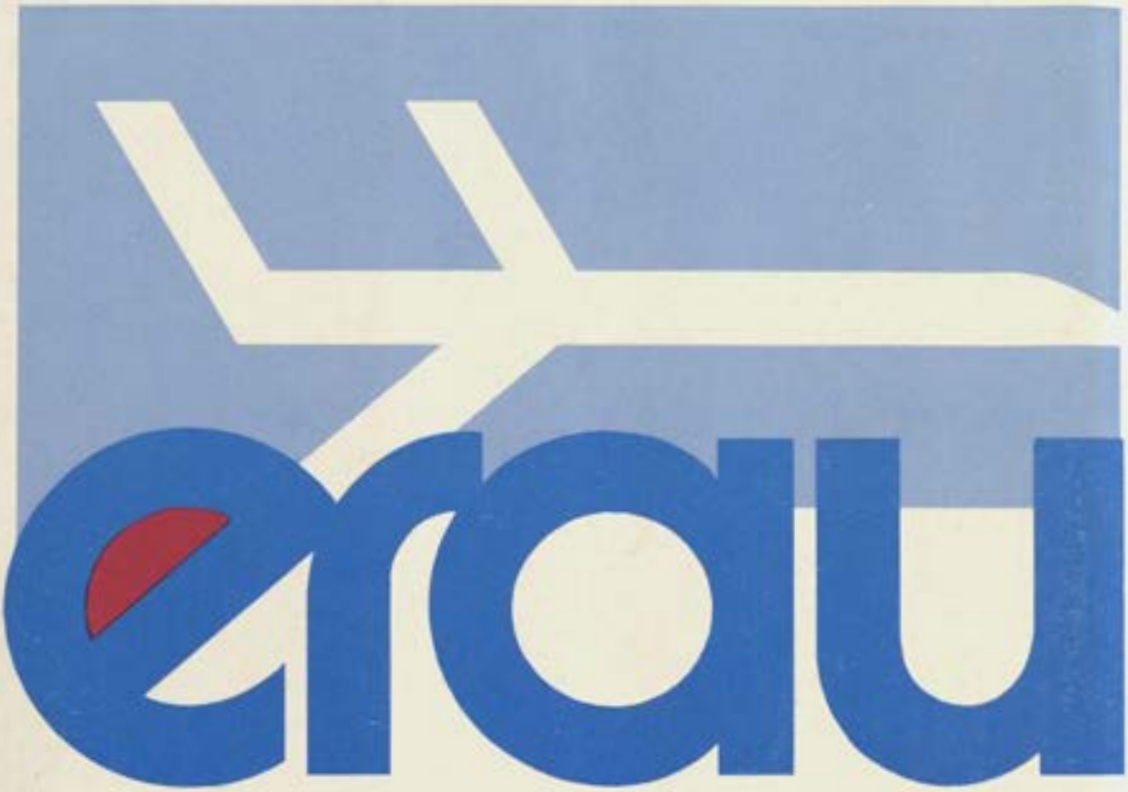
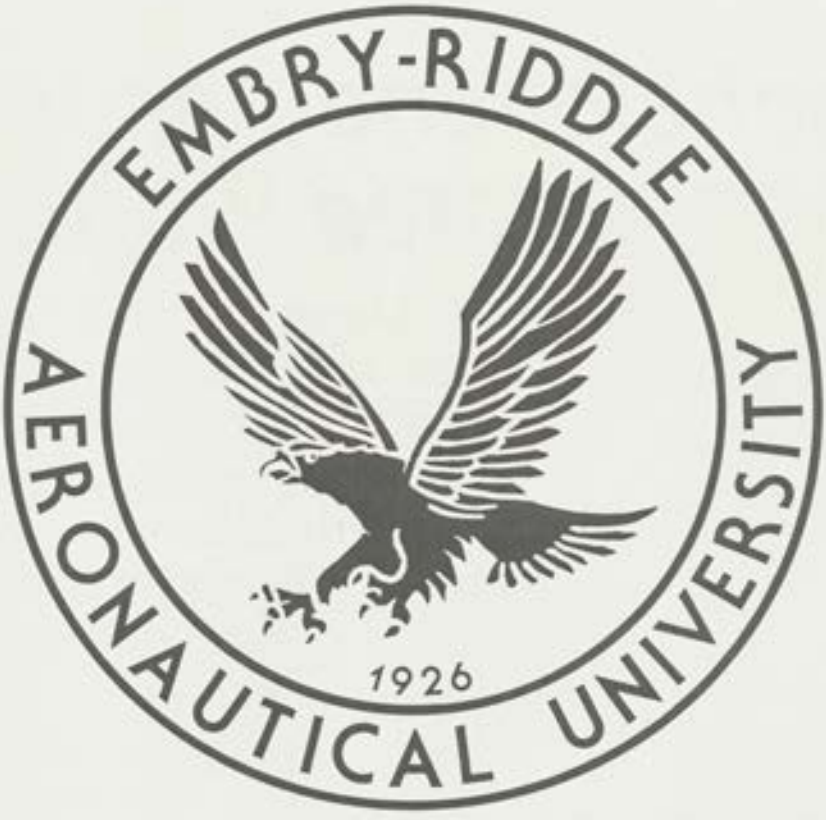


catalog '75-'76

Embry-Riddle Aeronautical University

Golden Anniversary Catalog
1975-76



EMBRY-RIDDLE AERONAUTICAL UNIVERSITY

"Serving the world of Aviation through Education for 50 years"

Certificate Programs

Maintenance Technology
Flight Technology

Bachelor and Associate Degree Programs

Aviation Maintenance Management
Aviation Maintenance Technology
Aircraft Engineering Technology
Aeronautical Engineering
Professional Aeronautics
Aviation Management
Aeronautical Science
Aeronautical Studies
Aviation Safety Management

Graduate Degree Programs

Aviation Management

CAREER POTENTIALS

Aeronautical Engineering

A Bachelor of Science degree in Aeronautical Engineering is the door to infinite possibilities within the broad field of engineering. Employment opportunities are especially promising in design and testing programs. The engineer is qualified to seek employment in such career fields as:

- Research
- Developmental Engineering
- Design Engineering
- Stress Analysis Engineering
- Engineering Programming
- Production Engineering
- Quality Control Engineering
- Modification Engineering
- Analytical Engineering
- Field Engineering
- Engineering Sales
- Aircraft Structural Engineering
- Project Engineering
- Component Manufacturing Engineering
- Propulsion
- Missiles
- Space Shuttle
- Technical Illustration
- Technical Reporting
- Mathematical And Statistics Engineering

Bachelor of Science

3 years
9 Trimesters

Aircraft Engineering Technology

Skilled technicians with their Maintenance Technology licenses are in great demand, particularly as aircraft and their component parts become more complex. This degree program prepares graduates to assume responsibility in such areas as:

- Production Supervision
- Maintenance Consulting
- Project Engineering
- Liaison Engineering
- Design Engineering
- Program Planning
- Inspection
- Safety Consulting
- Test Engineering
- Quality Control
- Customer Service

Associate in Science or Bachelor of Science. Qualify for FAA Maintenance Technology ratings

(AS) 3 years
9 Trimesters

(BS) 3 years, 8 mos.
11 trimesters

Aeronautical Engineering Technology

There is increasing demand for technicians with an engineering background within the broad scope of the Aviation and Aerospace Industries. This training enables early entrance into his career field, to gain valuable experience while on the job and perhaps complete requirements while gainfully employed. Potential career opportunities include:

Assistant to:
- Aerospace Engineers
- Design Engineers
- Industrial Engineers
- Research Engineers
- Developmental Engineers
- Analytical Engineers
- Quality Control Engineers
- Modification Engineers
- Analytical Engineers

Technician in:
- Computer Engineering
- Safety Engineering
- Axionics
- Electronics
- Project Engineering
- Safety Engineering
- Customer Service
- Component Repair Facilities
- Technical Illustrator

Associate in Science

1 year, 8 mos.
5 Trimesters

CAREER POTENTIALS

Aeronautical Science

General Education and Aviation oriented courses are combined with Flight Training to prepare this individual to serve in various capacities as a Professional Pilot. Incident to completion of the degree, the student becomes qualified to obtain the FAA Commercial Pilot Certificate, Instrument, Multi-Engine and Flight Instructor Ratings. Potential areas of employment include:

Pilot:
Commercial Airlines
Commuter Airlines
Corporate
Charter
Air Taxi Operations
Air Freight
Aerial And Photography
Surveying
Flight Instructing
Ground Instructing

Management Responsibilities within the broad spectrum of the Aviation Industry.
Customer Service
Sales Representation
Aviation Planning
Agricultural Applications
Bush Flying
Navigation

Bachelor of Science
or
Associate in Science

(BS) 2 years, 8 mos. or (AS) 1 year, 8 mos.
8 Trimesters 5 Trimesters

Aeronautical Studies

The selection of an area of concentration within the degree program in such areas as Flight Technology, Management, Maintenance Technology, Aeronautical Engineering or Reserve Officers Training permits the student to choose that which is most relevant to his overall career objective. The curriculum is parallel to the Aeronautical Science degree in that most of the required courses are also required for the Aeronautical Studies degree except for flight training courses. Opportunities for potential employment are included in a broad spectrum of aviation management responsibilities within Industry, Government or the Military depending on the area of concentration selected. Potential fields of employment include:

Flying
Airline Operations
Fixed Base Operations
Federal Aviation Specialists
Industrial Fleet Maintenance

Component Manufacturing
Industrial Relations
Marketing
Technical Representation
Military Aviation

Bachelor of Science
or
Associate in Science

(BS) 2 years 8 months or (AS) 1 year 8 months
8 Trimesters 5 Trimesters

Flight Technology

Students receive concentrated training in various types of flying, including instrument and multi-engine flying. Ground School subjects round out the professional training. Career opportunities include:

Commercial Airlines
Commuter Airlines
Corporate Flying
Flight Instructing
Ground Instructing
Charter Flying
Navigation

Aviation Planning
Bush Flying
Agricultural Applications
Aerial Photography
Aerial Surveying
Petroleum Industry

Qualify for FAA Certification
and Instrument Ratings

8 mos. to 10 mos.

Aviation Management

There is a constant, continuing need for employees with management training to fill executive, administrative and supervisory positions within every facet of the field of aviation. Graduates with this degree qualify for positions in such areas of responsibility as:

- Marketing
- Advertising
- Operations
- Program Management
- Contracts Management
- Project Control
- District Sales Management
- Airport Management
- Financial Administration
- Manufacturing Representation
- Purchasing
- Customer Service Representation
- Fixed Base Operations
- Industrial Relations
- Personnel Management
- Airlines Management

Bachelor of Science or
Associate in Science

(BS) 2 years, 8 mos. or (AS) 1 year, 8 mos.
8 Trimesters 5 Trimesters

Aviation Maintenance Management

This degree program combines the Maintenance Technology Certificates with management courses to prepare the student for managerial and supervisory responsibilities in the critically important maintenance fields. This training specifically prepares the graduate to serve as liaison between management and the skilled workers. Employment opportunities include:

- Operation Management
- Maintenance Department Supervision
- Assembly Supervision
- Service Management
- Inspector Supervision
- Technical Report Writing
- Field Representation
- Instrument Workshop Supervision
- Overhaul Shop Management
- Fixed Base Operations
- Safety Engineer-Maintenance Management
- Customer Service

Bachelor of Science
18 months (Aircraft Maintenance Technology course)
Plus 6 Trimesters (Academic course)

Associate in Science
AMT Course plus 4 trimesters

Professional Aeronautics

This degree program is designed to enable the student to assume positions of supervisory responsibility within the professional fields shown below. The bachelor's degree will provide the basis for entrance to graduate study in business or management. (These programs are open only to professionals in the selected skill areas identified as areas of concentration)

- Air Traffic Control
- Airway Facilities
- Airline Command Pilot
- Aircraft Maintenance
- Aviation Weather
- Aviation Electronics
- Flight Operations
- Flight Simulation
- Flight Technology

Bachelor's Degree
Professional qualification
Plus 4-6 trimesters

Associate Degree
Professional qualification
Plus 3 trimesters

Aircraft Maintenance Technology

Includes intense shop training for skills required to disassemble, repair and reassemble modern airframes, jet and piston power plants. In eighteen months one is ready to move into areas of responsibility as an Aircraft Maintenance Technician with:

- Commercial Airlines
- Engine Manufacturers
- Aircraft Manufacturers
- Rocket and Missile Industries
- Commuter Airlines
- Industrial Fleet Maintenance
- Component Manufacturers

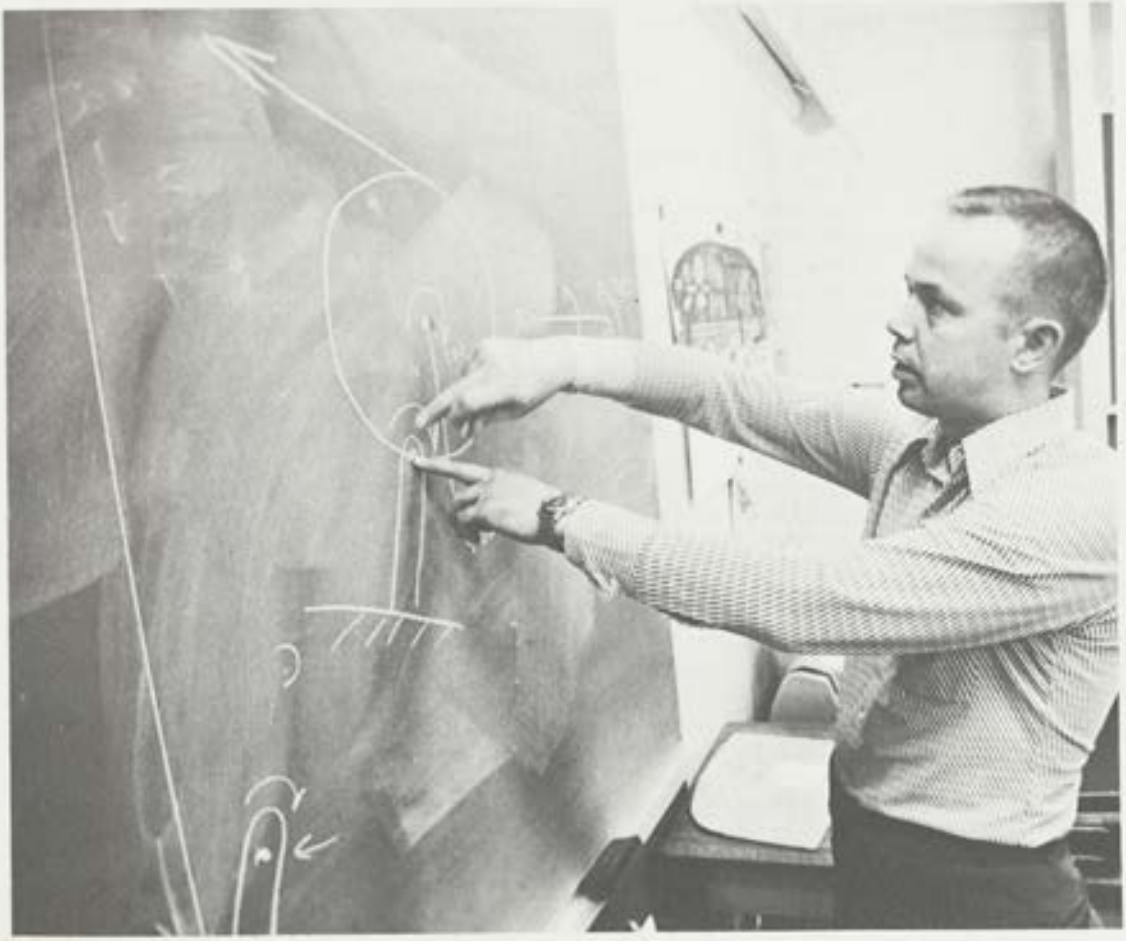
Certificate of Completion
qualifies for FAA Maintenance Technology
Certificate — A.S. Degree

18 months
(4½ Trimesters)

Table of Contents

FINANCIAL INFORMATION

FACULTY & ADMINISTRATION



EMBRY-RIDDLE AERONAUTICAL UNIVERSITY CALENDAR

SUMMER TRIMESTER (TERM A) 1975

May 5	All entering students report for Orientation (Arrival on Campus)
May 5-9	Orientation (Mandatory)
May 8-9	Registration
May 12	Classes begin
May 14	Last day to add Term A courses and late registration
May 16	Last day to make payment or arrange settlement of trimester tuition and fees etc., with the Cashier by 3:00 p.m.
May 21	Last day to add full Summer term courses
May 21	Last day to submit application for June Graduation
May 22	Last day to officially drop classes for Term A and receive 50% refund of tuition
May 26	Federal Holiday — University closed
June 3	Last day to drop full Summer trimester courses and receive 50% refund of tuition
June 6	Last day to make up incomplete (I) grades. (Spring trimester)
June 20	Last day to officially drop Term A courses and to change course registration from credit to audit
June 26-27	Final examinations
June 27	End of Term A

TERM B 1975

June 25	All entering students report for Orientation (Arrival on Campus)
June 25-27	Orientation (Mandatory)
June 30	Registration
July 1	Classes begin
July 3	Last day to add Term B courses and late registration. Last day to submit application for August Graduation
July 4	Independence Day Holiday — University closed
July 7	Last day to make payment or arrange settlement of Term B tuition and fees with the Cashier by 3:00 p.m.
July 11	Last day to drop Term B courses and receive 50% refund of tuition
July 18	Last day to make up incomplete (I) grades. (Term A Summer trimester)
Aug 13	Last day to officially drop courses for Term B and to change course registration from credit to audit
Aug 14	Last day for completion of graduation requirements, other than final grades
Aug 19-21	Final examinations
Aug 22	Graduation — End of Term

FALL TRIMESTER 1975

Sept 1	Labor Day Holiday — University closed
Sept 2	All entering students report for Orientation. (Arrival on campus)
Sept 2-6	Orientation (Mandatory)
Sept 4-6	Registration — afternoon of Thursday the 4th Seniors, morning of Friday the 5th Juniors, afternoon of Friday the 5th Sophomores, and Saturday the 6th transfer students and Freshmen
Sept 8	Classes begin
Sept 15	Last day to add courses and late registration
Sept 16	Last day to make payment or arrange settlement of trimester tuition, fees, etc., with the Cashier by 3:00 p.m.
Sept 19	Last day to make up incomplete (I) grades. (Summer Trimester B-Term)
Sept 29	Last day to withdraw from classes and receive 50% refund of tuition
Oct 3	Last day to make up incomplete (I) grades from full Summer Trimester courses
Oct 27	Orientation for Maintenance Technology. Mid-Trimester registration for Maintenance Technology
Oct 27	Faculty turn in Mid-Term grades to Student Records Office
Oct 28	Mid-Trimester classes begin for Maintenance Technology
Oct 28	Last day to submit application for December Graduation
Nov 17-28	Academic Counseling for Spring Trimester

Nov 27-28	Thanksgiving Holiday — University closed
Dec 1	Last day to officially drop courses, and to change course registration from credit to audit
Dec 8	Last day for completion of graduation requirements, other than final grades
Dec 12-18	Final examinations
Dec 19	Graduation — End of trimester

SPRING TRIMESTER 1976

Jan 6	All entering students report for Orientation (Arrival on Campus)
Jan 6-9	Orientation (Mandatory)
Jan 8-9	Registration
Jan 12	Classes begin
Jan 19	Last day to add courses and late registration
Jan 23	Last day to make payment or arrange settlement of trimester tuition, fees, etc., with Cashier by 3:00 p.m.
Jan 30	Last day to make up incomplete (I) grades (Fall Trimester)
Feb 16	Federal Holiday — University closed
Feb 27	Last day to submit application for April graduation
Mar 3	Orientation for Maintenance Tech
Mar 4	Mid-Trimester registration for Maintenance Tech
Mar 4	Faculty turn in mid-term grades to Student Records Office
Mar 5	Mid-Trimester classes begin for Maintenance Tech
Mar 15-19	Academic counseling for Summer Trimester
Apr 2	Last day to officially drop courses, and to change course registration from credit to audit
Apr 1-9	Academic counseling for Fall Trimester
Apr 9	Last day for completion of graduation requirements other than final grades
Apr 16-22	Final Examinations
Apr 23	Convocation & Graduation
Apr 23	End of Trimester

