermediate Spanish (3)

Prerequisite Spanish 102 or the equivalent or demonstrated competence approved by the instructor Reading composition and intense oral practice are covered Grammar is reviewed (3 Lec.)

#### (SPA) 202 Intermediate Spanish (3)

Prerequisite Spanish 201 or the equivalent or demonstrated competence approved by the instructor This course is a continuation of Spanish 201 Contemporary literature and composition are studied (3 Lec.)

#### SPEECH COMMUNICATION

(SC) 101 Introduction To Speech Communication (3) Theory and practice of speech communication behavior in one to-one small group and public communication situations are introduced. Students learn more about themselves improve skills in communicating with others and make formal oral presentations. This course requires college-level skills in reading and writing. (3 Lec.)

#### (SC) 105 Fundamentals Of Public Speaking (3)

Public speaking is introduced Topics include the principles of reasoning audience analysis collection of materials and outlining Emphasis is on giving well prepared speeches (3 Lec.)

#### (SC) 109 Voice And Articulation (3)

Students may register for either Speech Communication 109 or Theatre 109 but may receive credit for only one of the two. The mechanics of speech are studied. Emphasis is on improving voice and pronunciation. (3 Lec.)

#### (SC) 206 Oral interpretation=(3)

Techniques of analyzing various types of literature are examined Practice is provided in preparing and present ing selections orally Emphasis is on Individual Improvement (3 Lec)

#### THEATRE

#### (THE) 101 Introduction To The Theatre (3)

The various aspects of theatre are surveyed. Topics include plays playwrights directing acting theatres artists and technicians (3 Lec.)

#### (THE) 102 Contemporary Theatre (3)

This course is a study of the modern theatre. The historical background and traditions of each style are included. Emphasis is on understanding the social culture and aesthetic significance of each style. A number of modern plays are read and selected video tapes are viewed. (3 Lec.)



#### (THE) 106 Acting I (3)

The theory of acting and various exercises are presented. Body control, voice, interpretation, characterization, and stage movement are included. Both individual and group activities are used. Specific roles are analyzed and studied. (2 Lec., 3 Lab.)

#### (THE) 107 Acting II (3)

Prerequisite: Theatre 106 or demonstrated competence approved by the instructor. This course is a continuation of Theatre 106. Emphasis is on characterization and ensemble acting. (2 Lec., 3 Lab.)

# (THE) 109 Voice And Articulation (3)

Students may register for either Speech 109 or Theatre 109 but may receive credit for only one of the two. Emphasis is on improving voice and pronunciation. (3 Lec.)

#### (THE) 110 History Of Theatre I (3)

Theatre is surveyed from its beginning through the 16th century. The theatre is studied in each period as a part of the total culture of the period. (3 Lec.)

# (THE) 111 History Of Theatre II (3)

Theatre is surveyed from the 17th century through the 20th century. The theatre is studied in each period as a part of the total culture of the period. (3 Lec.)

# (THE) 112 Beginning Dance Technique in Theatre (3)

Basic movements of the dance are explored. Emphasis is on swing movements, circular motion, fall and recovery, contraction and release, and contrast of literal and abstract movements. Body balance, manipulation of trunk and limbs, and the rhythmic flow of physical energy are developed. (2 Lec., 3 Lab.)

# (THE) 113 Intermediate Dance (3)

Prerequisite: Theatre 112 or demonstrated competence approved by the instructor. Various aspects of dance are surveyed. Topics include the role of dance in total theatre, the evolution of dance styles, and the jazz style. Emphasis is on the flow of movement, body placement, dynamic intensity, level, focus, and direction. (2 Lec., 3 Lab.)

# (THE) 114 Rehearsal And Performance I (1)

Participation in the class may include any phase of rehearsal and performance of the current theatrical presentation. This course may be repeated for credit. (3 Lab.)

# (THE) 199 Demonstration Lab (1)

Scenes studied in various theatre classes are demonstrated to show contrast and different styles. This course may be repeated for credit. (1 Lab.)

# (THE) 201 Television Production ! (3)

Station organization, studio operation, and the use of studio equipment are introduced. Topics include continuity, camera, sound, lights, and videotape recording. (2 Lec., 3 Lab.)

# (THE) 202 Television Production II (3)

Prerequisite: Theatre 201. This course is a continuation of Theatre 201. Emphasis is on the concept and technique of production in practical situations. (2 Lec., 3 Lab.)

# (THE) 205 Scene Study I (3)

Prerequisites: Theatre 106 and 107. Emphasis is on the study, rehearsal and performance of selected scenes of various periods and styles. (2 Lec., 3 Lab.)

#### (THE) 207 Scene Study II (3)

Prerequisite: Theatre 205. This course is a continuation of Theatre 205. Emphasis is on individual needs of the performer and the various styles of production. (2 Lec., 3 Lab.)

# (THE) 210 Rehearsal And Performance II (2)

Participation in the class may include any phase of rehearsal and performance of the current theatrical presentation. This course may be repeated for credit. (6 Lab.)