SUMMER TRIMESTER (TERM A) 1976

May 4	All entering students report for Orientation (Arrival on Campus)
May 4-6	Orientation
May 6-7	Registration
May 10	Classes begin
May 12	Last day to add Term A courses and late registration
May 14	Last day to make payment or arrange settlement of trimester tuition, fees, etc., with Cashier by 3:00 p.m.
May 19	Last day to withdraw from Term A classes and receive a 50% refund of tuition
May 21	Last day to add full Summer Term courses
May 24	Federal Holiday — University closed
May 28	Last day to submit application for June graduation
May 31	Last day to withdraw from full Summer Trimester classes and receive 50% refund of tuition
June 4	Last day to make up incomplete (I) grades (Spring Trimester)
June 18	Last day to officially drop courses for Term A. Last day to change course registration from credit to audit
June 28-29	Final Examinations
June 29	End of Term A

(TERM B)

June 27	All entering students report for Orientation (Arrival on Campus)
June 28-29	Orientation begins (Mandatory)
June 30	Registration (Term B only)
July 1	Classes begin
July 5	Independence Day Holiday — University closed
July 6	Last day to add Term B courses, and late registration
July 8	Last day to make payment or arrange settlement of trimester tuition, fees, etc., with Cashier by 3:00 p.m.
July 9	Last day to submit application for August graduation
July 12	Last day to withdraw from Term A classes and receive a 50% refund of tuition
July 20	Last day to make up incomplete (I) grades (Summer Term A)
July 26-30	Academic counseling for Fall Trimester
Aug 6	Last day for completion of graduation requirements, other than final grades

Aug 13	Last day to officially drop Term B classes, last day to change course registration from credit to audit
Aug 18-20	Final examinations
Aug 21	Graduation End of Term B and Summer Trimester

FALL TRIMESTER 1976

Sept 6	Labor Day Holiday—University closed
Sept 7	All entering students report for Orientation (Arrival on Campus)
Sept 7-11	Orientation (Mandatory)
Sept 9-11	Registration afternoon of Thursday the 9th Seniors, morning of Friday the 10th Juniors, afternoon of Friday the 10th Sophomores, and Saturday the 11th transfer and new students
Sept 13	Classes begin
Sept 17	Last day to make up incomplete (I) grades (Summer Trimester Term B)
Sept 20	Last day to add courses and last day for late registration
Sept 24	Last day to make payment or arrange settlement of trimester tuition, fees, etc., with Cashier by 3:00 p.m.
Oct 1	Last day to make up incomplete (I) grades for full trimester Summer courses.
Oct 4	Last day to withdraw from classes and receive 50% refund of tuition
Oct 29	Last day to submit application for December Graduation
Nov 1	Orientation for Maintenance Technology. Mid-Trimester registration for Maintenance Technology
Nov 1	Faculty turn in Mid-Term grades to Student Records Office
Nov 2	Mid-Trimester classes begin for Maintenance Technology
Nov 16-24	Academic Counseling for Spring Trimester
Nov 25-26	Thanksgiving Holiday—University closed
Dec 3	Last day to officially drop classes and last day to change course registration from credit to audit
Dec 13	Last day for completion of graduation requirements, other than final grades
Dec 16-21	Final Examinations
Dec 22	Graduation End of Trimester

SPRING TRIMESTER 1977

Jan 4	All entering students report for Orientation (Arrival on Campus)
Jan 4-7	Orientation (Mandatory)
Jan 6-7	Registration
Jan 10	Classes begin
Jan 17	Last day to add courses and late registration
Jan 21	Last day to make payment or arrange settlement of trimester tuition, fees, etc., with Cashier by 3:00 p.m.
Feb 2	Last day to make up incomplete (I) grades (Fall Trimester)
Feb 21	Federal Holiday—University closed
Mar 1	Last day to submit application for April graduation
Mar 2	Orientation for Maintenance Technology
Mar 3	Mid-Trimester registration for Maintenance Technology
Mar 4	Faculty turn in Mid-Term grades to Student Records Office. Mid-Trimester classes begin for Maintenance Technology
Mar 14-22	Academic counseling for Summer Trimester
Mar 23-31	Academic counseling for Fall Trimester
Apr 1	Last day to officially drop courses and change course registration from credit to audit
Apr 8	Last day for completion of graduation requirements, other than final grades
Apr 15-21	Final examinations
Apr 22	Convocation & Graduation. End of Trimester

GENERAL INFORMATION

GENERAL INFORMATION

A Golden Year

The year 1976 is a banner year for the United States — the Bicentennial — and a truly golden year for Embry-Riddle Aeronautical University. It's our fiftieth anniversary!

In those 50 years we have grown from a small flight school; first to Embry-Riddle International School of Aviation, then to Embry-Riddle Aeronautical Institute and finally to the full university we are today.

Our three colleges have programs which range from certificates in maintenance and flight technology on through the Associate in Science Degree, the Bachelor of Science Degree and a Master's Degree in Aviation Management.

Embry-Riddle students come from all over the world and Embry-Riddle graduates are working all over the world in the field of aviation.

All of this began in 1926 at Lunken Airport in Cincinnati, Ohio, with aviators T. Higby Embry and J. Paul Riddle. They had a mail carrying operation and found it was more expedient to train their own pilots and mechanics.

Two years later Embry-Riddle joined with similar air carriers to form American Airlines. Its flying school operation subsequently was moved to Miami, Florida.

The small flight school grew rapidly and soon became recognized nationally and internationally as a leader in aeronautical education. At the outbreak of World War II it assisted the U.S. Army and the Air Forces of England and France in training pilots and mechanics.

As its curriculum grew, it became a leader in the field of aviation academics as well as flight.

As part of its growth process, Embry-Riddle moved to its present site at Daytona Beach Regional Airport in 1965. Here, a $25 million campus has been designed on 95 well placed acres. When it's completed, the Daytona Beach campus will accommodate 5,000 students

Right now, Embry-Riddle has an enrollment of more than 3,200, with 1,600 on the main campus. There are students at consortia and resident centers throughout the U.S. and at resident centers in Germany, England, Spain and Greece. The students come from all 50 states and more than 60 countries.

Appropriately enough, the world's only accredited, private, non-profit, coeducational, totally aviation oriented university is just 10 minutes away from another unique "facility" — the World's Most Famous Beach. It's the beach you can drive on when the tide is out, with 23 miles of gleaming white sand. There's a river even closer and, as in most of Florida, all types of water sports are available year round.

Other sports also are well represented, with the Daytona International Speedway right next door to the campus. Quick and easy driving on interstate highways takes you to such nearby attractions as Disney World, Sea World, the Kennedy Space Center, St. Augustine, Marineland, Silver Springs, Cypress Gardens, Busch Gardens and Weeki Wachee Springs.

Married students with families will be glad to know the area has a fine comprehensive school system, churches of all denominations, modern hospitals and many playgrounds and parks.

Philosophy

Embry-Riddle Aeronautical University accepts as a responsibility:

The personal task of preparing students for responsible citizenship.

The educational task of adequately preparing students for productive occupational and professional careers in aviation.

The industrial task of maintaining the closest liaison with the aviation community and of maintaining a continuing dialogue with all elements of aviation.

Statement of Purpose

In accordance with the philosophy of the University, the following statement of purpose has been adopted:

To prepare the student for immediate productivity and effective contributions to aviation.

To develop within the student the ability to objectively evaluate the economic, political and moral affairs of man and society and to make advanced studies and research available to the student.

To provide the facilities, faculty and staff for the professional and intellectual climate needed to inspire students to acquire a high degree of inquisitiveness, professionalism, and skill in their chosen aviation fields.

To develop and maintain professional aviation-oriented educational programs consistent with high standards.

To maintain a constant and dynamic reevaluation of the various programs offered.

To provide each student with an awareness of self through courses in the humanities and the social sciences.

To sponsor and promote research activities appropriate to these purposes.

Accreditation and Affiliation

Embry-Riddle Aeronautical University is an accredited member of the Southern Association of Colleges and Schools. The Bachelor of Science curriculum in Aircraft Engineering Technology and the Associate of Science curriculum in Aeronautical Engineering Technology are accredited by the Engineers' Council for Professional Development, the national engineering accrediting agency. The Bachelor of Science Program in Aeronautical Engineering has been reviewed for accreditation by ECPD and full accreditation is anticipated. Technical programs in Aircraft Maintenance and Flight Technology are fully approved by the Federal Aviation Administration.

The University holds membership in the Independent Colleges and Universities of Florida, Florida Association of Colleges and Universities, and national, regional and state memberships in the following: American Association of Collegiate Registrars and Admissions Officers, American College Public Relations Association, National Association of College Admissions Counselors, College Placement Council, National Association of Student Personnel Administrators, Institute of International Education, Aviation Education Review Organization, American Society for Engineering Education.

ADMISSION TO THE UNIVERSITY

ADMISSION TO THE UNIVERSITY

General Requirements

Students should apply for admission at least sixty days prior to the start of the trimester in which they wish to enroll. Applications received later than this date will be processed, but applicants can expect delays in their date of admission and enrollment. An applicant must present evidence of satisfactory mental and physical health by submission of the completed University Health Form prior to enrollment. The Health Form must be executed within six months prior to the date of admission and mailed directly to the University Health Service. All students are required to present evidence of hospitalization insurance or purchase same at the time of registration.

All entering students who expect to participate in flight training must present a Federal Aviation Administration Airman's medical certificate (Class I or II) to the Flight Technology Division before flight training will be initiated. In addition, a copy of this FAA Class I or II medical certificate must be forwarded to the Admissions Office prior to entry.

All applicants must present an official transcript verifying completion of secondary education from an accredited secondary school. Graduates of non-accredited secondary schools, those not issued a diploma and those not completing a secondary program will be considered for admission on the basis of the General Education Development test provided they place above the 40th percentile in each subject area and above 45th percentile on the composite of the GED.

A fee of $25 must accompany all applications for admission or re-admission. Within thirty days of notification of acceptance, a $100 tuition deposit is required. This deposit is refundable, provided the student notifies the University by letter postmarked sixty days prior to the published registration date that he will not register.

For information concerning on or off campus housing accommodations, contact the Director of Housing.

Any concealment by an applicant of previous college registration, previous academic or disciplinary record in college, or falsification of any personal or educational qualifications required for admission will immediately cancel the admission process at Embry-Riddle Aeronautical University.

Applicants who have been accepted will be notified promptly and will receive registration instructions prior to the date established for registration. A student accepted into degree curriculums must have either ACT or SAT program offices or his high school forward his scores to the Admissions Office at least one month prior to date of enrollment. (See page 23) Those who find it impossible to meet this deadline may apply for special permission to take the tests on campus. If neither the transcript of scores nor campus administration of test deadlines has been met, a student wishing to enroll in a degree program will be charged a fee of $100 for the cost of individual administration of the placement test and late registration. ACT or SAT scores are not required for students entering certificate programs of the Maintenance and Flight Technology Divisions.

All credentials and application forms must be sent to:

Dean of Admissions and Records
Embry-Riddle
Aeronautical University,
Daytona Beach, Florida 32015

International Students

The credentials of applicants from foreign countries are evaluated in accordance with the general regulations governing admission. An application, application fee, photograph, and detailed transcripts of secondary and college (if appropriate) records must be submitted to the Dean of Admissions and Records at least six months in advance of the opening of the class in which the applicant seeks admission. The six month period will allow time for the exchange of necessary correspondence and documents relative to securing passports and visas for study in the United States. Applicants received from international students will not be processed without payment of the application fee.

Candidates for admission are required to consult the American Consulate or the American Embassy in their country of residence and make arrangements to take an English language examination. The results of this examination are an important factor in determining the acceptability of an applicant. Embry-Riddle must receive this information directly from the Consular Office or Testing Center before a decision concerning admission will be made.

In addition, candidates for admission must complete all arrangements for the necessary American dollars to cover tuition and living expenses. The student must furnish an advance statement of financial support. The amount of financial support required will be reflected in the letter sent to the student after receipt of the application for admission. The statement of financial support also is an important factor in determining the acceptability of an applicant.

Acceptance for admission of international students will be based on recommendations of the Committee on Admissions and on other requirements detailed in this Catalog. International students approved to enter will be required to present evidence of satisfactory mental and physical health at the time of admission and may be required to submit to a physical examination at their own expense.

Upon approval for admission, an advance deposit in the amount of $1,800 U.S. currency is required. Of this deposit $1,200 will apply toward tuition and expenses during the initial term of enrollment and $600 will be held by the University as an Emergency Fund. This Fund will only be utilized when an emergency arises, such as medical expenses, return trip home, etc. If not used, the money will be returned upon completion of the student's program. This $1,800 must be received by the Admissions Office before the letter confirming enrollment and forwarding the Certificate of Eligibility (Form I-20) is issued. This Certificate of Eligibility must be presented to the nearest office of the American Consulate in order to obtain the student visa and must be in the possession of all international students prior to departure from their country. A change of immigration status from tourist visa (or other) to student visa is not possible after the student's arrival at the University.

The Foreign Student Advisor implements the regulations of the Departments of Justice, State and Labor insofar as foreign students are subject to them. The Advisor's Office serves, by counseling and direct action, as a continuous service center for foreign students in solving their problems of whatever nature. Close liaison is maintained with academic advisors and helping services on and off campus.

A special cultural/English language orientation program is available and may be required for some international students.

Transfer Students

A candidate for admissions who has attended other accredited institutions of higher education must arrange for official transcripts to be sent directly to the Dean of Admissions and Records from the Registrar of each institution attended. If requested, the candidate must present the catalog of the institution from which he transfers, marked to indicate courses taken. Transfer credit will be granted under the following provisions:

(1) The student must be in good academic standing with the last institution attended, or, if admitted on probation, student will be granted transfer credit in accordance with University policy upon removal from probation at ERAU.

(2) Only those courses completed with "C" or better are transferable. A course with a grade of "D" may be accepted on the basis of passing satisfactorily an ERAU course equivalency examination.

(3) Previous flight experience may be accepted in accordance with the transfer policy stated under subheadings, "Advanced Standing (6)," page 21.

(4) Credit was earned at collegiate institutions that are accredited by the appropriate regional accrediting agency.

(5) All acceptable transfer work will be posted on the ERAU transcript. If the work is not applicable to the student's degree program, the work will be considered as electives in excess of minimal degree requirements.

Students not transferring credits in English and mathematics will be required to take the examinations described as "Placement Tests" and will be subject to University regulations governing these tests. (See page 23)

Students on probation at the last institution attended and students transferring from institutions not accredited by the appropriate regional accrediting agency will be placed on probation when enrolled. They must earn a gradepoint average of at least 2.0 the first trimester to continue in their degree curriculum.

Embry-Riddle reserves the right to require an evaluation examination for any course submitted for transfer credit if there is doubt concerning the equivalency of the transfer course with a similar course offered at Embry-Riddle.

Upon receipt of all official transcripts and documents and approval for admission, or upon removal from probationary status, an official evaluation of courses accepted for transfer credit will be forwarded to the student. The student's records (transcripts, etc.) will be evaluated according to the rules, regulations, and policies in the Catalog and the policy manual in effect at the time of his matriculation and registration on campus or at a residence center as a degree student.

Advanced Standing

Examination scores, training in military service schools, and professional background experience may be submitted as a basis for admission to an advanced level. Credit may be awarded as follows:

(1) The University offers advanced placement credit toward a college

degree to those students who present CEEB Advanced Placement Test scores of 5, 4 or 3.

(2) ERAU follows the standards recommended by the American Council on Education for awarding credit for CLEP and USAFI examinations. The courses and hours of credit which are recognized by ERAU for the general college level examinations by CLEP are as follows:

Communications..... 6 credit hours
Humanities..... 4 credit hours
Social Science..... 6 credit hours
Natural Science..... 6 credit hours
*Mathematics..... 3 credit hours

(3) Credit for the CLEP subject examinations (except for the last thirty credits required for a baccalaureate degree, or last fifteen credits required for an associate degree) will be accepted for equivalent ERAU courses with the approval of the Dean of the College granting the degree. Scores on these tests must be submitted upon initial enrollment as a degree candidate to be officially evaluated for credit. Additional credit by examination may be awarded as indicated below on page 22.

(4) Training in military service schools will be considered for credit by each curriculum division based on the recommendation of the American Council of Education.

(5) Applicants who have had professional experience in areas related to the curriculum in which they have requested enrollment, may be allowed credit toward advanced standing. Training and experience which satisfy educational objectives of courses in the applicant's curriculum may be credited for advanced standing by the appropriate College.

(6) Advanced standing may be granted for specific Aeronautical Science courses on the basis of flight related experience and training acquired prior to a student's enrollment at Embry-Riddle. The student must provide appropriate documentation to substantiate his background to the Dean, College of Aviation Technology, during his first trimester at Embry-Riddle. If the student has attended an FAA approved flight school, a transcript of all flight times, signed by the school's chief instructor, should be provided. This transcript along with personal flight logs will be used for placement evaluation. The number of credits awarded for advanced standing will comply with the following University policy:

Credit granted on the basis of FAA certificates and licenses (other than maintenance technician), FAA written examinations, and Flight Division evaluations for advanced standing, shall be one-half the amount of credit granted for those courses taken in residence. The credit differences between the amount awarded and the credit value assigned to the ERAU courses is to be made up in science/technology electives. The credit granted for FAA ratings earned through military training and for FAA ratings held by currently qualified airline pilots will be transferred as the equivalent of ERAU resident courses.

Flight Technology ground courses shall transfer to the degree programs at one-half the credit for the comparable Aeronautical Science courses. The credits needed to

*Not applicable to degree programs.

complete degree requirements are to be made up in science/technology electives.

Experience for which credit will be granted in accordance with the above procedures is as follows:

(a) Satisfactory completion of an FAA approved Private Pilot Ground School or satisfactory completion of the Private Pilot, or higher, written examination and a minimum of 40 hours of pilot experience: AS 100.
(b) Satisfactory completion of an FAA approved Commercial Pilot Ground School or satisfactory completion of the FAA Commercial Pilot, or higher, written examination and a minimum of 160 hours of pilot experience: AS 100, AS 102 and AS 103.
(c) Satisfactory completion of an FAA approved Instrument Ground School or satisfactory completion of the FAA Instrument Pilot written examination and a minimum of 200 hours of pilot experience: AS 100, AS 102, AS 103, AS 201 and AS 302.
(d) Satisfactory completion of a U.S. military undergraduate pilot training program: AS 100, AS 102, AS 103, AS 201 and AS 302. Graduates of USAF and U.S. Navy pilot training programs will also be granted credit for AS 209 and AS 307.
(e) Satisfactory completion of the FAA Airline Transport pilot written examination or FAA certified Commercial Airplane Pilots with a minimum of 2000 hours pilot experience: AS 100, AS 102, AS 103, AS 201, AS 209 and AS 302. An individual who meets the aforementioned qualifications, but is rated Rotary-wing only will be allowed credit for AS 100, AS 102, AS 103, and AS 201. If he has a Rotorcraft-Helicopter Standard Instrument rating, or has successfully completed the FAA instrument written examination, he may also be credited with AS 302.

A student who possesses qualifications not listed above and who considers that his background warrants consideration for advanced standing may submit appropriate evidence of his experience for evaluation, or the student may request that he be administered a course equivalency examination for specific courses. Flight experience will be evaluated in accordance with procedures outlined on pages 20-22.

Applications to take course equivalency examinations are to be filed at the Registration and Student Records office. A fee of $45 is charged for administering each written examination. A fee for a course equivalency examination for flight is dependent upon aircraft utilization. An examination may be taken only once for each course.

Applications for advanced standing must be submitted prior to or during the first trimester at Embry-Riddle and must include adequate documentation such as certification of professional level, evidence of completion of formal training programs and verification of work experience, where appropriate.

Advanced standing and transfer credit granted in accordance with these procedures will be authenticated by the appropriate college and validated by the Dean of Admissions and Records for official records purpose. An evaluation Form will be provided to the student.

Veterans

The State of Florida has approved all Embry-Riddle Aeronautical University programs for enrollment of veterans eligible for U.S. Veteran's Administration benefits under the various Public Laws.

Veterans planning to further their education under veterans' benefits at Embry-Riddle should secure their Certificate of Eligibility for training from the nearest Veterans' Administration office. Admission procedures for veterans are the same as those for other students. Upon enrollment at the University, veterans should process the Certificate of Eligibility through the University Veterans' Affairs office.

Degree Completion Program Active Duty

A college degree, either bachelor or associate, is a worthwhile and necessary goal of many military personnel. Recognizing the value of higher education, both to the military service and the individual, all branches of the Armed Services offer various "Bootstrap" and degree completion programs to qualified personnel. To the serious military applicant wishing to participate in one of these excellent programs, ERAU is pleased to offer all possible assistance.

Upon application and receipt of all supporting documents, University personnel will evaluate previously completed college courses, military education and experience to determine advanced academic credit. It is a pleasant surprise to most applicants to learn they are closer to earning a valuable aviation oriented degree than they thought.

Each applicant receives a copy of the University evaluation form stating specifically the courses for which credit has been granted.

Applications should be submitted at least ninety days prior to the proposed enrollment date.

Placement Tests

The American College Test (ACT) or the Scholastic Aptitude Test (SAT) is required for any student entering a degree program, either baccalaureate or associate.

Since these tests are given several times a year on a nationwide basis, the student should take the test before arriving on campus. The student should contact his or her high school guidance counselor or principal to determine the location of the nearest testing center. When a student registers for the test, the registration form should indicate in the proper space that a transcript of his scores will be sent to the University.

During the orientation period at the University, a reading test will be administered to all entering students. Certificate students will also be administered a mathematics tests.

The placement tests do not determine approval or disapproval for admission. However, when scores in the various subject areas indicate a weakness, the student may be required to enroll in one or more courses to improve his skills in that area.

Further details on the placement tests are given on page 115.

Registration for Continued Enrollment

After initial registration, a student must register for each subsequent trimester in which he or she plans to enroll. Tuition deposits, registration and payment of fees must be made in accordance with instructions published by the Dean of Admissions and Records.

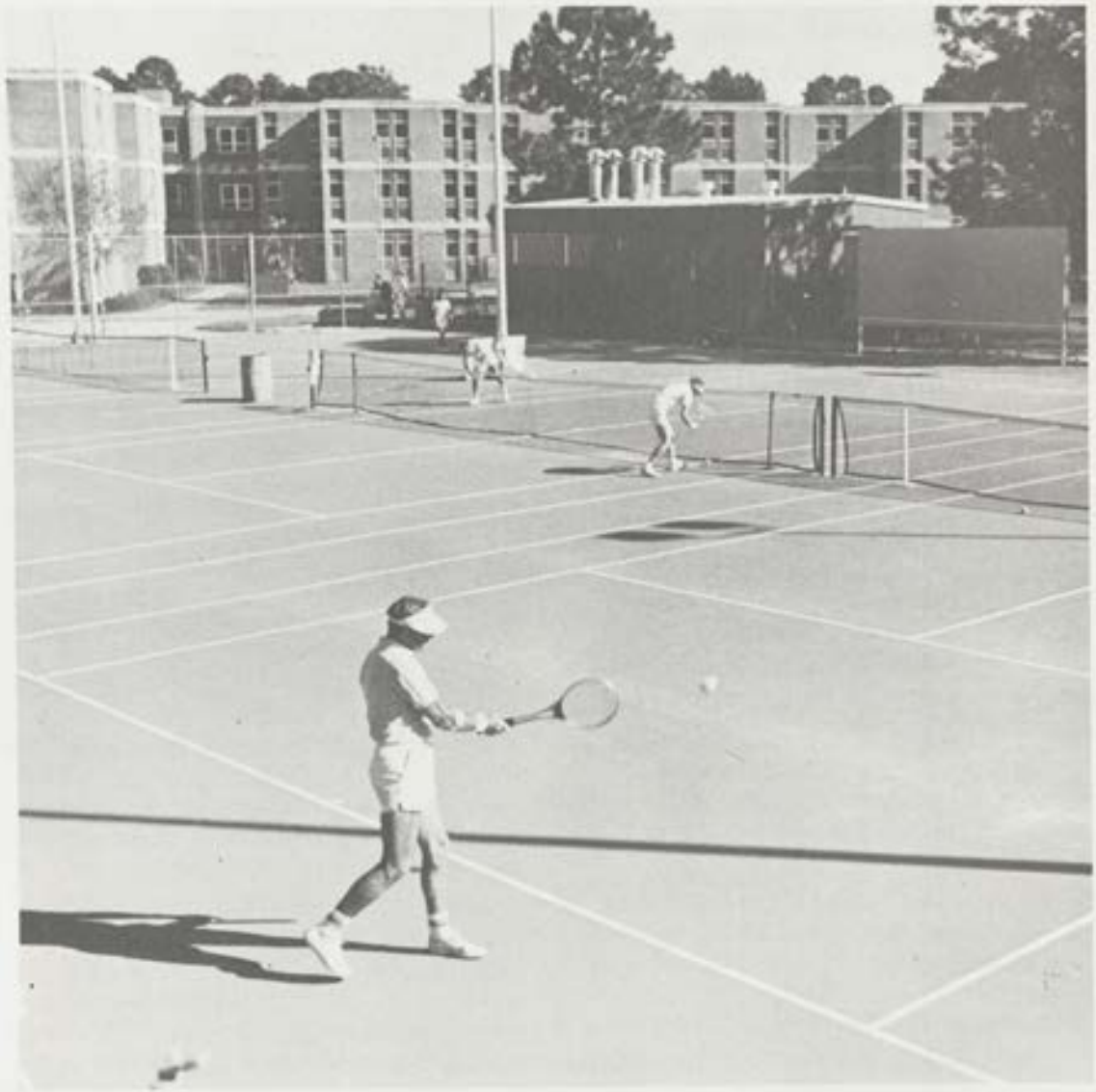
Penalties will be charged for late registration and late payment of fees. Late registration will be allowed during the first week of classes if unusual circumstances prohibited the student from registering during the scheduled period. (The late

registration fee of $50 applies in such cases.) Under no circumstances will registration be allowed after the first week of classes.

Continuous Enrollment

Students failing to maintain continuous enrollment for any reason are required to re-apply for admission. A student is considered a continuing student, regardless of the number of hours for which he or she is registered, unless he or she:

(1) Enrolls for twelve or more hours at another school,
(2) Leaves the University for two consecutive trimesters, or
(3) Has been dismissed from the University.



ACADEMIC AND CERTIFICATE PROGRAMS

ACADEMIC AND CERTIFICATE PROGRAMS

General Information

This section of the catalog describes the various Degree and Certificate programs offered by Embry-Riddle University as well as other special educational programs available to the student. The degree programs offered are as follows:

Bachelor of Science Degree:
- Aeronautical Engineering
- Aeronautical Science
- Aircraft Engineering Technology
- Aeronautical Studies
- Aviation Management
- Aviation Maintenance Management
- Management

Bachelor Degree:
- Professional Aeronautics

Associate in Science:
- Aeronautical Engineering Technology
- Aircraft Engineering Technology
- Aviation Management
- Aviation Maintenance Management
- Aviation Safety
- Aeronautical Studies
- Aircraft Engineering Technology
- Aeronautical Science

Associate in Aviation Maintenance Technology

Associate in Professional Aeronautics

Certificate Programs:
- Flight Technology
- Maintenance Technology

Masters Degree:
- Aviation Management

These Degrees and Certificates are offered through three Colleges which constitute the total instructional program of the University. The three Colleges are:

College of Aeronautical Studies
College of Aviation Technology
College of Continuing Education

The various program offerings are discussed below under the appropriate College. In addition to a description of each program and its potential industry/job relationship, any special requirements for admission, transfer of credit and advanced standing are discussed. A list of all courses required for each of the programs is provided. A description of each of these courses may be found in Section 4, "Course Descriptions."

Within certain degree programs, the student selects an Area of Concentration in a specific area or discipline. The Area of Concentration is designed to help the student focus his electives and optional courses so as to develop a greater depth of knowledge or skill in a selected area of application.

The Areas of Concentration are:

- Aeronautical Engineering
- Aeronautics
- Air Force Reserve Officers Training Program
- Airport Management
- Air Traffic Control Technology
- Air Transportation
- Airway Facilities Technology
- Applied Mathematics
- Army Reserve Officers Training Program
- Aviation Education
- Aviation Management
- Computer Technology
- Flight Technology
- Maintenance Technology
- Radio/Telephone Maintenance
- Airline Command Pilot
- *Avionics

It should be noted that not all Areas of Concentration are available in all Degree Programs; hence the student should review the various options and select the program which best meets his career objectives.

Developmental Courses

Embry-Riddle students come from all fifty states and over 60 foreign countries, with a wide variety of educational and experience backgrounds. In order to assist students in achieving the necessary basic skill level to succeed in college work, ERAU provides special courses in reading, mathematics, communications and English Language usage. These courses are available to all degree and certificate students, and may be required of certain students.

Academic Advising

Each student is assigned a faculty advisor who will assist the student in determining and carrying out a program which will meet the individual's educational objectives. Faculty academic advisors post a schedule of office hours and students should feel free to call on their advisors at any time assistance is desired.

The student should understand that he or she is responsible for maintaining a record of progress and for assuring that all requirements for completion of the program in which enrolled are met.

General Education Requirements

The General Education program of the University is designed to avoid narrowness of specialization and to supplement the professional career training provided in each major degree program. Each student is expected to achieve proficiency in the basic communicative skills of writing, speaking and mathematics and to develop those qualities and capabilities most valuable for the general welfare of the individual and society.

To provide these skills and knowledge, the following General Education requirements must be completed by all candidates for the bachelor's degree. Additional courses in one or more of these disciplines are required in some degree programs.

Number	Subject	Credits
COMPUTER TECHNOLOGY		
CT 209	Introduction to Computers	3
ECONOMICS		
EC 110	Economics I or EC 210 Econ. II	3
HUMANITIES		
HU 120	Communications I	3
HU 121	Communications II	3
HU 220	Communications III	3
HU 221	Technical Report Writing	2
HU 250	Logic or HU 340 Philosophy	3
MATHEMATICS		
At least two courses in basic college mathematics containing some algebra. MA 111 & 112 or MA 120 & 220, or MA 140 & 141, or MA 240 & 241		6

*Under development.

PHYSICAL SCIENCE		
PS 101	Basic Chemistry or PS 105 Chemistry with Lab (4 hours)	3
PS 103	Basic Physics, or PS 201 Physics I with Lab (5 hours)	3
SOCIAL SCIENCE		
SS 210	Sociology or SS 220 Psychology	3

AIR FORCE RESERVE OFFICER TRAINING CORPS PROGRAM

Embry-Riddle students may enroll in the on-campus Air Force Reserve Officers Training Corps (AFROTC) program and receive academic credit in an area of concentration in the Aeronautical Science, Aeronautical Studies, Aviation Management and Management programs or as elective course credit in certain of the remaining Embry-Riddle programs. The AFROTC curriculum is designed to prepare college men and women for initial active duty assignments as Air Force commissioned officers.

Any qualified student may pursue the AFROTC program. Both two and four year programs are available to male and female students. AFROTC courses can be individually tailored to accommodate the student provided at least four trimesters remain prior to graduation. AFROTC courses are not offered at Embry-Riddle during the summer trimester.

Enrollment procedures for the first two years of the four year program, known as the General Military Course (GMC), are the same as for any other college course. One simply selects an AFROTC class card during registration. To enter the last two years of the four year program, the Professional Officers Course (POC), the student must have taken the Air Force Officer Qualifying Test (AFOQT), an Air Force medical examination, and completed a four-week summer field training session at an active Air Force base. These actions will be accomplished during your first two years as a GMC cadet.

The two year program is basically the same as the last two years of the four year program but will be preceded by a six-week summer field training session. The two year program student must also take the AFOQT and Air Force medical examination prior to summer field training. Students interested in the two year program should contact the closest AFROTC detachment for AFOQT, medical examination, initial interview and summer field training scheduling. This information should then be forwarded to Detachment 157 here at Embry-Riddle.

Text books for all AFROTC courses are free. Students enrolled in the Professional Officers Course receive a $100 per month tax free subsistence allowance up to a total of $2,000. In addition, students attending summer field training will receive travel pay to and from the designated Air Force base as well as pay for attending the field training session.

Two, three and four year Air Force ROTC scholarships are also available to selected students. Historically Embry-Riddle students have enjoyed a high selection rate for AFROTC scholarships that pay for full tuition, textbooks, lab and incidental fees, and $100 per month. An item of particular interest is that the AFROTC scholarship pays for the required flight training for the Bachelor of Science degree in Aeronautical Science at Embry-Riddle. High school students interested in a four year scholarship must apply before 31 December of the year prior to high school graduation.

Army Reserve Officer Training Corps Program

The Army Reserve Officer Training Corps program is available to Embry-

Riddle students through a cooperative arrangement with nearby Stetson University. Most Army ROTC classes are offered on the Embry-Riddle campus, with some of the advanced classes offered only on the Stetson campus. For additional information on the Army program, interested students should write to Army ROTC, Stetson University, DeLand, Florida 32720.

Cooperative Education Program

Cooperative Education is an optional program open to all full-time students enrolled in an academic discipline at Embry-Riddle. The concept is based on the theory that not all learning is limited to the classroom but is dependent upon and reinforced by practical work experience. Academic credit is allowed for up to six trimesters of work at selected industries and agencies.

In this program the student works full-time on a work-training assignment related to his academic program for one trimester at a time, alternating with full-time school attendance for one trimester at a time until the required number of work assignments are completed. The student earns a full-time salary while on work assignment at a rate commensurate with the job. Students who have successfully completed a cooperative education program usually find that their work experience is much in their favor in applying for employment upon graduation.

Students interested in the program may apply for an appointment at any time prior to their junior year. One must have completed at least one trimester in residence, be in good academic standing, and normally a United States citizen to be eligible for the program. Participation in the program is contingent upon the availability of approved work positions and one's qualifications for the positions available.

For additional information on the Cooperative Education program, contact the Office of the Dean of Aeronautical Studies.

Aviation Seminars

For the purpose of maintaining a close relationship with government agencies, industry and general aviation, Embry-Riddle is actively pursuing a program of on-campus aviation educational seminars. The product of this program is the exchange of ideas on current philosophies, trends and techniques that can contribute to the growth and practicability of the curriculum. It also provides an opportunity for visiting aviation associations to become familiar with Embry-Riddle and its contribution to the aviation community.

The groups invited to participate in this program include: corporate aviation managers, air safety organizations, airline management, maintenance professionals, aviation publishers and writers, collegiate flying associations, government aviation agencies and professional flying associations. The course content is keyed to the specialized interest of the seminar group. Expertise is recruited primarily from off-campus sources. Where seminar content meets the criteria established by the Southern Association of Colleges, Continuing Education Units are awarded.

Embry-Riddle works closely with the Daytona Beach Chamber of Commerce and the local hotels to provide the necessary support services. Individuals or organizations interested in participating or developing an educational seminar should direct correspondence to the Dean of the College of Continuing Education.

International Seminars

In addition to the on campus seminars, the University conducts seminars in other countries. The purpose of these programs is to enable the participants to become more aware of the aviation, social, economic and political philosophies and practices of other leading nations and to develop bridges of understanding between the nations visited and the seminar participants.

Seminars are conducted in the Soviet Union and Western Europe, and future seminars will include other areas of the globe.

Most seminars are for three weeks during the Christmas vacation or in the summer. Participants travel overseas by scheduled airlines and travel to the various points of interest as a group by air, rail, ship, or bus. A scheduled seminar in the summer of 1975 included the Paris International Airshow and an opportunity to tour part of France as the pilot of a private four-place aircraft.

Dual Degree Program

In cooperation with Georgia Institute of Technology, Embry-Riddle offers a Dual Degree Program that enables qualified students to complete three years of study at Embry-Riddle and then transfer to Georgia Tech for approximately two additional years of study. Students completing the program can receive baccalaureate degrees from both Embry-Riddle and Georgia Tech. In addition, Embry-Riddle students with exceptional academic records may earn a Georgia Tech master's degree in two to three years following the three academic years spent at Embry-Riddle.

Students seeking enrollment in the Dual Degree Program must plan their academic program at Embry-Riddle to ensure that all prerequisite courses for continuing their study at Georgia Tech are completed. Students must also be recommended by their division chairman and dean. Georgia Tech degree programs open to qualified Embry-Riddle students are as follows:

Bachelor of Engineering and/or Engineering Technology
Civil, Electrical, Engineering Science, Industrial and Mechanical.

Bachelor of Science
Applied Mathematics, Economics, General Management, Health Systems, Information and Computer Science, Industrial Management and Management Science.

Master of Science
Aerospace Engineering, Civil Engineering, Engineering Science and Mechanics, Industrial Management, Information and Computer Science, Mathematics and Mechanical Engineering.

For additional information concerning the Dual Degree Program, interested students should contact the Dean of the College of Continuing Education.

Dual Enrollment

The University has an arrangement with Florida Technological University and Daytona Beach Community College whereby a student may enroll in courses at ERAU and one or both of the other schools at the same time. Such enrollment is available to students taking specific courses in an Area of Concentration which ERAU does not currently offer. The Florida Technological University courses are offered through its Residence Center in Daytona Beach, which is across the street from the ERAU campus.

Servicemen's Opportunity College (SOC)

Embry-Riddle Aeronautical University is a member institution of the Four-Year Servicemen's Opportunity College. As a member, Embry-Riddle recognizes the unique problem confronting active duty service personnel in achieving their educational goals. In recognition of the problem of service personnel, the University offers a Contract for Degree arrangement. This arrangement enables students enrolled in Embry-Riddle courses and programs at off-campus locations who are subsequently reassigned on military orders to installations not served by the University to complete their degree programs.

Students interested in making application for a Contract for Degree may obtain additional information and application forms from Embry-Riddle Directors at off-campus locations or by writing to the Dean, Admissions and Records, Embry-Riddle Aeronautical University, Daytona Beach, Florida 32015.

The University pledges its continuing efforts to make its educational programs available to service personnel in ways consistent with their military assignments.

Eagle University Consortium

Embry-Riddle is one of ten educational institutions participating in the Eagle University Consortium at Fort Campbell, Kentucky. Other participants are Austin Peay State University, Middle Tennessee State University, Murray State University, Nashville State Technical Institute, Tennessee State University, University of Kentucky (Hopkinsville Community College), University of Tennessee at Nashville, Western Kentucky University and the Fort Campbell Independent School System.

Eagle University Consortium provides on-post educational opportunities from high school through graduate study. Embry-Riddle Aeronautical University offers associate and baccalaureate programs in Aeronautical Studies, Aviation Management, Professional Aeronautics and Aviation Maintenance Management. Embry-Riddle also offers a non-degree Airframe/Powerplant technology program designed to prepare eligible military aviation mechanics to take the required examinations for FAA Airframe and Powerplant Maintenance Technician certification.

Students enrolled in Embry-Riddle degree programs through Eagle University may complete all degree requirements at Fort Campbell or at the home campus (under a degree completion program). For additional information concerning Embry-Riddle programs at Fort Campbell, interested personnel should contact the Director, Embry-Riddle Office, Eagle University, (Building 238), P.O. Box 98, Fort Campbell, Kentucky 42223. Telephone: (502) 798-7414 or 7415.

Miami Education Consortium

Embry-Riddle and Barry College of Miami, Florida, have established the Miami Education Consortium (MEC) to serve the continuing education needs of South Floridians. The MEC blends innovative concepts of adult education into a flexible program designed for the student who cannot attend traditional, rigidly scheduled classes. MEC courses are conducted in modern classrooms and laboratories on the Barry College Campus in Miami Shores as well as at Homestead Air Force Base and Miami Air Route Traffic Control Center. Degree requirements of both Embry-Riddle and Barry College may be completed through the MEC.

Through the MEC, Embry-Riddle Aeronautical University offers baccalaureate programs in Aeronautical Studies, Aviation Management, Aviation Maintenance Management and Professional Aeronautics. Also, interested individuals may enroll in selected Barry College degree programs or in one or more courses without designation of a specific degree program.

For additional information concerning the Miami Education Consortium degree opportunities, interested personnel should contact the Director, Miami Education Consortium, Barry College Box 195, Miami, Florida 33161. Telephone: (305) 751-5795. The MEC office is located in Room L-110 of the Library on the Barry College campus.

Residence Center Programs

The military services encourage active duty personnel to further their formal education and to upgrade their technical skills. To assist the U.S. Army and military personnel in achieving their educational goals, Embry-Riddle has established residence centers offering aviation oriented programs at the following installations: Fort Rucker, Alabama; Fort Eustis, Virginia; Fort Benning, Georgia; and Coleman Barracks, Mannheim, Germany. Centers may be activated at additional locations where large concentrations of aviation oriented career personnel are stationed.

Residence centers offer on-post classes leading to associate and baccalaureate degrees in Aeronautical Studies, Aviation Management, Professional Aeronautics, and Aviation Maintenance Management. Though specific courses required in other Embry-Riddle degree programs may be completed at a residence center, other degrees cannot be earned without matriculation on the home campus. Several locations also offer a non-degree Airframe/Powerplant Technology program designed to prepare eligible aviation mechanics in the military to take required examinations for FAA Airframe and Powerplant Maintenance Technician certification.

Students enrolled in Embry-Riddle Aeronautical University degree programs at a residence center may complete all degree requirements at the center or may elect to transfer to the home campus to complete requirements under a degree completion program. Additional information concerning residence center programs may be obtained from the Director of Residence Centers, Embry-Riddle Aeronautical University, Daytona Beach, Florida 32015.