# (THE) 236 Theatre Workshop (3)

A course in theatre with emphasis on performance techniques in musical and repertory theatre with practical performance experience. This course may be repeated for credit. (2 Lec., 3 Lab.)

#### WELDING

# (WE) 101 Basic Welding And Cutting Practices (3)

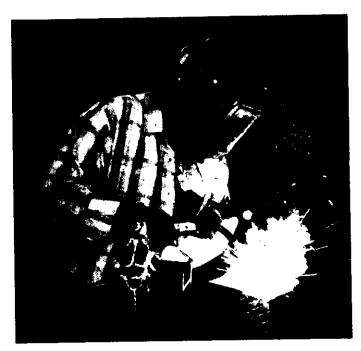
This course is for students who need welding on the job, such as in auto body, auto mechanics, or air conditioning. Emphasis is on setting up and using oxyfuel equipment. Cutting up to and including 3/8" mild steel, welding up to and including 1/8" mild steel, and brazing up to and including 16 ga. mild steel are all included. Setting up and using arc welding equipment are also included. Welding 1/4" through 3/8" mild steel in the flat and vertical position using E60's series electrodes is covered. Laboratory fee. (1 Lec., 5 Lab.)

#### (WE) 111 Oxyfuel I (2)

This course gives both theory and practice in basic tools, equipment and processes used in welding and brazing guage materials. Lab work includes preparation and performance of welded and brazed joints. Laboratory fee. (60 Contact Hours)

#### (WE) 112 Oxyfuel II (2)

Prerequisite: Welding 111. This course give both theory and practice in the basic tools, equipment and procedures used in layout, cutting, shaping, forming and the heat treating of metals. Lab work includes the selection and use of fuel gases for heat treating and the set-up and usage of semi-automatic and manual cutting equipment. Laboratory fee. (60 Contact Hours)



# (WE) 113 Shielded Metal Arc Welding I (2)

This course gives both theory and practice in the identification and usage of shielded metal arc welding electrodes. Laboratory work includes the use of E60 and E70 series including low hydrogen electrodes primarily in the flat and horizontal position. Laboratory fee. (60 Contact Hours)

# (WE) 114 Shielded Metal Arc Welding II (2)

Prerequisite: Welding 113. This course includes both theory and laboratory work, emphasizing the production and properties of mild steel alloys. Arc welding equipment set-up and operation are also included. Laboratory work will include the use of E60 and E70 series electrodes primarily in the vertical and overhead position. Laboratory fee. (60 Contact Hours)

# (WE) 115 Shielded Metal Arc Welding III (4)

Prerequisite: Welding 114. This course gives both the theory and practice in code quality welding. Laboratory work includes passing standard tests according to the American Welding Society and American Society of Mechanical Engineers for certifying procedures for 3/16"-3/4" thickness range material in all positions. Laboratory fee. (120 Contact Hours)

# (WE) 116 Shielded Metal Arc Welding IV (4)

Prerequisite: Welding 115. This course is designed to introduce the basis of shielded metal arc welding of pipe. Lab work includes welding 3"through 10" schedule 40 mild steel pipe. The vertical, horizontal rolled and fixed using E60 and E70 series electrodes are included. Laboratory fee. (120 Contact Hours)

#### (WE) 117 General Metal Layout (3)

Prerequisite: Drafting 182 or equivalent. This course gives both theory and practice in blueprint reading, welding symbols, layout work and fabrication techniques of metal weldments. Lab work consists of developing shop drawing and fabrication of designed structures. Laboratory fee. (90 Contact Hours)

# (WE) 118 Welding Inspection And Quality Control (4)

Prerequisites: Welding 117 and six credit hours of welding lab courses or equivalent. This course is both theory and practical application of welding codes, processes, testing procedures, testing equipment and weld discontinuities. Lab work emphasis is on inspection and qualification of welds and welding procedures. (120 Contact Hours)

# (WE) 211 Gas Tungsten Arc Welding I (2)

This course gives both theory and practice in the set-up and use of gas-tungsten arc welding of plate. Laboratory work will include setting up and using 18 guage through 3/8" thick mild steel, stainless and aluminum. Welds will be made primarily in the flat and horizontal positions. Laboratory fee. (60 Contact Hours)

# (WE) 212 Gas Tungsten Arc Welding II (2)

Prerequisite: Welding 211 or equivalent. This course gives both theory and practice in the set-up and use of gas tungsten arc welding of pipe. Lab work includes the welding of thin wall tubing and schedule 40 pipe. Welding is primarily in the vertical, horizontal rolled and horizontal fixed positions. Laboratory fee. (60 Contact Hours)

# (WE) 213 Gas Tungsten Arc Welding III (4)

Prerequisite: Welding 212 or equivalent. This is an advanced theory and skills course in the use of gas tungsten arc welding of plate and pipe. Lab work will include passing the standard qualification test in a variety of metals in all positions. Laboratory fee. (120 Contact Hours)

# (WE) 214 Gas Metal Arc Welding I (2)

This course gives both theory and practice in the set-up and use of gas metal arc welding processes of plate. Lab work will be on setting up and using gas metal arc welding equipment in welding 18 guage 3/8" thick mild steel, stainless and aluminum, primarily in the flat and horizontal position. Laboratory fee. (60 Contact Hours)