Inquiries concerning programs available at specific residence centers should be addressed to the appropriate residence center director as follows:

Fort Rucker Residence Center
(Building 5007)
P. O. Drawer N
Fort Rucker, Alabama 36360
Telephone: (205) 255-2138 or 4776

Fort Eustis Residence Center
(Building 464)
P. O. Box 661
Fort Eustis, Virginia 23604
Telephone: (703) 887-0980

Fort Campbell Office
Eagle University Consortium
(See Eagle University Consortium on page 31)

Fort Benning Residence Center
(Building 35)
P. O. Box 2054
Fort Benning, Georgia 32905
Telephone: 682-0775 or 0776

European Residence Center (Army)
Coleman Barracks Education Center
APO New York 09028
Telephone: (Mil-2137-7391)
(Civ-0621-775750)

USAF European Program

The Embry-Riddle USAF European Program was established to serve the educational needs of personnel assigned at selected United States Air Forces in Europe installations. The Program is managed by the Dean of the USAF European Program with offices at Lindsey Air Station, Wiesbaden, Germany. Embry-Riddle courses and programs are now available at the following USAFE installations: Alconbury, Bentwaters/Woodbridge, Lakenheath/Mildenhall, and Upper Heyford RAF stations in England; Ramstein, Zweibrucken, Wiesbaden, Rhein Main, Bitburg, and Spangdahlem Air Bases in Germany; Zaragoza Air Base in Spain; and, at Athenai Airport, Athens, Greece. An Embry-Riddle director is located at each of the above installations.

USAF European Program locations offer certificate programs in aviation maintenance technology and radiotelephone maintenance technology. The program in aviation maintenance technology is designed to provide military aviation maintenance personnel who meet experience eligibility requirements for Federal Aviation Administration aviation maintenance technician certification with the knowledge necessary to successfully complete FAA written, oral and practical examinations in order to obtain FAA certification. The Radiotelephone Maintenance Technology program is designed to assist personnel in preparing for the Federal Communications Commission radiotelephone operator licensing examinations.

In addition to certificate programs, courses leading to associate degrees in Aviation Maintenance Technology, Aeronautical Studies and Professional Aeronautics, as well as baccalaureate degree programs in Aviation Maintenance Management, Aeronautical Studies and Professional Aeronautics are offered. Students enrolled in Embry-Riddle courses at USAF European Program locations may complete all degree requirements at the location where enrolled or may elect to transfer to the home campus for degree completion.

Additional information concerning the USAF European Program may be obtained from the Dean, College of Continuing Education at the home campus or from the Dean of the USAF European Program at Lindsey Air Station in Wiesbaden, Germany. The mailing address of the European Coordinator is as follows:

CINCUSAFE/DPXE
ATTN: Embry-Riddle Aeronautical University
APO New York 09332
Telephone: (Mil-472-3327)
(Civ-06121-82-3327)

Information may also be obtained from Embry-Riddle directors at each of the locations served by the USAF European Program. Directors may be contacted through the Education Center at each installation.

Graduate Center

Utilizing the academic facilities of Biscayne College, Embry-Riddle Aeronautical University now offers the Master of Aviation Management degree in Miami.

Applicants who possess a baccalaureate degree from an accredited college or university may be admitted with full graduate standing, provided their back-

ground reflects an understanding of the concepts of economics (macro and micro), accounting, statistics and management. Applications will also be accepted from undergraduate students in their last term of study and from graduates of accredited colleges and universities who do not possess all undergraduate prerequisites at the time of application. They will be admitted to graduate study in a provisional status.

This program requires thirty-six credit hours of graduate study with eighteen hours in core courses and the remainder in electives. The breadth of elective courses available to the student provides the student the opportunity to select courses best suited to his or her personal goals. Core courses emphasize the tools and techniques of management; electives emphasize the application of these techniques in the context of aviation management problems.

The program recognizes problems and constraints of full-time working persons who seek to acquire advanced degrees. Special features of the program include:

Attendance during four terms per year enables part-time students to complete the program in less than two years.

All class periods are taped "live" and stored on cassette tapes so that students may make up classes they are unable to attend because of work commitments.

Classes are scheduled evenings and weekends to meet the needs of students.

Students lacking undergraduate prerequisites may enroll in other graduate courses while fulfilling established prerequisites.

Students may transfer up to twelve credit hours from graduate programs at other accredited colleges and universities.

For additional information concerning the master's program, including applications for admission to graduate study and the Graduate Bulletin, interested individuals should contact the Graduate Center Director, Embry-Riddle Aeronautical University, P.O. Box 786, Miami, Florida 33054. The graduate program office is located in Room 209, Mary Kennedy Hall on the Biscayne College campus. Telephone: (305) 621-5203.

COLLEGE OF AERONAUTICAL STUDIES

COLLEGE OF AERONAUTICAL STUDIES

The College of Aeronautical Studies offers degree programs in:

Aeronautical Engineering
Aircraft Engineering Technology
Aeronautical Engineering Technology
Aeronautical Studies
Aviation Management
Aviation Maintenance Management
Management

The curriculum divisions of the college are:

Aeronautical Engineering, offering courses in aeronautical engineering, engineering science, and engineering technology.
Aviation Management, offering courses in management, and economics.
Computer Technology, offering courses in computer technology.
Humanities and Social Science, offering courses in communications, humanities and social science.
Mathematics and Physical Science, offering courses in mathematics, chemistry and physics.

The various curriculum divisions provide the basic general education courses in science, mathematics, humanities and social sciences which are a part of the degree programs offered by the College of Aviation Technology and the College of Continuing Education. The degree programs offered by the College of Aeronautical Studies are also supported by courses offered in the College of Aviation Technology.

The degree programs and areas of concentration offered by the College of Aeronautical Studies are designed to offer a wide variety of choices in educational preparation for a career in the broad field of aviation. In addition to degree programs which follow the traditional program of academic studies, several programs offer a combination of academic and technology courses. These provide the student both considerable flexibility in his choice of areas of concentration and thorough preparation in the newly emerging technological skills and knowledge in modern industry.

The faculty in the college is composed of men and women who have both experience in the classroom as teachers and practical experience in their field in professional and technical areas. Visiting professors actively engaged in some related profession such as airport management also bring to the classroom current and relevant information in various fields in aviation. The cooperative education program provides the student an opportunity to gain firsthand experience in a career field as a part of his education and professional preparation.

AERONAUTICAL ENGINEERING PROGRAM

(ECPD Accreditation Expected in 1975)

Introduction

This Bachelor of Science Degree program will prepare the student for a career in aeronautical engineering and prepare him for graduate studies in this field. Career areas include aerospace vehicle and propulsion system research, design, development, ground and flight testing, production, field and liaison engineering. To accomplish this goal, a firm foundation in mathematics, chemistry and physics is offered, after which the engineering sciences, aerodynamics, aircraft structures, propulsion, dynamics and electrical engineering are presented. These subjects are finally combined in a sequence of laboratory and design courses which demonstrate by practical problems, using aeronautical industry-oriented methods, how the theoretical work is applied to actual engineering problems.

Candidates for the B.S. degree in Aeronautical Engineering are often joined in their classes by students enrolled in the Aircraft Engineering Technology program. This joint enrollment provides an opportunity for prospective engineers and technologists to develop clear lines of communication between themselves which will enhance the effectiveness of their work in industry.

Admission Requirements

To enter this program students should have demonstrated a capability in mathematics, physics and chemistry in high school. They should be prepared to enter Calculus I, having demonstrated capability in algebra and trigonometry. A student may prepare himself for this degree by taking MA 140 College Algebra and MA 141 Trigonometry here at the University, prior to taking calculus.

Transfer Credit

Students having completed previous college work may request an evaluation of their college transcript through the Dean of Admissions and Records.

Advanced Standing

See page 20 for advanced standing for flight credit.

Degree Requirements

The Bachelor of Science in Aeronautical Engineering degree program requires 138 credit hours and may be completed in 9 trimesters. The courses to be taken to earn this degree are listed on page 38.

BACHELOR OF SCIENCE DEGREE

AERONAUTICAL ENGINEERING

Number	Subject	Credits
FIRST TRIMESTER		
AE 101	Introduction to Aerospace Engineering	2
HU 120	Communications I	3
ET 101	Engineering Graphics I	2
PS 105	Chemistry I	4
MA 241	Calculus I	4
		15
SECOND TRIMESTER		
HU 121	Communications II	3
PS 106	Chemistry II	4
HU 250	Logic	3
ET 102	Engineering Graphics II	2
MA 242	Calculus II	4
		16
THIRD TRIMESTER		
MA 243	Calculus III	4
PS 201	Physics I	5
EC 210	Economics II	3
HU 220	Communications III	3
		15
FOURTH TRIMESTER		
MA 340	Differential Equations	3
ES 201	Statics	3
CT 209	Computer Programming	3
PS 202	Physics II	5
HU 221	Technical Report Writing	2
		16
FIFTH TRIMESTER		
MA 401	Advanced Mathematics I	3
AE 301	Aerodynamics I	4
ES 302	Solid Mechanics	3
ES 303	Dynamics	3
SS 120	American History or SS 110 World History	3
		16

Number	Subject	Credits
SIXTH TRIMESTER		
ES 304	Fluid Mechanics	3
AE 304	Structures I	3
SS 220	Psychology or SS 210 Sociology	3
ES 305	Thermodynamics	3
AE 302	Aerodynamics II	3
		15
SEVENTH TRIMESTER		
AE 413	Airplane Stability and Control	3
AE 404	Structures II	3
ES 404	Electrical Engineering I	3
AE 406	Jet & Rocket Propulsion	3
ES 307	Metallurgy	3
		15
EIGHTH TRIMESTER		
AE 420	Airplane Design I	3
ES 405	Electrical Engineering II	3
AE 405	Structures III	3
AE 401	Advanced Aerodynamics I	3
	Humanities/Social Science Elective	3
		15
NINTH TRIMESTER		
AE 421	Airplane Design II	3
	Mathematics Elective	3
	Humanities/Social Science Elective	3
	Technical Electives (from courses below)	6
		15
	TOTAL CREDITS	138

TECHNICAL ELECTIVES

Space Mechanics
Wind Tunnel Laboratory
Advanced Solid Mechanics
Heat Transfer
Vibrations
Machine Elements
Advanced Aerodynamics II
Modern Physics
Engineering Measurements Laboratory
Aerodynamics of the Helicopter
Advanced Mathematics Courses
Continuum Mechanics
Flight Technology
Special Topics
ROTC
Cooperative Education
Advanced Computer Courses

AIRCRAFT ENGINEERING TECHNOLOGY

(ECPD Accredited)

Introduction

The Bachelor of Science degree program in Aircraft Engineering Technology will prepare the student for a career in such areas as aerospace vehicle and propulsion overhaul, modification, repair, fabrication, production, field and depot service, and testing and maintenance either in the industry or with operating airlines. He will be qualified to work on or to direct work on airframes and powerplants and to support engineering functions in the development of new aircraft and operations. After completing the B.S. AET degree, it is possible to continue for two more trimesters (30 credit hours) and complete the requirements for the B.S. AE degree as well.

An Associate Degree program is available to students who are unable to take the full B.S. AET. It essentially represents the first four trimesters of the B.S. AET degree program and is designed to give the student the fundamentals of the humanities, social sciences and basic mathematical sciences to accompany his F.A.A. Maintenance Technician Certificate. Although the graduate of the associate program will not have as high qualifications in aeronautical engineering and engineering science as the graduate of the bachelors program, he will be qualified to work on airframes and powerplants and to support engineering functions.

Admission Requirements

To enter this program, the student should exhibit an interest in mechanics, engines, working with his hands, building models, etc., and want to get into a field where he will be working with aeronautical hardware. (see page 18.)

Transfer Credit

Students having completed previous aircraft maintenance technology work and/or college work, may request from the Dean of Admissions and Records an evaluation of this work toward a degree.

Advanced Standing

A valid F.A.A. Maintenance Technician Certificate is accepted as satisfying the Maintenance Technology curriculum.

Degree Requirements

The Bachelor of Science Degree in Aircraft Engineering Technology:

All candidates for this degree must fulfill the requirements of the Maintenance Technology curriculum or possess an F.A.A. Maintenance Technician Certificate before enrolling in the courses listed in the fourth trimester. The obtaining of the F.A.A. Maintenance Technology License is also required for the degree. The degree requires 111 academic credit hours as shown below, in addition to the 190 Continuing Education Units awarded for completion of the Maintenance Technology curriculum.

At least twelve hours of electives must be completed on the 300 or 400 course number level in order to meet the 40 credit hour upper division requirement.

The Associate in Science Degree in Aircraft Engineering Technology:

All candidates for this degree must fulfill the requirements of the Maintenance Technology curriculum or possess

an F.A.A. Maintenance Technician Certificate before enrolling in the courses listed in the fourth trimester. The obtaining of the F.A.A. Maintenance Technology Certificate is also required for the degree. In addition, the degree requires 65 academic credit hours as shown below.

BACHELOR OF SCIENCE DEGREE

AIRCRAFT ENGINEERING TECHNOLOGY

Number	Subject	Continuing Education Units
MT 010	General Aeronautics	21
MT 011	Basic Aircraft Science	21
MT 012	Basic Powerplant Science	21
MT 013	Aircraft Systems Science	21
MT 014	Aircraft Electrical Systems Science	21
MT 015	Advanced Reciprocating Powerplant Laboratory	21.5
MT 016	Turbine Engine Laboratory	21
MT 017	Advanced Airframe Laboratory	21.5
MT 018	Propellers and Rotocraft Laboratory	21
	TOTAL CEU'S awarded upon completion of the program.	190

Must obtain FAA Maintenance Technology License (A&P) before conferring of degree.

Number	Subject	Credits
FIRST TRIMESTER		
PS 105	Chemistry I	4
HU 120	Communications I	3
ET 101	Engineering Graphics I	2
MA 140	College Algebra	3
MA 141	Trigonometry	2
SS 110	World History or SS 120 American History	3
		17
SECOND TRIMESTER		
HU 121	Communications II	3
PS 106	Chemistry II	4
MA 241	Calculus I	4
ET 102	Engineering Graphics II	2
HU 250	Logic	3
		16
THIRD TRIMESTER		
HU 220	Communications III	3
PS 201	Physics I	5
MA 242	Calculus II	4
EC 210	Economics II	3
		15
FOURTH TRIMESTER		
AP 202	Physics II	5
MA 243	Calculus III	4
SS 210	Sociology or SS 220 Psychology	3
ES 201	Statics	3
HU 221	Technical Report Writing	2
		17
FIFTH TRIMESTER		
CT 209	Computer Programming	3
AE 301	Aerodynamics I	4
ES 302	Solid Mechanics	3
ES 307	Metallurgy	3
ET 303	Aircraft Drafting & Detail Design	3
		16
SIXTH TRIMESTER		
AE 304	Aircraft Structures I	3
ES 304	Fluid Mechanics	3
ES 303	Dynamics	3
ES 305	Thermodynamics	3
	Humanities or Social Sciences Elective	3
		15
SEVENTH TRIMESTER		
AE 404	Aircraft Structures II	3
HU/SS 300-400	Humanities/S.S. Elective	3
300-400	Technical Electives	9
		15
	TOTAL CREDITS	111
	TOTAL CEU'S	190

ASSOCIATE IN SCIENCE DEGREE

AIRCRAFT ENGINEERING TECHNOLOGY

Number	Subject	Continuing Education Units
MT 010	General Aeronautics	21
MT 011	Basic Aircraft Science	21
MT 012	Basic Powerplant Science	21
MT 013	Aircraft Systems Science	21
MT 014	Aircraft Electrical Systems Science	21
MT 015	Advanced Reciprocating Powerplant Laboratory	21.5
MT 016	Turbine Engine Laboratory	21
MT 017	Advanced Airframe Laboratory	21.5
MT 018	Propellers and Rotocraft Laboratory	21
	TOTAL CEU'S awarded upon completion of the program.	190

Must obtain FAA Maintenance Technology License (A&P) before conferring of degree.

Number	Subject	Credits
FIRST TRIMESTER		
PS 105	Chemistry I	4
HU 120	Communications I	3
ET 101	Engineering Graphics I	2
MA 140	College Algebra	3
MA 141	Trigonometry	2
SS 110	World History or SS 120 American History	3
		17
SECOND TRIMESTER		
HU 121	Communications II	3
PS 106	Chemistry II	4
MA 214	Calculus I	4
ET 102	Engineering Graphics II	2
HU 250	Logic	3
		16
THIRD TRIMESTER		
HU 220	Communications III	3
PS 201	Physics I	5
MA 242	Calculus II	4
EC 210	Economics II	3
		15
FOURTH TRIMESTER		
AP 202	Physics II	5
MA 243	Calculus III	4
SS 210	Sociology or SS 220 Psychology	3
ES 201	Statics	3
HU 221	Technical Report Writing	2
		17
	TOTAL CREDITS	65
	TOTAL CEU'S	190

AERONAUTICAL ENGINEERING TECHNOLOGY PROGRAM

(ECPD Accredited)

Introduction

This Associate in Science degree program will prepare the student for a career as a technician in aeronautical engineering. The technician works closely with the aeronautical engineer and develops his ideas into workable hardware. An aeronautical engineer deals with ideas, concepts, designs and the analysis of problems; the technician deals with detail design, fabrication, hardware, operation, test, data reduction and supporting engineering activities. His work requires a firm basis in mathematics and the physical sciences, but not to the extent required by the engineer. The A.S.AET degree is the core of the B.S.AE degree and it is possible, after completing this degree, to go on to obtain the B.S.AE degree.

Admission Requirements

To enter this program, the student should have exhibited an interest in mechanics, engines, working with his hands, building models, etc., and want to get into a field where he will be working with aeronautical hardware.

Transfer Credit

Having completed previous college work, the student may request an evaluation of his college transcript through the Dean of Admissions and Records. See page 20.

Degree Requirements

The Associate in Science in Aeronautical Engineering Technology degree requires 81 credit hours; normally 5 trimesters are required for completion. The courses required to earn this degree are listed below.

ASSOCIATE IN SCIENCE DEGREE

AERONAUTICAL ENGINEERING TECHNOLOGY

Number	Subject	Credits
FIRST TRIMESTER		
PS 105	Chemistry I	4
HU 120	Communications I	3
ET 101	Engineering Graphics I	2
MA 140	College Algebra	3
MA 141	Trigonometry	2
SS 110	World History or SS 120 American History	3
		17
SECOND TRIMESTER		
HU 121	Communications II	3
PS 106	Chemistry II	4
MA 241	Calculus I	4
ET 102	Engineering Graphics II	2
HU 250	Logic	3
		16
THIRD TRIMESTER		
HU 220	Communications III	3
PS 201	Physics I	5
MA 242	Calculus II	4
EC 210	Economics II	3
		15
FOURTH TRIMESTER		
PS 202	Physics II	5
MA 243	Calculus III	4
SS 210	Sociology or SS 220 Psychology	3
ES 201	Statics	3
HU 221	Technical Report Writing	2
		17
FIFTH TRIMESTER		
CT 209	Computer Programming	3
AE 301	Aerodynamics I	4
ES 302	Solid Mechanics	3
ES 307	Metallurgy	3
ET 303	Aircraft Drafting & Detail Design	3
		16
	TOTAL CREDITS	81

AERONAUTICAL STUDIES PROGRAM

Introduction

The Aeronautical Studies program is intended to provide a general aviation oriented course of study operating in parallel with the Aeronautical Science program, while permitting greater flexibility in areas of specialization. The purpose of this curriculum is to allow the student to acquire the knowledge and skills sufficient to permit him to enter one of several areas of specialization in the aviation industry in either the civilian or government sector. Specific career options are determined in large part by the area of concentration selected by the student from those described on the following pages.

The parallel structure of Aeronautical Studies with Aeronautical Science in basic course requirements (except for the flight training courses) makes it possible for the student to transfer to the Aeronautical Science program at any time up to the eighth trimester, providing he has taken the flight training equivalent to that required by Aeronautical Science up to the time of transfer.

Admission

Admission requirements are the same as for any other degree program except in the case of the student selecting flight technology as an area of concentration. In this instance, he must also hold and maintain at least an Airman's Class II Medical Certificate.

Transfer Credit

Students having completed previous college work may request an evaluation of their college transcript through the Dean of Admissions and Records.

Advanced Standing

The determination of advanced standing based on job or training experience is evaluated by the Registration and Records office and approved by the degree program chairman. The University has established standards published in the Evaluation Handbook to aid in this determination. This Handbook is available for student perusal. In the case of flight credit, the Division of Flight Technology is responsible for review and evaluation, as is the Division of Maintenance Technology in the instance of certificate and experience in the area of aviation maintenance.

All requests for advanced standing, MUST be submitted during the student's FIRST trimester at Embry-Riddle. Advanced standing and transfer of credits are explained on pages 20, 21 and 22.

Degree Requirements

The Bachelor of Science Degree in Aeronautical Studies may be earned in eight trimesters. A minimum number of 131 trimester/semester credit hours is required. A minimum cumulative grade point average of 2.0 on a 4.0 point scale is also required which includes all courses taken at the University.

The core program consists of 89 credit hours which are required in the following disciplines:

Discipline	No. of Hours
Aeronautical Science	33
Computer Technology	3
Humanities	17
Mathematics	6
Management/Economics	15
Physical Science	6
Social Science	9
	Total 89

In addition to the core courses, an Area of Concentration is required in order to provide the student with sufficient skills and knowledge in a chosen discipline to enter a specific career field in the broad area of aviation. The following areas of concentration are available. One is to be chosen.

Areas of Concentration	Credit Hours/CEU's
Aeronautical Engineering	42
Air Force Aerospace Studies (AFROTC)	42
Airport Management	42
Applied Mathematics	42
Aviation Education	42
Aviation Management	42
Avionics (Under development)	42
Computer Technology	42
Flight Technology	42
Maintenance Technology	17+190
Military Science (Army ROTC)	42
Radio-Telephone Maintenance Technology	42

A general description of each Area of Concentration and the courses required are listed on pages 46-50. Elective courses may be chosen in each area of concentration, but the number of electives varies among the areas.

40 Hours Upper Level

40 credit hours must be taken on the junior and senior levels (300 or 400 designated courses). In some cases all of the open electives must be upper level courses in order to meet this requirement.

Bachelor of Science Degree

Aeronautical Studies

Number	Subject	Credits
FIRST TRIMESTER:		
AS 100	Foundations of Aeronautics	4
AS 101	History of Aviation	3
HU 120	Communications I	3
*MA 111	College Math for Aviation I	3
**AC	Area of Concentration	3
		16
SECOND TRIMESTER:		
AS 102	Navigation I	3
AS 103	Flight Rules & Regulations	3
HU 121	Communications II	3
*MA 112	College Math for Aviation II	3
PS 101	Basic Chemistry	3
AC	Area of Concentration	3
		18
THIRD TRIMESTER:		
AS 201	Meteorology	3
HU 220	Communications III	3
*PS 103	Basic Physics	3
MS 200	Principles of Management	3
CT 209	Introduction to Computers	3
AC	Area of Concentration	3
		18
FOURTH TRIMESTER:		
*AS 209	Basic Aerodynamics	3
***AS 211	A/C Engines & Systems	3
EC 110	Economics I	3
SS 220	Introduction to Psychology	3
AC	Area of Concentration	3
		15

Number	Subject	Credits
FIFTH TRIMESTER:		
HU 250	Logic or HU 340 Philosophy	3
MS 110	Accounting I	3
EC 210	Economics II	3
SS 110	World History or SS 120 American History	3
AC	Area of Concentration	3
		15
SIXTH TRIMESTER:		
HU/SS	Elective (Humanities/Social Science upper div. course)	3
AS 307	Flight Physiology	2
HU 221	Technical Report Writing	2
MS 305	Mgmt. Analysis & Concepts	3
AC	Area of Concentration	6
		16
SEVENTH TRIMESTER:		
AS 303	Government & Aviation	3
HU/SS	Elective (Humanities/Social Science upper div. course)	3
AC	Area of Concentration	12
		18
EIGHTH TRIMESTER:		
AS 405	Aviation Law	3
AS 409	Aviation Safety	3
AC	Area of Concentration	9
		15
	TOTAL CREDITS	131

Areas of Concentration

1. Aeronautical Engineering
2. Air Force Aerospace Studies (AFROTC)
3. Airport Management
4. Applied Mathematics
5. Aviation Education
6. Aviation Management
7. Avionics (Under development)
8. Computer Technology
9. Flight Technology
10. Maintenance Technology
11. Military Science (Army ROTC)
12. Radio-Telephone Maintenance

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*For Aeronautical Engineering and Applied Mathematics Areas of Concentration, these courses may be replaced with other similar courses, as shown in the specific Area of Concentration listing.

**If the courses taken in the Area of Concentration are less than 3 credit hours, the additional credit is to be made up with electives.

***For the Flight Technology and Maintenance Technology Areas of Concentration, this course is replaced as indicated below:

Maintenance Technology: Upper Division Elective (300 or 400 level)

Flight Technology: AS 203, Aircraft Engines-Reciprocating

Areas of Concentration

Aeronautical Engineering: This area gives the individual a strong base in science and technology for entering many areas of the aviation industry. It should be noted that the student must begin work in this area in his first trimester and must have the necessary prerequisites for the designated required courses. The Associate of Science Degree in Aeronautical Engineering Technology may be earned by taking this area of concentration, the required engineering mathematics courses and one additional trimester of course work. Reference should be made to the description of this degree on page 42. The following mathematics and physics courses are required in place of the ones listed in the vertical outline on page 45.

Courses listed	Courses required
MA 111	MA 140
MA 112	MA 141
PS 103	PS 201
AS 209	AE 301

Required courses:

Number	Subject	Credits
MA 241	Calculus I	4
MA 242	Calculus II	4
MA 243	Calculus III	4
ES 201	Statics	3
ES 302	Solid Mechanics	3
ES 304	Fluid Mechanics	3
AE/ES	Elective (300-400 level)	10
	Total	31
	Open Electives	9
	TOTAL	40

Air Force Aerospace Studies: This program provides the background for the individual who desires to enter the Air Force as a military pilot trainee. Successful completion of this program qualifies the graduate for a commission as an officer in the United States Air Force.
Required courses:

Number	Name	Credit
AF 101	Air Force Aerospace Studies	1
AF 102	Air Force Aerospace Studies	1
AF 201	Air Force Aerospace Studies	1
AF 202	Air Force Aerospace Studies	1
AF 301	Air Force Aerospace Studies	3
AF 302	Air Force Aerospace Studies	3
AF 401	Air Force Aerospace Studies	3
AF 402	Air Force Aerospace Studies	3
	Electives approved by AFROTC Professor of Aerospace Studies (300-400 level)	9
	Total	25
	Open electives	17
	TOTAL	42

Airport Management: This area of concentration integrates academic studies with the practical experience of Airport Management. Twelve of the 30 credit hours required for this program are achieved through the Cooperative Education Program discussed on page 29. The student will work full time for two trimesters during his junior and senior years in an ERAU approved position at a cooperating airport. The availability of this area of concentration is contingent upon the availability of suitable work positions.
Required courses:

Number	Subject	Credits
MS 313	Personnel Management	3
AS 401	Airport Development	3
MS 408	Airport Management	3
CO 397	Cooperative Education	6
CO 498	Cooperative Education	6
MS 331	Transportation Principles	3
MS 410	Management of Air Cargo	3
MS 421	Small Business Management or	
MS 308	Public Administration	3
	Total	30
	Open Electives	12
	TOTAL	42

Applied Mathematics: The area of concentration in Applied Mathematics is designed to provide the graduate with the broad mathematical and scientific background necessary to pursue a career in

industry or government. The curriculum provides for the mathematical study of general scientific concepts, principles and phenomena. This program will prepare the student for additional studies at the graduate level.

The following mathematics and physics courses are required in place of the ones listed in the vertical outline on page 45.

Courses listed	Courses required
MA 111	MA 140
MA 112	MA 141
PS 103	PS 201

Required Courses:

Number	Subject	Credits
MA 241	Calculus & Anal. Geom. I	4
MA 242	Calculus & Anal. Geom. II	4
MA 243	Calculus & Anal. Geom III	4
MA 340	Differential Equations	3
MA 401	Adv. Engineering Math. I	3
MA 412	Probability & Statistics	3
MA 430	Linear Algebra & Linear Prog.	3
CT 309	Adv. Fortran Programming	3
	Total	27
	Electives (Upper division)	5
	Open electives	9
	TOTAL	41

Aviation Education: As more educational institutions recognize the need for aviation oriented courses, the need for teachers in this area will increase accordingly. This area of concentration provides the educational courses necessary for certification in most of the 50 states, while providing the know-how to produce a graduate highly capable of teaching aviation courses in any part of the school system. It should be noted that certification requirements vary from state to state; therefore, the student should take care to establish his total program early in accordance with the regulations pertaining to the state or states in which he intends to seek employment.

This area of concentration requires 20 hours in professional education courses plus 30 hours in one of the following subject areas: Mathematics or Social Science. The professional education courses can be transferred from another college or taken in a cooperative agreement with a local college or university offering courses which lead to a degree in secondary education. These courses are:

6 hours secondary curriculum and materials of education
3 hours psychological foundations of education
3 hours sociological foundations of education
2 hours of methods of instruction in field
6 hours student teaching

Thirty (30) credit hours from one of the following subject areas are required. Courses marked by an asterisk (*) are required as part of the core program and can be counted toward the thirty hours.

Mathematics:

Number	Subject	Credits
*MA 140	College Algebra (instead of MA 111)	3
*MA 141	Trigonometry (instead of MA 112)	2
*CT 209	Intro. to Computers	3
*MA 211	Intro. to Statistics	3
MA 220	College Math II	3
MA 241	Calculus & Anal. Geometry I	4
MA 242	Calculus & Anal. Geometry II	4
MA 243	Calculus & Anal. Geometry III	4
MA 340	Differential Equations	3
MA 403	Complex Variables	3
MA 412	Probability and Statistics	3
MA 430	Linear Algebra & Prog.	3

Social Science:

SS 110	World History	3
*SS 120	American History	3
SS 210	Intro. to Sociology	3
*SS 220	Intro. to Psychology	3
SS 310	Personality Development	3
SS 320	Amer. National Government	3
SS 330	Current History	3

Number	Subject	Credits
SS 340	Amer. Foreign Policy	3
*EC 110	Economics I	3
*EC 210	Economics II	3
EC 310	Labor Economics	3
EC 320	Economics of Indus. Organ.	3
	Total	38
	Open electives	4
	TOTAL	42

Aviation Management: The individual who desires to enter the aviation field prepared to move into a responsible position in management or operations should consider this area of concentration. This area of concentration provides the student with flexibility beyond the basic management concepts into the realm of labor economics, marketing, personnel and transportation.

Required courses

Number	Subject	Credits
EC 310	Labor Economics	3
MS 311	Marketing	3
MS 313	Personnel Management	3
MS 318	Business Data Processing	3
	12 hours of 300 or 400 level EC/MS courses	12
	Total	24
	Open Electives	18
	TOTAL	42

Computer Technology: An increasing use of computers in all phases of the aviation industry makes this area of concentration a timely program to pursue. Whether it be in the manufacturing, marketing, or general operation of aircraft and the many related career areas, this program can be of considerable value. The student augments the core programs of aeronautical science, general science and humanities with training in the theory and utilization of computers and the opportunity to apply the theory employing the necessary hardware.

Required courses

Number	Subject	Credits
CT 309	Fortran Programming	3
CT 310	Business Programming	3
CT 312	Assembly Language Programming	3
CT 320	Advanced Business Programming	3
MA 222	Business Statistics	3
MS 318	Business Data Processing	3
CT 350	Modeling Using Computers	3
MS 319	Management Information Systems	3
CT 401	Data Structures and Operating Systems for Business	3
CT 410	Computer Data Structures	3
CT 420	Operating Systems & Assembly Language	3
	Total	33
	Open Electives	9
	TOTAL	42

Flight Technology

(Fixed Wing or Rotary Wing)

If this area of concentration is chosen, one must take the courses necessary to qualify as a commercial pilot with the instrument rating. Flight credits may be accepted from a regionally accredited college or may be awarded to current military and commercial airline pilots who hold the appropriate FAA ratings in either fixed wing or rotary wing aircraft. The Division of Flight Technology will provide flight evaluations to validate other types of previous flight experience for credit.

Rotary wing training is not offered, but is accepted with the appropriate FAA certificates.

The requirements for the Area of Concentration in Flight Technology may be met as indicated below.

Academic Credit

The student may meet the requirements for the Area of Concentration in Flight Technology through successful completion of the following ERAU courses or their equivalent:

(AS 203 replaces AS 211)	Credits
AS 210 Aircraft Systems and Components	3
AS 302 Navigation II	3
AS 311 Aircraft Engines - Turbine	3
AS 308 Aircraft Performance	3
*FA 101 Primary Flight	2
*FA 112 Basic Flight	2
*FA 113 Single Engine Transition	0
*FA 201 Advanced Flight I	2
*FA 202 Advanced Flight II	2
*FA 301 Instrument Flight	2
Upper division electives (300 or 400 level)	9
Electives	11
TOTAL	42 Credits

*Military or civilian trained rotary wing commercial pilots with Rotorcraft-Helicopter and Instrument-Helicopter ratings may receive credit for these courses after satisfactory evaluation of their experience. Credit for other core and area of concentration courses may be granted according to the procedures listed under "Admission to the University - Advanced Standing".

Continuing Education Units

The student may meet the requirements for the Area of Concentration in Flight Technology through acquiring a minimum of Continuing Education Units as follows:

		Units
FP 100	Private Pilot Flight	6.4
FP 200	Commercial Flight	19.9
FP 301	Instrument Flight	5.5
FT 100	Private Pilot Ground School	6.0
FT 200	Commercial Ground School	22.5
FT 301	Instrument Ground School	7.5
	Total awarded at completion of program.	67.8 Units

In addition, he must take the academic courses shown:

		Credit Hours
AS 210	A/C Systems and Components	3
AS 311	A/C Engines - Turbine	3
AS 308	A/C Performance	3
	Upper division electives (300 or 400 level)	14
	Science/Technology electives	9
	Electives	7
	TOTAL	39

Maintenance Technology: The individual who wishes to combine maintenance training and experience with an academic degree program and who may be interested in the supervision of aircraft maintenance activities will find that this area fills his requirements. This program integrates the knowledge and experience of aircraft and powerplant maintenance with the broader perspective of management, science and the humanities. The requirements may be met by completing one of the following programs of study:

On campus Maintenance Technology Curriculum

or

USAF European Program Technology Curriculum

or

Possession of a valid FAA Maintenance Technician (A&P) License plus 17 upper division credit hrs.

Campus Maintenance Technology Curriculum

Number	Subject	Continuing Education Units
MT 010	General Aeronautics	21
MT 011	Basic Aircraft Science	21
MT 012	Basic Powerplant Science	21
MT 013	Aircraft Systems Science	21
MT 014	Aircraft Electrical Systems Science	21
MT 015	Advanced Reciprocating Powerplant Laboratory	21.5
MT 016	Turbine Engine Laboratory	21
MT 017	Advanced Airframe Laboratory	21.5
MT 018	Propellers and Rotocraft Laboratory	21
	TOTAL CEU's awarded at the completion of the program.	190
	Electives (upper division)	credit hrs. 17

USAF EUROPEAN PROGRAM MAINTENANCE TECHNOLOGY CURRICULUM

		Hours
MT 110	General Aeronautics	3
MT 111	Basic Airframe Science	3
MT 112	Basic Powerplant Science	3
MT 113	Aircraft Systems Science	3
MT 120	General Aeronautics Laboratory	1
MT 121	Basic Airframe Science Laboratory	1
MT 122	Basic Powerplant Science Laboratory	1
MT 123	Aircraft Systems Science Laboratory	1
MT 214	Aircraft Electrical Systems Science	3
MT 215	Reciprocating Engine Science	3
MT 216	Turbine Engine Science	3
MT 217	Advanced Airframe Science	3
MT 218	Propeller Science	3
MT 224	Aircraft Electrical Systems Science Laboratory	1
MT 225	Reciprocating Engine Science Laboratory	1
MT 226	Turbine Engine Science Laboratory	1
MT 227	Advanced Airframe Science Laboratory	1
MT 228	Propeller Science Laboratory	1
	credit hours	36
	Electives (upper division) credit hours	9
	Total required for degree credit hours	131

Military Science and Tactics: Successful completion of this four-year Army ROTC program will guarantee a commission in the U.S. Army. This area of concentration is offered in cooperation with Stetson University.

Number	Subject	Credit
MY 101 & 102	Basic Military Science	4
MY 201 & 202	Basic Military Science	4
MY 301 & 302	Advanced Military Science	4
MY 401 & 402	Advanced Military Science	4
		16
	Electives (Upper Division)	12
	Open Electives	14
	Total	42

RADIOTELEPHONE MAINTENANCE TECHNOLOGY

The Radiotelephone Maintenance Technology certificate program offered at European Program (USAF) locations consists of a series of theory and laboratory courses in the fundamental principles of electricity and electronics and electronic circuits and systems. The curriculum is designed to assist experienced electrical/electronics personnel in preparing for the Federal Communications Commission radiotelephone operators licensing examinations. The program is designed to prepare the individual for both the FCC Second and First Class Radiotelephone Operators Licenses.

Number	Subject	Credits
EL 101/111	Basic Concepts, DC Circ. and Lab	4
EL 102/112	Fund. AC & DC Circuit Analysis & Lab	4
EL 103/113	Vacuum Tube & Semi-Cond. Fundamentals & Lab	4
EL 104/114	Basic Elec. Circuits & Systems & Lab	4
EL 205	Electronic Circuits and Systems Technology	3
EL 206	Broadcast Theory and Operation	3
	Electives (upper division)	20
	TOTAL	42

ASSOCIATE IN SCIENCE DEGREE
AERONAUTICAL STUDIES

Number	Subject	Credits
FIRST TRIMESTER		
AS 100	Foundations of Aeronautics	4
AS 101	History of Aviation	3
HU 120	Communications I	3
MA 111	College Mathematics for Aviation I	3
	Elective	2
		15
SECOND TRIMESTER		
AS 102	Navigation I	3
AS 103	Flight Rules and Regulations	3
HU 121	Communications II	3
MA 112	College Math for Aviation II	3
PS 101	Basic Chemistry	3
	Elective	2
		17
THIRD TRIMESTER		
AS 201	Meteorology	3
PS 103	Basic Physics	3
HU 220	Communications III	3
	Electives	6
		15
FOURTH TRIMESTER		
AS 209	Basic Aerodynamics	3
AS 211	Aircraft Engines and Systems	3
MS 200	Principles of Management	3
	Electives	6
		15
FIFTH TRIMESTER		
AS 307	Flight Physiology	2
EC 110	Economics I	3
AS 303	Government and Aviation	3
HU 221	Technical Report Writing	2
SS 220	Introduction to Psychology	3
		13
	TOTAL CREDITS	75

ASSOCIATE IN SCIENCE DEGREE
AERONAUTICAL STUDIES
(Flight Attendant)

Number	Subject	Credits
FIRST TRIMESTER		
AS 100	Foundations of Aeronautics	4
AS 101	History of Aviation	3
HU 120	Communications I	3
MA 111	College Math for Aviation I	3
	Elective	2
		15
SECOND TRIMESTER		
SS 210	Introduction to Sociology	3
SS 220	Introduction to Psychology	3
HU 121	Communications II	3
MA 112	College Math for Aviation II	3
PS 101	Basic Chemistry	3
	Elective	2
		17
THIRD TRIMESTER		
AS 201	Meteorology	3
PS 103	Basic Physics	3
HU 220	Communications III	3
	*Specified Electives	6
		15
FOURTH TRIMESTER		
SS 120	American History	3
AS 211	A/C Engines & Systems	3
MS 200	Principles of Management	3
	Electives	6
		15
FIFTH TRIMESTER		
AS 307	Flight Physiology	2
EC 110	Economics I	3
AS 303	Government and Aviation	3
HU 221	Technical Report Writing	2
SS 310	Personality Development	3
		13
	TOTAL CREDITS	75

*Specified Electives: The student will select 6 credit hours from either of the following:
1) A foreign language, or
2) A college course in First Aid and a college course in Geography (to be taken at a local college or university and credit transferred).

AVIATION MANAGEMENT PROGRAM

Introduction

The primary objectives of this program are to: (1) Prepare graduates for a wide variety of staff, operational and executive positions within the various segments of aviation. (2) Provide the necessary undergraduate foundation to do successful graduate study. By choosing elective courses in an appropriate area of concentration, each student has the opportunity to tailor his academic program to better meet his specific career objectives.

If the student desires an area of concentration, he may choose from: Air Transportation Management, Airport Management, Aeronautics, Computer Technology, Applied Mathematics, Air Force ROTC or Army ROTC. Appropriate choices will better prepare the student to enter career fields with management job opportunities such as shown below.