#### (WE) 215 Gas Metal Arc Welding II (2)

Prerequisite: Welding 214. This course gives both theory and practice in the set-up and use of gas metal arc welding processes of pipe. Lab work includes the welding of schedule 40 mild steel pipe in the vertical, horizontal rolled and fixed positions. Laboratory fee. (60 Contact Hours)

#### (WE) 216 Gas Metal Arc Welding III (4)

Prerequisite: Welding 215. This is an advanced theory and skills course in the use of gas metal arc welding of plate and pipe. Lab work will be on passing the standard qualification test in plate and pipe on plate and pipe in a variety of metals and thickness ranges in all positions. Laboratory fee. (120 Contact Hours)

#### (WE) 217 Basic Welding Metallurgy (3)

This is a theory type course designed to assist those students in welding and related industries to refresh and extend their knowledge of the behavior of the various fabricating metals during welding. The effects of the joining processes and procedures on the fabrication and service performance of weldments are also considered. Laboratory fee. (90 Contact Hours)

# (WE) 218 Applied Welding Metallurgy (3)

Prerequisites: Welding 217 and six credit hours of welding lab courses. This course is designed to assist the student in improving communication skills with welding engineers and metallurgists. The course includes a study of welding processes and their relationship to and effect upon metals and why they can or cannot be used for certain applications; the theory of heat treating and its many uses; the value of preheat, interpass temperature, and post-heat in welding procedures. This course should increase the student's knowledge of what metals are made of and why they are used for specific industrial applications; to strengthen the knowledge and understanding of the grain structure of metals and the effect that welding processes have on them. Laboratory fee. (90 Contact Hours)

#### (WE) 219 Welding Design (3)

Prerequisites: Welding 117 and six credit hours of welding lab courses or equivalent. Concepts in designing products for welding, joint design and selection, weld size determination, welding costs, codes and applications in welding. A design project is chosen and carried to completion using the design team concept. Laboratory fee. (90 Contact Hours)

# (WE) 221 Special Welding Applications (1)

This is a skill development course designed to allow students to program their own specialized objectives under instructional supervision. This will permit the student to upgrade present skills or develop a new skill. This course may be repeated for credit as topics vary. Laboratory fee. (30 Contact Hours)

#### (WE) 222 Special Welding Applications (2)

This is a skill development course designed to allow students to program their own specialized objectives under instructional supervision. This will permit the student to upgrade present skills or develop a new skill. This course may be repeated for credit as topics vary. Laboratory fee. (60 Contact Hours)

# (WE) 223 Special Welding Applications (3)

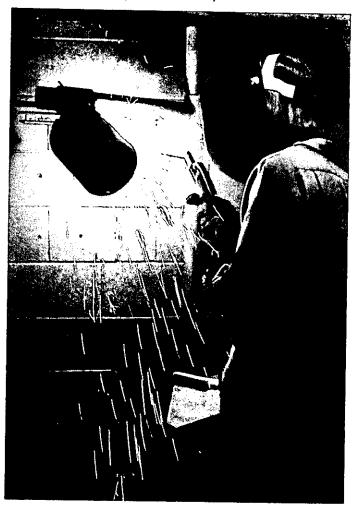
This is a skill development course designed to allow students to program their own specialized objectives under instructional supervision. This will permit the student to upgrade present skills or develop a new skill. This course may be repeated for credit as topics vary. Laboratory fee. (90 Contact Hours)

# (WE) 704 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in Welding Technology or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences related to the welding field. The seminar consists of group or individual meetings with the instructor, individualized plans for job-related or self improvement (i.e. preparation of job applications, job interview, job site interpersonal relations, employer expectations of employees), or combinations of both. (1 Lec., 20 Lab.)

# (WE) 714 Cooperative Work Experience (4)

Prerequisites: Completion of two courses in Welding Technology or instructor approval. This course combines productive work experience with academic study. The student, employer and instructor will develop a written competency-based learning plan with varied learning objectives and work experiences related to the welding field. The seminar consists of group or individual meetings with the instructor, individualized plans for job-related or self improvement (i.e. preparation of resumes, changing jobs, supervising subordinates, building self-esteem), or combinations of both. (1 Lec., 20 Lab.)



# **DCCCD TELECOURSES**

The following courses are offered on campus and may be offered via television:

- (ACC) 201 Principles of Accounting 1
- (ANT) 101 Cultural Anthropology
- (BUS) 105 Introduction to Business
- (CIS) 103 Introduction to Computer Information Systems
- (ECO) 201 Principles of Economics I
- (ECO) 202 Principles of Economics II
- (ENG) 101 Composition I
- (ENG) 102 Composition II
- (GVT) 101 American Government
- (GVT) 102 American Government
- (HST) 101 History of the United States
- (HST) 102 History of the United States
- (HUM) 101 Introduction to the Humanities
- (MGT) 136 Principles of Management
- (PEH) 101 Health for Today
- (PSY) 101 Introduction to Psychology
- (PSY) 201 Developmental Psychology
- (SOC) 101 Introduction to Sociology

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