Career Fields	Management Job Opportunities
Fixed Base Operation (Fixed Base Operators and Aircraft Service Organizations)	Line Services Manager Aircraft Salesman Air Taxi Operator Operations Manager Purchasing Agent
Airport Management (Public and Private Airports)	Airport Manager Airport Planning Specialist Contractor's Negotiator Maintenance & Operations Manager Public Relations Representative
Aircraft and Components Manufacturing (General Aviation and Commercial Manufacturers, Avionics and Engine Manufacturers)	Manufacturer's Representative Avionics Salesman Market Research Analyst Cost Evaluator Production Manager
Aviation Service Organizations (Insurance Companies, Banks, Stock Brokerages, Educational Institutions, Consulting Organizations, Freight Forwarders and Suppliers)	Aviation Insurance Underwriter Airline Securities Analyst Finance Company Representative Air Transportation Consultant Fuel Company Representative
Government Agencies (FAA, CAB, Department of Transportation, ICC and Various State Aviation Bureaus)	FAA Facilities Planner CAB Economic Analyst Transportation Specialist Budget Manager Aviation Education Specialist
Airline Management (Trunk, Feeder and Commuter Airlines)	Cargo Sales Representative Customer Service Manager Schedule Planner Financial Analyst Personnel Representative

Admission Requirements

There are no special requirements for admission to this program; see page 18 for general requirements.

Transfer Credit

Students having completed previous college work may request an evaluation of their college transcript through the Office of Admissions and Records.

Degree Requirements

The Bachelor of Science Degree requires 131 trimester academic credit hours to be completed within 8 trimesters (assuming no transfer credits are applied).

The Associate of Science Degree requires 65 trimester academic credit hours to be completed within 4 trimesters (assuming no transfer credits are applied).

Program Description

The Bachelor of Science Degree Program emphasizes a general education along with appropriate specialization to prepare for a career in aviation management. Required courses include: humanities, social sciences, aeronautical science and management. In addition, the 21 hours of undesignated electives allow one to take courses of his choice to help meet his own educational goals. The undesignated electives may be taken in one of the areas of concentration.

BACHELOR OF SCIENCE DEGREE

AVIATION MANAGEMENT

Number	Subject	Credits
FIRST TRIMESTER		
HU 120	Communications I	3
SS 110	World History or 120 American History	3
MS 110	Accounting I	3
EC 110	Economics I	3
MS 200	Principles of Management	3
		15
SECOND TRIMESTER		
HU 121	Communications II	3
MA 120	Quantitative Methods I	3
PS 101	Basic Chemistry	3
MS 112	Accounting II	3
EC 210	Economics II	3
		15
THIRD TRIMESTER		
PS 103	Basic Physics	3
HU 220	Communications III	3
HU 250	Logic	3
MA 220	Quantitative Methods II	3
SS 210	Sociology	3
		15
FOURTH TRIMESTER		
SS 220	Psychology	3
CT 209	Introduction to Computers	3
HU 221	Technical Report Writing	2
MS 305	Management Analysis & Concepts	3
MA 222	Business Statistics	3
EC 310	Labor Economics	3
		17
FIFTH TRIMESTER		
MS 313	Personnel Management	3
MS 316	Psychology of Management	3
MS 318	Business Data Processing	3
MA 320	Decision Math	3
	Elective	3
		15
SIXTH TRIMESTER		
HU 340	Philosophy	3
MS 311	Marketing	3
MS 315	Finance	3
MS 319	Management Information Systems	3
	Elective	6
		18
SEVENTH TRIMESTER		
MS 390	Business Law I	3
MS 401	Management Planning & Control	3
MS 420	Industrial Management	3
MS/EC	Electives	6
	To be chosen from:	
	MS 322 Aviation Insurance	
	MS 331 Transportation Principles	
	MS 405 General Aviation Marketing	
	MS 408 Airport Management	
	MS 410 Management of Air Cargo	
	MS 415 Airline Management	
	MS 421 Small Business Management	
	EC 420 Economics of Air Transportation	
	Elective	3
		18
EIGHTH TRIMESTER		
AS 303	Government & Aviation	3
MS 430	Management Applications	3
HU/SS	Elective	3
	Electives	9
		18
	TOTAL CREDITS	131

(An Area of Concentration is not Mandatory)

Requirements for undesignated electives may be met by any course which is sufficiently different from the courses required (e.g., College Algebra is not sufficiently different from Quantitative Methods I). (Necessary prerequisites apply.)

Areas of Concentration

Air Transportation Management

This area of concentration provides the student with specialized knowledge in air transportation. Possible career opportunities are with the commercial airlines, air freight carriers and air charter services.

Air Transportation Management

Required Courses:

Number	Subject	Credits
MS 331	Transportation Principles	3
MS 410	Management of Air Cargo	3
EC 420	Economics of Air Transportation	3
One course from the following:		3
MS 322	Aviation Insurance	
MS 405	General Aviation Marketing	
MS 408	Airport Management	
MS 415	Airline Management	
MS 421	Small Business Management	
MS 499	Special Topics in Air Transportation Management	
	TOTAL	12

Aeronautics: The tremendous expansion of aviation technology has accelerated the demand for appropriately educated personnel for careers related to the flight, regulatory and technical aspects of the aviation industry. Through the use of flight and/or Air Science courses as electives, this area of concentration prepares the student for more technically oriented aviation management career paths. Graduates knowledgeable in the technology and regulation of aviation combined with a solid background in management, may pursue challenging and rewarding careers such as in aircraft and avionics sales or with a governmental regulatory agency.

Aeronautics

The following courses are required:

Number	Subject	Credits
AS 100	Foundations of Aeronautics	4
AS 211	A/C Systems and Engines	3
AS 201	Meteorology	3
AS 405	Aviation Law	3
AS 409	Aviation Safety	3
	Total Credits	16

Airport Management: This area of concentration integrates academic studies with the practical experience of airport management. Twelve of the 24 credit hours required for this program are achieved through the Cooperative Education Program discussed on page 29. The student will work full time for two trimesters during his junior and senior years in an ERAU approved position at a cooperating airport. The availability of this area of concentration is contingent upon the availability of suitable work positions.

Required Courses:

Number	Subject	Credits
MS 331	Transportation Principles	3
MS 408	Airport Management	3
AS 401	Airport Development	3
MS 308	Public Administration	3
CO 397	Cooperative Education	6
CO 497	Cooperative Education	6
	TOTAL	24

Applied Mathematics: This area of concentration is designed to augment the core courses in management, general science and humanities, with additional focus on mathematics, applied engineering mathematics, applied management mathematics and applied computational mathematics. It is oriented to provide the student with the knowledge and skills required to interface management and operational problems with mathematics and computer technology.

Required Courses

Number	Subject	Credits
MA 241	Calculus I (replaces MA 220)	4
MA 242	Calculus II	4
MA 243	Calculus III	4
MA 300	Applied Logic	3

MA 430	Numerical Analysis	3
MA 412	Probability and Statistics	3
	TOTAL	21

Computer Technology: The increasing use of computers in all phases of the aviation industry makes this area of concentration a timely program to pursue. Whether it be in manufacture, marketing, or general operation of aircraft and the many related career areas, this program can be of considerable value. The student augments the core courses in management, general science and humanities, with training in the theory and utilization of computers and the opportunity to apply the theory employing the necessary hardware.

Required Courses:

Number	Subject	Credit
CT 309	Fortran Programming	3
CT 310	Business Programming	3
CT 320	Advanced Business Programming	3
CT 401	Data Structures and Operating Systems for Business	3
	TOTAL	12

Air Force Aerospace Studies: This program provides the background for the individual who desires to enter the Air Force as a military pilot trainee. Successful completion of this program qualifies the graduate for a commission as an officer in the United States Air Force.

Required Courses:

Number	Name	Credit
AF 101	U.S. Military Forces General Military Course (GMC)	1
AF 102	U.S. Military Forces General Military Course (GMC)	1
AF 201	The Development of Air Power General Military Course (GMC)	1
AF 202	The Development of Air Power General Military Course (GMC)	1
AF 301	National Security Forces in Contemporary American Society Professional Officers Course (POC)	3
AF 302	National Security Forces in Contemporary American Society Professional Officers Course (POC)	3
AF 401	Air Force Leadership and Management Professional Officers Course (POC)	3
AF 402	Air Force Leadership and Management Professional Officers Course (POC)	3
	TOTAL	16

Military Science and Tactics: Successful completion of this four-year Army ROTC program will guarantee a commission in the U.S. Army. This area of concentration is offered in cooperation with Stetson University.

Number	Subject	Credit
MY 101 & 102	Basic Military Science	4
MY 201 & 202	Basic Military Science	4
MY 301 & 302	Advanced Military Science	4
MY 401 & 402	Advanced Military Science	4
	TOTAL	16

Associate of Science Degree

AVIATION MANAGEMENT

Introduction

The objective of this program is to provide an elementary knowledge of aviation management. This program is very similar to the first four trimesters of the Bachelors Program. Career fields open to graduates with this degree include: Fixed Base Operation, Airport Management, Aircraft and Component Manufacturing, Airline Management and Government Agencies. (See page 52.)

NOTE: If the B.S. degree is desired, the required MA 120 and 220 replaces MA 111 and MA 112. Also an additional 3 hour elective would be required.

Number	Subject	Credits
FIRST TRIMESTER		
HU 120	Communications I	3
SS 110/	World History or	
SS 120	American History	3
MA 111	College Mathematics for Aviation I	3
MS 110	Accounting I	3
MS 200	Principles of Management	3
		15
SECOND TRIMESTER		
HU 121	Communications II	3
PS 101	Basic Chemistry	3
MA 112	College Mathematics for Aviation II	3
EC 110	Economics I	3
MS 112	Accounting II	3
		15
THIRD TRIMESTER		
HU 250	Introduction to Logic	3
HU 220	Communications III	3
EC 210	Economics II	3
SS 210	Introduction to Sociology	3
SS 220	Introduction to Psychology	3
PS 103	Basic Physics	3
		18
FOURTH TRIMESTER		
CT 209	Introduction to Computers	3
AS 303	Government & Aviation	3
MS 305	Management Analysis & Concepts	3
MS 390	Business Law I	3
HU 221	Technical Report Writing	2
MS	Elective	3
	To be chosen from:	
	MS 311 Marketing	
	MS 313 Personnel Management	
	MS 316 Psychology of Management	
	MS 322 Aviation Insurance	
	MS 331 Transportation Principles	
	MS 421 Small Business Management	
		17
	TOTAL CREDITS	65

BACHELOR OF SCIENCE DEGREE

AVIATION MAINTENANCE MANAGEMENT

Introduction

The objective of this program is to provide the basic education and specialized knowledge that will prepare maintenance management graduates to enter the aviation industry. The curriculum provides an advantage toward the obtaining of middle and upper level maintenance management positions in such career fields as: Airlines, Fixed Base Operators, Aircraft Companies, Corporate Business Aircraft Fleet Operators and Government. Employment opportunities include:

Operations Manager
Maintenance Department Director
Assembly Foreman
Service Manager
Inspector Supervisor

Technical Report Writer
Field Representative
Instrument Workshop Supervisor
Overhaul Shop Manager
Fixed Base Operator
Safety Engineer-Maintenance Management
Customer Service

Admission Requirements

There are no special requirements for admission to this program; see page 18 for general requirements.

Transfer Credits

Students having completed previous college work may request an evaluation of their college transcript through the Dean of Admissions and Records.

Degree Requirements:

The Bachelor of Science program requires the completion of the Maintenance Technology curriculum plus 101 academic credit hours. The Maintenance Technology requirement may be met by completing one of the following programs of study:

On campus Maintenance Technology Curriculum

or

USAF European Program Technology Curriculum (see p. 50)

or

Possession of a valid FAA Maintenance Technician License

The Associate degree requires the completion of the Maintenance Technology Curriculum plus 65 academic credit hours. The Maintenance Technology Curriculum may be met by either of the three programs listed for the bachelors degree.

BACHELOR OF SCIENCE DEGREE

AVIATION MAINTENANCE MANAGEMENT

Number	Subject	Continuing Education Units
MT 010	General Aeronautics	21
MT 011	Basic Aircraft Science	21
MT 012	Basic Powerplant Science	21
MT 013	Aircraft Systems Science	21
MT 014	Aircraft Electrical Systems Science	21
MT 015	Advanced Reciprocating Powerplant Laboratory	21.5
MT 016	Turbine Engine Laboratory	21
MT 017	Advanced Airframe Laboratory	21.5
MT 018	Propellers and Rotocraft Laboratory	21
	TOTAL CEU's	190

FIRST TRIMESTER		Credits
HU 120	Communications I	3
SS 110	World History or 120 American History	3
MA 111	College Mathematics for Aviation I	3
MS 110	Accounting I	3
MS 200	Principles of Management	3
		15

SECOND TRIMESTER		
HU 121	Communication II	3
PS 101	Basic Chemistry	3
MA 112	College Mathematics for Aviation II	3
EC 110	Economics I	3
MS 112	Accounting II	3
		15

THIRD TRIMESTER		
HU 220	Communications III	3
MA 211	Introduction to Statistics	3
EC 210	Economics II	3
PS 103	Basic Physics	3

Number	Subject	Credits
HU 250	Introduction to Logic	3
MS 305	Management Analysis & Concepts	3
		18
FOURTH TRIMESTER		
MS 390	Business Law I	3
CT 209	Introduction to Computers	3
EC 310	Labor Economics	3
MS 313	Personnel Management	3
SS 220	Introduction to Psychology	3
HU 221	Technical Report Writing	2
		17
FIFTH TRIMESTER		
SS 210	Introduction to Sociology	3
MS 316	Psychology of Management	3
AS 303	Government & Aviation	3
	Humanities Elective (upper division)	3
	Social Science Elective	3
	Elective (upper division)	3
		18
SIXTH TRIMESTER		
	Electives (upper division)	12
	MS/EC Electives	6
	To be chosen from:	
	MS 322 Aviation Insurance	
	MS 331 Transportation Principles	
	MS 405 General Aviation Marketing	
	MS 408 Airport Management	
	MS 410 Management of Air Cargo	
	MS 415 Airline Management	
	MS 421 Small Business Management	
	EC 420 Economics of Air Transportation	
		18
	TOTAL CREDITS	101
	TOTAL CEU's	190

ASSOCIATE IN SCIENCE DEGREE

AVIATION MAINTENANCE MANAGEMENT

Number	Subject	Continuing Education Units
MT 010	General Aeronautics	21
MT 011	Basic Aircraft Science	21
MT 012	Basic Powerplant Science	21
MT 013	Aircraft Systems Science	21
MT 014	Aircraft Electrical Systems Science	21
MT 015	Advanced Reciprocating Powerplant Laboratory	21.5
MT 016	Turbine Engine Laboratory	21
MT 017	Advanced Airframe Laboratory	21.5
MT 018	Propellers and Rotocraft Laboratory	21
	TOTAL CEU's	190

FIRST TRIMESTER		Credits
HU 120	Communications I	3
SS 110	World History or 120 American History	3
MA 111	College Mathematics for Aviation I	3
MS 110	Accounting I	3
MS 200	Principles of Management	3
		15
SECOND TRIMESTER		
HU 121	Communications II	3
PS 101	Basic Chemistry	3
MA 112	College Mathematics for Aviation II	3
EC 110	Economics I	3
MS 112	Accounting II	3
		15
THIRD TRIMESTER		
HU 220	Communications III	3
MA 211	Introduction to Statistics	3
EC 210	Economics II	3
PS 103	Basic Physics	3
HU 250	Introduction to Logic	3
MS 305	Management Analysis & Concepts	3
		18
FOURTH TRIMESTER		
MS 390	Business Law I	3
CT 209	Introduction to Computers	3
EC 310	Labor Economics	3
MS 313	Personnel Management	3
SS 220	Introduction to Psychology	3
HU 221	Technical Report Writing	2
		17
	TOTAL CREDITS	65
	TOTAL CEU's	190

BACHELOR OF SCIENCE IN MANAGEMENT

Introduction

The primary objectives of this program are: (1) Prepare graduates for a wide variety of staff, operational and executive positions. (2) Provide the necessary undergraduate foundation to do successful graduate study.

Graduates with this degree are qualified to work in any management career field including such areas as personnel, finance and planning and control.

Admission Requirements

There are no special requirements for admission to this program; see page 18 for general requirements.

Transfer Credits

Students having completed previous college work may request an evaluation of their college transcript through the Dean of Admissions and Records.

Degree Requirements

This degree requires 131 credit hours as shown below.

Program Description

This program stresses courses in the areas of general education, management and computer related courses. The student may tailor his program to better fit his interests by choosing appropriate elective courses. If the student desires an area of concentration, he may choose from one of three areas of concentration.

BACHELOR OF SCIENCE DEGREE

MANAGEMENT

Number	Subject	Credits
FIRST TRIMESTER		
HU 120	Communications I	3
SS 110	World History or 120 American History	3
MS 110	Accounting I	3
EC 110	Economics I	3
MS 200	Principles of Management	3
		15
SECOND TRIMESTER		
HU 121	Communications II	3
MA 120	Quantitative Methods I	3
PS 101	Basic Chemistry	3
MS 112	Accounting II	3
EC 210	Economics II	3
		15
THIRD TRIMESTER		
PS 103	Basic Physics	3
HU 220	Communications III	3
HU 250	Logic	3
MA 220	Quantitative Methods II	3
SS 210	Sociology	3
		15

Number	Subject	Credits
FOURTH TRIMESTER		
SS 220	Psychology	3
CT 209	Introduction to Computers	3
HU 221	Technical Report Writing	2
MS 305	Management Analysis & Concepts	3
MA 222	Business Statistics	3
EC 310	Labor Economics	3
		17
FIFTH TRIMESTER		
MS 313	Personnel Management	3
MS 316	Psychology of Management	3
MS 318	Business Data Processing	3
MA 320	Decision Math	3
	Elective	3
		15
SIXTH TRIMESTER		
HU 340	Philosophy	3
MS 311	Marketing	3

Number	Subject	Credits
MS 315	Finance	3
MS 319	Management Information Systems	3
	Elective	6
		18
SEVENTH TRIMESTER		
MS 390	Business Law I	3
MS 401	Management Planning & Control	3
MS 420	Industrial Management	3
	Electives	9
		18
EIGHTH TRIMESTER		
MS 430	Management Applications	3
HU/SS	Electives	3
	Electives	12
		18
	TOTAL CREDITS	131

(An Area of Concentration is not Mandatory)

Requirements for undesignated electives may be met by any course which is sufficiently different from the courses required (e.g., College Algebra is not sufficiently different from Quantitative Methods I). (Necessary prerequisites apply.)

AREAS OF CONCENTRATION

Computer Technology: The increasing use of computers in all phases of industry makes this area of concentration an ideal and timely program to pursue. Whether it be in preparation for staff, operating, or managerial positions, this program can be of considerable value. The student augments the core courses in management, general science and humanities, with training in the theory and utilization of computers and the opportunity to apply the theory employing the necessary hardware. The following courses are required:

Number	Subject	Credits
CT 309	Fortran Programming	3
CT 310	Business Programming	3
CT 320	Advanced Business Programming	3
CT 401	Data Structures and Operating Systems for Business	3
	TOTAL CREDITS	15

Air Force Aerospace Studies: This program provides the background for the individual who desires to enter the Air Force as a military pilot trainee. Successful completion of this program qualifies the graduate for a commission as an officer in the United States Air Force.

Required Courses:

Number	Name	Credit
AF 101	Air Force Aerospace Studies	1
AF 102	Air Force Aerospace Studies	1
AF 201	Air Force Aerospace Studies	1
AF 202	Air Force Aerospace Studies	1
AF 301	Air Force Aerospace Studies	3
AF 302	Air Force Aerospace Studies	3
AF 401	Air Force Aerospace Studies	3
AF 402	Air Force Aerospace Studies	3
	Total	16

Military Science and Tactics: Successful completion of this four-year Army ROTC program will guarantee a commission in the U.S. Army. This area of concentration is offered in cooperation with Stetson University.

Number	Subject	Credit
MY 101 & 102	Basic Military Science	4
MY 201 & 202	Basic Military Science	4
MY 301 & 302	Advanced Military Science	4
MY 401 & 402	Advanced Military Science	4
	Total	16

COLLEGE OF AVIATION TECHNOLOGY

COLLEGE OF AVIATION TECHNOLOGY

Introduction

The College of Aviation Technology is comprised of four divisions: Aeronautical Science, Air Force Aerospace Studies, Flight Technology and Maintenance Technology. These divisions, in addition to presenting their own programs, provide technical support and specialized courses to the College of Aeronautical Studies and the College of Continuing Education.

The division of Aeronautical Science provides a college level aviation education heavily oriented to the various technological areas of flight. While the student is obtaining his Bachelor of Science, he is also preparing for his FAA flight ratings. This equips him to enter the aviation field with a combined general college and aviation specialization background.

The division of Air Force Aerospace Studies offers both the two year and the four year AFROTC programs. Any degree program may be selected but either the Aeronautical Science degree program or the Aeronautical Studies degree program (with a Flight Technology area of concentration) provides an extensive background for entry into Air Force pilot training. Other degrees such as Aviation Management provide a broad background for entry into other specialties in the Air Force.

The division of Flight Technology has two distinct programs. One program provides all the academic flight courses for all of the Colleges of the University while the other program is a non-academic certificate program meeting Flight Technology division requirements only.

The division of Maintenance Technology also has two distinct programs, academic and certificate. In the academic program, a student can receive both an Associate in Maintenance Technology degree and preparation for a Maintenance Technician certificate. This combination prepares him to enter the aviation maintenance field level. In the certificate program, he receives preparation for the Maintenance Technician certificate, preparing him to enter the aviation field as a practicing maintenance technician in either airframes or powerplants.

Completion of either of these programs provides a background for entry into various Bachelor degree programs such as Aircraft Maintenance Engineering Technology and Aviation Maintenance Management.

Accreditation

The Aeronautical Science, Flight Technology and Maintenance Technology programs are approved by the Federal Aviation Administration and the state approving agency for veterans training. Also, the Maintenance Technology Division is an FAA approved training center operating under Air Agency Certificate number 277, and the Flight Technology Division conducts flight training under Air Agency Certificate number 8SO-68.

AERONAUTICAL SCIENCE PROGRAM

Introduction

The Aeronautical Science program coordinates academic courses with flight training to prepare the student for a career in aviation. In addition to the academic degree, upon graduation, the student has qualified to be examined for the Federal Aviation Administration Commercial Pilot Certificate with Instrument and Multi-Engine ratings and Flight Instructor Certificate-Airplane. An area of concentration in a related field is a required part of the program; the individual is free to select the area of concentration which best suits his career objectives.

Admission

Students will be admitted who meet the general University requirements for admission and the age and physical qualifications for a flight training program. The requirements for aircraft pilot certificates are stated in Part 61 of the Federal Aviation Regulations. They are:

a. Student Pilot: 16 years of age.
b. Private Pilot: 17 years of age.
c. Commercial Pilot: 18 years of age.

Prior to being accepted into a flight training program, a student must produce evidence that he is qualified for at least the Airman's Class II Medical Certificate. Once accepted, the student is responsible for maintaining a current Airman's Class II Medical Certificate while participating in the flight program.

Admission to the Aeronautical Science degree program is limited to a "one-time" basis. Once a student becomes a candidate for the Bachelor of Science or Associate in Science Degree in Aeronautical Science, he must remain in the Aeronautical Science program until graduation to obtain the degree. If a student transfers from the Aeronautical Science degree program to another program (degree or certificate) within the University, he will not be eligible for return to the Aeronautical Science program.

Transfer of Previous Academic and Flight Experience

Students enrolled in the Aeronautical Science curriculum who have completed flight courses at other accredited institutions of higher education will be granted academic transfer credit for these courses, if the courses were completed with a "C" or higher grade.

For training received in other than accredited institutions, Federal Aviation Regulations establish rules regarding credit. They require that adequate evaluation be accomplished before any flight training credit may be granted.

A student may qualify for advanced placement in an ERAU flight program based on an evaluation by an ERAU designated flight examiner. He may receive academic credit for a flight course by completion of an equivalency examination. The basis for granting full academic credit for ERAU flight courses is an end-of-course examination by a designated Embry-Riddle examiner. The student must present evidence of previous training. A transcript of flight time from an FAA approved flight school, or, if a student has not attended an FAA approved school, personal flight logs, must be presented to the examiner before the evaluation can be conducted.

All requests for credit and/or advanced placement for flight or academic courses must be submitted in writing during the

first trimester at Embry-Riddle. Advanced standing and transfer of credits are explained on page 20. All requests for evaluation of previous college work are made through the Office of the Dean of Admissions and Records.

Required Flight Courses

The Aeronautical Science Program requires that the student participate in a flight course each trimester. Therefore, if a student enters the University with previous flight credit, he should enroll in the Aeronautical Studies Program until his flight and academic credits coincide with an appropriate term of the Aeronautical Science Program. At that time he may enter the Aeronautical Science Program and complete his degree requirements.

At least one flight course must be completed in residence at Embry-Riddle regardless of any advanced standing or transfer credits which may be granted. Exceptions may be made for qualified fixed wing military trained pilots who are on active duty or have been released from flight duties within the preceding twelve months, or for currently qualified fixed wing airline pilots.

Once a student has enrolled at Embry-Riddle, all subsequent flight courses must be completed in residence at Embry-Riddle. Flight time or flight courses completed elsewhere during enrollment at ERAU will not be credited toward completion of degree requirements. Students who attend other schools without proper approval will not receive academic credit for the courses completed.

Degree Requirements

The **Bachelor of Science Degree** in Aeronautical Science may be attained in eight trimesters. To earn the degree, a minimum of 131 credit hours is required. These credits consist primarily of flight courses and their corequisites, mathematics, science, basic management, humanities and social studies. General education and aviation-related subjects are combined with flight training to produce a pilot with a high level of competence. The program requires an area of concentration which is to be chosen from the following:

Aeronautical Engineering
Air Force Aerospace Studies
(Air Force ROTC)
Aviation Management
Applied Mathematics
Computer Technology
Military Science and Tactics
(Army ROTC)

The descriptions of the areas of concentration and courses required are shown on pages 46-50.

An Associate in Science in Aeronautical Science is granted upon completion of 75 credit hours and may be obtained in five trimesters. The program consists of flight courses and their prerequisites, mathematics, science, management, humanities and social studies. Incident to completion of the curriculum, the student becomes qualified to be examined for the Federal Aviation Administration Commercial Pilot Certificate with Instrument rating.

BACHELOR OF SCIENCE DEGREE

AERONAUTICAL SCIENCE

FIRST TRIMESTER		
FA 101	Primary Flight	2
AS 100	Foundations of Aeronautics	4
AS 101	History of Aviation	3
HU 120	Communications I	3
MA 111	College Math for Aviation I	3
		15

SECOND TRIMESTER		
FA 112	Basic Flight	2
AS 102	Navigation I	3
AS 103	Flight Rules & Regulations	3
HU 121	Communications II	3
MA 112	College Math for Avia. II	3
PS 101	Basic Chemistry	3
		17

THIRD TRIMESTER		
FA 201	Advanced Flight I	2
*FA 113	Single Engine Transition	0
AS 201	Meteorology	3
AS 203	A/C Engines-Recip.	3
HU 220	Communications III	3
PS 103	Basic Physics	3
MS 200	Principles of Management	3
		17

FOURTH TRIMESTER		
FA 202	Advanced Flight II	2
AS 209	Basic Aerodynamics	3
AS 210	A/C Systems & Components	3
EC 110	Economics I	3
SS 220	Intro. to Psychology	3
AS 302	Navigation II	3
		17

*NOTE: FA 113 may be taken in conjunction with FA 201 or FA 202.

FIFTH TRIMESTER		
FA 301	Instrument Flight	2
AS 311	A/C Engines-Turbine	3
AS 404	Principles of Instruction I	3
MS 110	Accounting I	3
EC 210	Economics II	3
AC	Area of Concentration	3
		17

SIXTH TRIMESTER		
FA 404	Flight Instructor-Airplane	1
AS 303	Government & Aviation	3
HU 250	Introduction to Logic	3
HU 221	Technical Report Writing	2
MS 305	Mgmt. Analysis & Concepts	3
AS 307	Flight Physiology	2
AC	Area of Concentration	3
		17

SEVENTH TRIMESTER		
FA 310	Multi-Engine	1
AS 408	Flight Safety	3
AS 308	A/C Performance	3
CT 209	Introduction to Computers	3
AC	Area of Concentration	6
		16

EIGHTH TRIMESTER		
FA (Open)	Flight Elective	1
AC	Area of Concentration	14/17
		15/18

TOTAL CREDITS (Depending on Area of (Concentration) 131/134

Following Areas of Concentration are available:
Aeronautical Engineering
Air Force Aerospace Studies
Applied Mathematics
Aviation Management
Computer Technology
Military Science and Tactics

Aeronautical Engineering: The combination of Aeronautical Science with Aeronautical Engineering integrates the core Aeronautical Science program with such Aeronautical Engineering courses as statics, solid mechanics, fluid mechanics, calculus and aerodynamics. These courses strengthen the student's background in the scientific area of aviation.

The following mathematics and physics courses are required in place of the ones listed in the vertical outline on this page.

Courses listed		Courses required
MA 111		MA 140
MA 112		MA 141
PS 103		PS 201
Number	**Name**	**Credits**
*PS 201	Physics I	5
MA 241	Calculus I	4
MA 242	Calculus II	4
MA 243	Calculus III	4
ES 201	Statics	3
ES 301	Solid Mechanics	3
ES 304	Fluid Mechanics	3
AE 301	Aerodynamics I	4
AE	Elective	2
	Total	32

*In place of PS 103 (3 credits)
Total credit hours required: 134

Air Force Aerospace Studies: This program provides the background for the individual who desires to enter the Air Force as a military pilot trainee. Successful completion of this program qualifies the graduate for a commission as an officer in the United States Air Force.

Required Courses:

Number	Name	Credits
AF 101	Air Force Aerospace Studies	1
AF 102	Air Force Aerospace Studies	1
AF 201	Air Force Aerospace Studies	1
AF 202	Air Force Aerospace Studies	1
AF 301	Air Force Aerospace Studies	3
AF 302	Air Force Aerospace Studies	3
AF 401	Air Force Aerospace Studies	3
AF 402	Air Force Aerospace Studies	3
	Air Force Elective	2
	Total	18
	Open Electives	8

Total credit hours required: 131

Applied Mathematics: The area of concentration in Applied Mathematics is designed to provide the graduate with the broad mathematical and scientific background necessary to pursue a career in industry or government. The curriculum provides for the mathematical study of general scientific concepts, principles and phenomena. This program will prepare the student for additional studies at the graduate level.

The following mathematics and physics courses are required in place of the ones listed in the vertical outline on page 67.

Courses listed	Courses required
MA 111	MA 140
MA 112	MA 141
PS 103	PS 201

Required Courses:

Number	Name	Credits
*PS 201	Physics	5
MA 241	Calculus & Anal. Geom. I	4
MA 242	Calculus & Anal. Geom. II	4
MA 243	Calculus & Anal. Geom. III	4
MA 340	Differential Equations	3
MA 401	Adv. Engineering Math. I	3
MA 412	Probability & Statistics	3
MA 430	Linear Algebra & Linear Prog.	3
CT 309	Adv. Fortran Programming	3
	Total	32

Total credit hours required: 134

*In place of PS 103 (3 credits)

Aviation Management: The individual who desires to enter the aviation field prepared to move into a responsible position in management or operations should consider this area of concentration. It provides the student with flexibility beyond the basic management concepts into the realm of labor economics, marketing, personnel and transportation.

Required Courses:

Number	Name	Credits
EC 310	Labor Economics	3
MS 311	Marketing	3
MS 313	Personnel Management	3
MS 318	Business Data Processing	3
	6 hours of 300 or 400 level EC/MS courses.	6
	Total	18
	Open Electives	8

Total credit hours required: 131

Computer Technology: The increasing use of the computer in all phases of aviation makes this area of concentration an ideal program to pursue. This area of concentration augments the Aeronautical

Science program with courses which include numerical analysis, DOS/assembly language, data processing and computer data structures. The curriculum integrates the Aeronautical Science perspective with computer systems applications, giving the student experience in problem solving using the computer.

Required Courses:

Number	Name	Credit
CT 309	Advanced Fortran Prog.	3
CT 310	Business Programming	3
CT 320	Adv. Business Programming	3
CT 350	Modeling Using Computers	3
CT 401	Data Struct. & Oper. Sys. for Business	3
CT 410	Computer Data Structures	3
CT 420	Operating Sys. & Assembly Language	3
MS 318	Business Data Processing	3
	Total	24
	Open Electives	2

Total credit hours required: 131

Military Science and Tactics: This program, developed by the U.S. Army, supplements the basic Aeronautical Science curriculum. The area of concentration is offered in conjunction with Stetson University. Successful completion of this program will qualify the graduate for a commission in the United States Army.

Required Courses:

Number	Name	Credits
MY 101	Basic Military Science	2
MY 102	Basic Military Science	2
MY 201	Basic Military Science	2
MY 202	Basic Military Science	2
MY 301	Advanced Military Science	2
MY 302	Advanced Military Science	2
MY 401	Advanced Military Science	2
MY 402	Advanced Military Science	2
	Military Science Elective	2
	Total	18
	Open Electives	8

Total credit hours required: 131

ASSOCIATE IN SCIENCE DEGREE

AERONAUTICAL SCIENCE

Number	Subject	Credits
FIRST TRIMESTER		
FA 101	Primary Flight	2
AS 100	Foundations of Aeronautics	4
AS 101	History of Aviation	3
HU 120	Communications I	3
MA 111	College Math for Avia. I	3
		15
SECOND TRIMESTER		
FA 112	Basic Flight	2
*FA 113	Single Engine Transition	0
AS 102	Navigation I	3
AS 103	Flight Rules & Regulations	3
HU 121	Communications II	3
MA 112	College Math for Avia. II	3
PS 101	Basic Chemistry	3
		17
THIRD TRIMESTER		
FA 201	Advanced Flight I	2
AS 201	Meteorology	3
AS 203	Aircraft Engines-Recip.	3
PS 103	Basic Physics	3
HU 220	Communications III	3
		14
FOURTH TRIMESTER		
FA 202	Advanced Flight II	2
AS 209	Basic Aerodynamics	3
AS 210	Aircraft Systems & Comp.	3
MS 200	Principles of Management	3
AS 302	Navigation II	3
		14
FIFTH TRIMESTER		
FA 301	Instrument Flight	2
AS 307	Flight Physiology	2
EC 110	Economics I	3
AS 303	Government & Aviation	3
HU 221	Technical Report Writing	2
SS 220	Introduction to Psychology	3
		15
	TOTAL CREDITS	75

*NOTE: FA 113 may be taken in conjunction with FA 201 or FA 202

FLIGHT TECHNOLOGY PROGRAM

Introduction

The Flight Technology program is an accelerated flight training program which is designed to enable a student to meet Federal Aviation Administration (FAA) pilot certificate requirements for graduates of FAA approved pilot and ground schools and ERAU standards and policies in a minimum time period. This program includes both flight and supporting ground courses. Students are committed to a full time training schedule which is oriented toward obtaining FAA pilot certifications.

The Flight Technology program is not administered in accordance with the Embry-Riddle Aeronautical University trimester academic calendar. Course convening dates may be obtained from the University Admissions Office.

Satisfactorily completed Flight Technology courses may be evaluated for advanced standing in some Embry-Riddle Aeronautical University academic curricula. Recommended University credit has been established for the Flight Technology Graduation Certificate.

A special fixed wing transition program is available for rotary wing rated U.S. Army pilots. It is an excellent opportunity to become fixed wing qualified. The program is comparable to U.S. Army fixed wing cross training. VA benefits may be utilized.

Holders of FAA commercial rotocraft certification receive 70 flight, 25 simulator and over 100 ground instructional hours. Graduates earn FAA commercial airplane single engine land/instrument certification. Weather permitting, multi-engine or Certified Flight Instructor may be earned in the same period. Successful completion will also earn the student 14 hours credit toward a B.S. or A.S. degree in Aeronautical Science.

An ERAU Certificate of Completion is awarded to all students who satisfactorily complete each FAA approved Flight Technology ground or flight course. An ERAU Flight Technology Graduation Certificate is awarded to all students who complete Flight Technology curricula.

There is a designated FAA Flight Examiner on the staff at Embry-Riddle and any flight check except Flight Instructor may be accomplished at ERAU. In the event additional training is required in excess of that provided by each flight course, additional flight or ground training may be obtained at an hourly rate.

Late model, fully equipped training aircraft are utilized for all flight training. Cessna 172 Skyhawks and Mooney M20C Rangers are the single engine training aircraft. Cessna 310 aircraft are utilized for multi-engine training.

Four General Aviation Trainers (GAT) and a multi-engine flight simulator are also utilized in training courses. The GAT trainers are used in conjunction with a sophisticated electronic system to provide ground instrument training which realistically simulates the complexities of actual instrument flight in a high density radar environment.

Flight and ground training facilities of the Division of Flight Technology are located in the new ultra-modern Gil Robb Wilson Memorial Aeronautical Science Center. Contained in this Center are the Flight Technology Administrative Offices, Flight Dispatch, Flight Planning Room, Aviation Weather Facility, Simulator Laboratory, Oral Rooms, Flight Student Lounge, Classrooms and Academic Consultation Rooms. Classroom facilities in-

clude the latest audio-visual equipment. The aircraft flight line is conveniently located adjacent to the Center.

Embry-Riddle Flight training utilizes the "Gemini-Flite" concept whereby two students fly together on dual Instructional flights. One student flies the aircraft and the other student observes. This concept increases and reinforces the learning experiences of both students at minimum expense to the students.

Admission to Flight Courses

Prior to being accepted in any flight course, the student must be properly enrolled as an Embry-Riddle Aeronautical University student in accordance with the general admission requirements of the University. See pages 18 to 24.

All students enrolled in any flight course at Embry-Riddle are required to have at least a current Airman's Medical Certificate Class II. This must be obtained through a qualified FAA Medical Examiner (physicians who have not qualified with the FAA cannot give this examination). In order to save time and money, it is suggested that those who are planning to enroll in a flight course obtain the Class II certificate along with completion of the University Health Form at the FAA Examiner's office.

To be eligible for FAA pilot certification a student must meet the age requirements of Federal Aviation Regulation Part 61: Student Pilot — 16 years, Private Pilot — 17 years, Commercial Pilot — 18 years.

Classes convene weekly. Contact Admissions Office for specific class dates.

Advanced Standing

Advanced standing may be granted based upon previous flight training and experience in accordance with FAA Regulations and ERAU standards and policies. Normally an evaluation flight will be required.

All requests for advanced standing for flight courses or flight course transfer credit must be submitted during the first trimester in attendance at Embry-Riddle. Required flight evaluations must be completed during this period and are at the student's expense. In evaluating requests for advanced standing or transfer credit, official documentation from previously attended academic or training institutions, personal flight logs and FAA certification will be given consideration.

Advanced standing and transfer credit must be authenticated by the Chairman, Flight Technology, or Dean of the College of Aviation Technology, and validated by the Dean of Admissions and Records for official records purpose. A completed Evaluation Form will be provided to the student.

Certificate Requirements

A listing of all required flight technology courses is shown on page 72.

At least one flight course must be completed in residence at Embry-Riddle, regardless of any advanced standing which may be granted. Exceptions may be made for qualified fixed wing military trained pilots who are on active duty or have been released from flight duties within the preceding twelve months, or for currently qualified fixed wing airline pilots.

After enrollment at Embry-Riddle Aeronautical University, the student must complete in residence at Embry-Riddle all subsequent flight courses which are required for the program in which he is enrolled. Flight time or flight courses completed elsewhere after enrollment at

ERAU will NOT be credited toward completion of requirements.

Schedules

Scheduled flight training is conducted seven days per week. Each student is responsible for meeting each scheduled flight and ground training commitment unless he is properly excused by his Flight Supervisor the day prior to the scheduled activity.

FLIGHT TECHNOLOGY CERTIFICATE

Subject No.	Subject	Approx. Length (Weeks)	Continuing Education Units
PRIMARY PHASE			
FP 100	Private Pilot Flight	8-11	6.4
FT 100	Private Ground School	6	6
INTERMEDIATE PHASE			
FP 200	Commercial Flight I	17-20	19.9
FT 200	Comm. Ground School	15	22.5
FP 301	Instrument Flight	8-11	5.5
FT 301	Instrument Ground School	6	7.5
ADVANCED PHASE			
FP 310	Multi-Engine Flight	2-3	2.5
FP 404	Flight Instructor Flight Laboratory	8-11	4.5
FT 404	Fundamentals of Flight Instructing	6	7.5
FP 406	Instrument Flight Instructor Flight Laboratory	8-11	4.5
FT 406	Fundamentals of Instrument Flight Instructing	6	4
OPTIONAL COURSES			
FP 300*	Transition Flight	15	17
FP 401	Advanced Instrument Flight I	4-6	4
FP 402	Advanced Instrument Flight II	4-6	4
FP 403	Advanced Instrument Flight, Multi-Engine	4-6	2.25
FP 410	Multi-Engine Flight Instructor Laboratory	4-6	3.25
FP 499		TBA	

*A specified course to prepare FAA certificated Commercial Rotocraft Helicopter pilots for addition of airplane-single engine land and instrument ratings to existing pilot certificates.

AVIATION MAINTENANCE TECHNOLOGY DEGREE PROGRAM

Introduction

This program is designed to enhance the potential of qualified Aircraft Maintenance Technicians. A graduate Aviation Maintenance Technician would provide guidance/supervision for maintenance activities associated with the general maintenance, overhaul, repair and modification of aircraft. The curriculum provides an advantage toward the obtaining of managerial positions in the maintenance career fields of the airlines, fixed base operators, aircraft companies, corporate business aircraft fleet operators and governmental flight activities.

Admissions

General University admission requirements apply. See pages 18 to 24.

Transfer of Credit

Credit for Maintenance Technology courses taken at other institutions will be evaluated for application to ERAU certificate requirements — which in turn is required for the Associate Degree. Other academic credits will be evaluated in accordance with general University policies (see page 20).

Advanced Standing

Students with aviation background training (civilian, military or approved schools) may request advanced standing for the specific parts of the curriculum. Applications for advanced standing must be submitted to the Chairman of the Maintenance Technology Division during the first trimester of enrollment. Requests will be evaluated on an individual basis.

Advanced standing and transfer credit granted in accordance with these procedures will be authenticated by the Dean, College of Aviation Technology and validated by the Dean of Admissions and Records for official records purpose. An Evaluation Form will be provided the student.

Degree Requirements

All candidates for graduation with the Associate degree in Aviation Maintenance Technology must have fulfilled the requirements of the Aviation Maintenance Technology program, page 75, or possess an F.A.A. Maintenance Technician (Airframe & Powerplant) Certificate.

Students placing below average on evaluation examinations are required to take developmental courses to enhance their ability to do required work and make necessary progress in regular Maintenance Technology classes. See p. 27.

Upon successful completion of the Aviation Maintenance Technology program, 190 Continuing Education Units will be granted on the basis of the Graduation Certificate. In addition, candidates for the Associate degree in Aviation Maintenance Technology must complete 36 trimester hours in the areas of humanities, science and management, as follows:

FIRST TRIMESTER		
HU 120	Communications I	3
EC 110	Economics I	3
MA 111	College Mathematics For Aviation I	3
MS 110	Accounting I	3
AS 101	History of Aviation	3
MS 200	Principles of Management	3
		18
SECOND TRIMESTER		
MS 305	Management Concepts and Analysis	3
MA 112	College Math for Aviation II	3
PS 103	Basic Physics	3
HU 121	Communications II	3
EC 210	Economics II	3
SS 220	Intro. to Psychology	3
		18
	TOTAL CREDITS REQUIRED	36

All of the courses in the Associate Degree in the Aviation Maintenance Technology program are creditable toward the Bachelor of Science in Aviation Maintenance Management. If a transfer to the Bachelor of Science in Aviation Management is desired, the student must take MA 120 (Quantitative Methods I) and one 3 hour elective in lieu of MA 111 and MA 112. See page 54 for Aviation Management required courses.

All certificate requirements (schedule, attendance, transfer and program changes, FAA exams, etc.) apply also to the certificate portion of the degree requirements. See page 75.

AVIATION MAINTENANCE TECHNOLOGY CERTIFICATE PROGRAM

Introduction

This program is a combination of the Airframe and Powerplant curriculums and provides the graduate with a theoretical and practical knowledge, as well as a manipulative ability to repair aircraft, engines and systems. In addition, the graduate is repeatedly tested to ensure that he possesses adequate knowledge to successfully pass the FAA examination for the Airframe and Powerplant Certificate which will permit him to sell his services to the public as a government-certified aviation Maintenance Technician.

The Maintenance Technology Division is an approved training center, operating under Air Agency Certificate No. 277, issued by the Federal Aviation Administration of the United States of America. Courses offered in this division give the student actual experience by classroom instruction, shop practice and "on the job" training. In the Embry-Riddle Repair Station, many types of engines, aircraft and accessories are overhauled and returned to service. This provides an opportunity for students to learn first hand the construction, operation, overhaul and maintenance of powerplants and structural components of aircraft.

Admission to Maintenance Technology

Applicants will be considered for admission who have graduated from accredited high schools with satisfactory records. Non-high school graduates who have been awarded high school equivalency diplomas or have completed work at accredited technical institutes with satisfactory grades and are in good standing at the last school attended also will be considered.

In certain cases, mature applicants who fail to meet the above requirements but present other suitable criteria, such as honorable service in the Armed Forces or employment experience, will be considered for admission.

Classes convene approximately every two months. Consult the University Calendar for exact registration dates.

Transfer of Credit

Part 147 of the Federal Aviation Regulations establishes rules regarding credit for previous training and requires testing of any subjects considered for transfer credit. These tests include questions on Federal Aviation Regulations and procedures as well as the technical aspects.

Generally speaking, students experienced in the military aviation mechanic field have a limited knowledge of Federal Aviation rules, regulations and procedures. Such students are enrolling in an approved school to prepare themselves for work in civil aviation where in most cases they will be operating under regulations much different from those encountered in the military.

Advanced Standing

Students with aviation background training (civilian, military or approved schools) may request advanced standing for specific parts of the curriculum. Applications for advanced standing must be submitted to the Chairman of the Maintenance Technology Division during the first trimester of enrollment. Requests will be evaluated on an individual basis.

Advanced standing and transfer credit granted in accordance with these pro-

cedures will be authenticated by the Dean, College of Aviation Technology and validated by the Dean of Admissions and Records for official records purpose. An Evaluation Form will be provided the student.

Certificate Requirements

The student may complete ERAU certificate requirements for Maintenance Technician, Airframe or Powerplants. Continuing Education Units are earned as indicated. The Maintenance Technician Certificate curriculum requires 2025 class hours of training, and is comprised of the following courses:

Number	Subject	C.E. Units	Class Hours
FIRST TRIMESTER			
MT 010	General Aeronautics	21	225
MT 011	Basic Airframe Science	21	225
SECOND TRIMESTER			
MT 012	Basic Powerplant Science	21	225
MY 013	Aircraft Systems Science	21	225
THIRD TRIMESTER			
MT 014	Aircraft Electrical Systems Science	21	225
MT 015	Advanced Reciprocating Powerplants	21.5	225
FOURTH TRIMESTER			
MT 016	Turbine Engine	21	225
MT 017	Advanced Airframe	21.5	225
FIFTH TRIMESTER			
MT 018	Propellers	21	225
	TOTAL	190	2025

*TRIMESTER — 15 Weeks
Enrollment is for one full trimester (15 weeks) of two consecutively scheduled classes (6 hour day) except those students choosing to enroll at mid-trimester starting dates (Term B (7.5 weeks) of first trimester).

The Airframe curriculum requires 1350 class hours of training, and is comprised of the following courses:

Number	Subject	C.E. Units	Class Hours
FIRST TRIMESTER			
MT 010	General Aeronautics	21	225
MT 011	Basic Airframe Science	21	225
SECOND TRIMESTER			
MT 013	Aircraft Systems Science	21	225
MT 014	Aircraft Electrical Systems Science	21	225
THIRD TRIMESTER			
MT 017	Advanced Airframe	21.5	225
MT 018	Propellers	21	225
	TOTAL HOURS	126.5	1350

The Powerplant curriculum also requires 1350 class hours of training, and is comprised of the following courses:

Number	Subject	C.E. Units	Class Hours
FIRST TRIMESTER			
MT 010	General Aeronautics	21	225
MT 012	Basic Powerplant Science	21	225
SECOND TRIMESTER			
MT 014	Aircraft Electrical Systems Science	21	225
MT 015	Advanced Reciprocating Powerplant	21.5	225
THIRD TRIMESTER			
MT 016	Turbine Engine	21	225
MT 018	Propellers	21	225
	TOTAL	126.5	1350

*TRIMESTER — 15 Weeks
Enrollment is for one full trimester (15 Weeks) of two consecutively scheduled classes (6 hour day) except those students choosing to enroll at mid-trimester starting dates (Term B (7.5 Weeks) of FIRST TRIMESTER).

If the student desires FAA certification, he must complete the FAA written, practical and oral examination. A student may elect to take these tests and examinations wherever he chooses or he may take advantage of the certification program which Embry-Riddle Aeronautical University offers. This program is neither part of

the regular curriculum nor are the hours counted as part of the minimum requirements. It consists of written tests, and practical and oral examinations. Each applicant must satisfactorily complete each phase of testing with a grade of 75% or better to be eligible for his FAA Aviation Maintenance Technician Certificate.

To be eligible for FAA Certification an applicant must meet the age requirements of Federal Aviation Regulation Part 65.

Schedule

The Maintenance Technology Division operates on a schedule which permits enrollment every 7½ weeks. Classes are in session 6 hours per day or 30 hours per week.

Attendance

Absenteeism in excess of three consecutive (6) hour classes or of any four (6) hour classes in a four-week period during an MT subject may result in a decision that the student be interrupted or dismissed. Should such absences be unexcused, interruption or dismissal becomes automatic at the end of the third or fourth absence to be effective as of the last day of attendance.

Grading System

The Maintenance Technology Division uses the numerical grading system of 0 to 100 as required by the Federal Aviation Administration. Students are graded in three areas.

They are:

a. Results obtained on written examinations.
b. Performance in shop projects.
c. Application of effort, attention to duty, attitude and ability to get along with fellow students.

Grades are made a matter of permanent record and are available to the FAA. The student must authorize the University in writing to make records available to prospective employers or other parties.

Graduation

Embry-Riddle awards a Certificate of Completion to all students successfully completing any of the FAA approved courses. This document certifies that the bearer has graduated from an FAA approved school. It must be presented to the appropriate official before taking the FAA Maintenance Technician examinations. In addition, graduates receive the Embry-Riddle Aeronautical University Certificate of Graduation.

The College of Continuing Education provides educational opportunities, both on and off campus, for individuals interested in Embry-Riddle Aeronautical University's aviation oriented programs. The University has entered into agreements with other colleges and universities and with various government agencies in order to serve the educational needs of the aviation community. These arrangements enable students enrolled in off-campus programs to complete all program requirements where they are located.

COLLEGE OF CONTINUING EDUCATION

COLLEGE OF CONTINUING EDUCATION

College of Continuing Education activities include: special seminars, including international seminars; the Dual Degree Program in conjunction with Georgia Institute of Technology; the Miami Education Consortium in cooperation with Barry College; Eagle University at Fort Campbell, Kentucky; Residence Centers at selected U.S. Army installations; the USAF European Center; and, the Master of Aviation Management degree program through the Embry-Riddle Aeronautical University Graduate Center on the Biscayne College campus in Miami. Additional information concerning these activities may be found on pages 29 through 34.

Programs available at off-campus locations include the Aeronautical Studies, Aviation Management, Aviation Maintenance Technology and Aviation Maintenance Management degrees. These degree programs are explained in the College of Aeronautical Studies and College of Aviation Technology sections of the Catalog. In addition, specialized continuing education programs are offered at selected locations. These include the Associate and Bachelor of Professional Aeronautics and Associate in Science in Aviation Safety degree programs for especially qualified personnel and the Airframe/Powerplant Technology program for appropriately qualified military aviation maintenance personnel.

PROFESSIONAL AERONAUTICS DEGREE PROGRAMS

Introduction

Associate and baccalaureate Professional Aeronautics programs are continuing education degree programs developed to fulfill the educational needs of highly skilled professionals, employed in selected aeronautical fields. These programs combine the formal training, directed study and professional work experience in a specific area of aeronautical technology with studies in the liberal arts, science and management. The programs are designed to prepare the student to assume added responsibilities within his field of professional competence. The baccalaureate program should also prepare the students to enter graduate level study programs if desired.

Admission Requirements

Admission to Professional Aeronautics degree programs is limited to full-time employees of the Federal Aviation Administration, qualified military personnel and other professionals in the field of aviation. A high school diploma, or equivalent, is required for all applicants. In addition, admission is limited to individuals employed in specific skill areas approved for award of technology credit.

Transfer Credit

Students who have completed previous college work may request an evaluation of their college transcript through the Dean of Admissions and Records (see page 20). Courses completed with a grade of "C" or better are transferable; however, only those courses which meet curriculum requirements will apply toward the degree.

Advanced Standing

Credit will be granted to enrolled students for the formal training, directed

study and experience in a professional area of aeronautical technology validated by the University. Credit toward the baccalaureate degree will be awarded when appropriate documentation is provided indicating that the student has attained the level of qualification required in an approved area of concentration. Credit toward the associate degree will be awarded upon verification of completion of certain formal training and 18 months of work experience in an approved area of concentration.

BACHELOR OF PROFESSIONAL AERONAUTICS

Degree Requirements

The Bachelor of Professional Aeronautics degree program requires 128 credit hours, including the credit hours granted on the basis of professional qualification. Courses to be taken to earn this degree are indicated on page 80.

Program Description

The curriculum requires study in the humanities and social sciences, mathematics and the physical sciences, the aeronautical sciences, and economics and management.

Areas of concentration which have been approved toward the Bachelor of Professional Aeronautics degree and the number of credit hours granted on the basis of professional qualification are as follows:

Air Traffic Control Technology (64 Credit Hours):

Technicians who have attained journeyman level qualification as flight service station specialists, enroute air traffic controllers, or terminal air traffic controllers are eligible for this concentration.

Airways Facilities Technology (64 Credit Hours):

Technicians who have attained journeyman level qualification in the computer, navigational aids, communications, or radar career areas are eligible for this area.

Airline Command Pilot (64 Credit Hours):

This area of concentration is open to individuals who possess the following qualifications and experience: (1) are currently employed as a pilot by a major airline and are qualified to fly as Captain; (2) hold an FAA Airline Transport Pilot Certificate with at least one type rating in a current air carrier aircraft; and, (3) have a minimum of 5,000 flight hours as Pilot in Command or Second in Command in aircraft with a maximum certificated gross takeoff weight of more than 70,000 pounds.

Additional areas of concentration will be approved and announced by the University as formal evaluations of government and industry aeronautical education and training programs are completed. Announcement of areas of concentration added to the degree program will be made through directors at off-campus locations served by the University.

Curriculum Requirements

The curriculum to be completed by an individual accepted for enrollment will be dependent upon the amount of advanced standing granted by the University for the area of concentration in which the student

will enroll. The following listing identifies specific curricular requirements for professional areas of concentration granted 32 aeronautical technology credits, 48 aeronautical technology credits and 64 aeronautical technology credits.

Number	Title	Credit Hours		
Aeronautical Technology (Lower Level)		22	33	44
Aeronautical Technology (Upper Level)		10	15	20
AS 101	History of Aviation	3	3	3
AS 303	Government and Aviation	3	3	3
AS 405	Aviation Law	3	3	3
HU 120	Communications I	3	3	3
HU 121	Communications II	3	3	3
HU 220	Communications III	3	3	3
HU 221	Technical Report Writing	2	2	2
HU 340	Introduction to Philosophy	3	3	3
HU Elective (Upper Level)		3		
SS 110/120	World or American History	3	3	3
SS 210	Introduction to Sociology	3	3	3
SS 220	Introduction to Psychology	3	3	3
SS Elective (Upper Level)		3	3	
MA 111	College Mathematics for Aviation I	3	3	3
MA 112	College Mathematics for Aviation II	3	3	3
MA 211	Introduction to Statistics	3	3	
PS 101	Basic Chemistry	3	3	3
PS 103	Basic Physics	3	3	3
EC 110	Economics I	3	3	3
EC 210	Economics II	3	3	3
EC 310	Labor Economics	3		
MS 110	Accounting I	3	3	3
MS 112	Accounting II	3	3	
MS 200	Principles of Management	3	3	3
MS 305	Management Analysis and Concepts	3	3	3
EC/MS Electives (Upper Level)		6	6	8
General Electives (In any discipline)		16	9	0
	TOTAL CREDITS	128	128	128

ASSOCIATE IN PROFESSIONAL AERONAUTICS

Degree Requirements

The Associate in Professional Aeronautics degree may be completed by the attainment of specialist/technician qualification and the equivalent of three trimesters of academic study. A minimum of 65 credit hours is required for the degree, including 18 hours on the basis of professional qualification in an area of concentration.

Program Description

The curriculum requires study in the humanities and social sciences, mathematics and physical sciences, the aeronautical sciences, and in the fields of economics and management.

Areas of concentration approved in the Associate in Professional Aeronautics degree program are:

Aircraft Maintenance: Individuals who have attained specialist/technician qualification as aircraft mechanic or aircraft component repairman.

Air Traffic Control: Individuals who have attained specialist/technician qualification as air traffic control tower operator, air traffic control ground control specialist, or air traffic control enroute specialist.

Aviation Weather: Individuals who have attained specialist/technician qualification in aviation weather.

Electronics Operation/Maintenance: Individuals who have attained specialist/technician qualification in the operation or maintenance of navigation and flight control avionic equipment in-

stalled in aircraft and avionic communications and associated ground communications equipment.

Flight Operations Administration: Individuals who have attained specialist/technician qualification in the administration of flight operations.

Flight Simulation Operations: Individuals who have attained specialist/technician qualification in the operation of instrument flight simulators.

Flight Technology: Individuals who have been rated as military pilots/aviators.

Curriculum Requirements

Number	Subject	Credits
Area of Concentration		18
AS 101	History of Aviation	3
AS 303	Government & Aviation	3
HU 120	Communications I	3
HU 121	Communications II	3
HU 220	Communications III	3
HU 221	Technical Report Writing	2
SS 220	Introduction to Psychology	3
MA 111	College Math for Aviation I	3
MA 112	College Math for Aviation II	3
PS 103	Basic Physics	3
EC 110	Economics I	3
MS 200	Principles of Management	3
MS 305	Management Analysis & Concepts	3
General Electives (Any discipline)		9
	TOTAL CREDITS	65

AIRFRAME/POWERPLANT TECHNOLOGY PROGRAM

Introduction

Many military aviation maintenance personnel possess the minimum experience requirements established by the Federal Aviation Administration as prerequisites for applicants seeking FAA Aviation Maintenance Technician Certificates. Embry-Riddle has developed the Airframe/Powerplant Technology program to provide these individuals with the knowledge of FAA rules, regulations and procedures necessary to complement their military training and experience. Successful completion of the Airframe/Powerplant Technology program should prepare the individual to successfully complete the FAA written, oral and practical examinations required to obtain the FAA Aviation Maintenance Technician Certificate.

Admission Requirements

Admission to this program is limited to those maintenance personnel who possess the minimum experience requirements specified in Part 65 of the Federal Aviation Regulations.

Program Requirements

This program is comprised of three courses, each consisting of eighty hours. Approximately 50% is in the classroom and 50% laboratory experience. Each course is assigned a credit value of three trimester hours. Course numbers and titles are as follows:

AP 101 Survey of General Aeronautics
AP 102 Survey of Airframe Maintenance
AP 103 Survey of Powerplant Maintenance

Locations

The Airframe/Powerplant Technology program is offered at Fort Campbell, Kentucky. Embry-Riddle will consider expanding the program to additional locations where significant interest is expressed and where maintenance facilities

are available to provide the student the laboratory experience necessary to prepare him for the FAA examinations.

Applicability of Credit

The credit hours obtained on successful completion of these courses may apply toward elective requirements in Embry-Riddle degree programs.

Students who complete one or more of these courses and subsequently acquire the FAA Aviation Maintenance Technician Certificate with Airframe and Powerplant ratings may wish to apply for admission to the Associate in Aviation Maintenance Technology degree program or the Bachelor's program in Aviation Maintenance Management. Credit received for completion of Airframe/Powerplant Technology courses will be included in the maximum Maintenance Technology credit authorized.

ASSOCIATE IN SCIENCE IN AVIATION SAFETY

Introduction

The Aviation Safety degree program is a continuing education program designed to meet the educational needs of highly skilled professionals employed or desiring employment in the field of aviation safety.

This program is designed to prepare the student for entry into the aviation safety career field in the aviation industry, military services, or municipal, state, and federal governments.

Admission Requirements

Admission to the Aviation Safety degree program is limited to military aviators possessing Federal Aviation Administration Commercial Pilot certification. A high school diploma, or equivalent, is required for all applicants.

Currently the program is offered only at the Fort Rucker Residence Center.

Transfer Credit

Students who have completed previous college work may request an evaluation of their college transcripts through the Dean of Admissions and Records.

Courses completed with a "C" or better are transferable, provided they meet curriculum requirements applicable to this degree.

Program Description

The curriculum requires study in the liberal arts, mathematics, aeronautical sciences, physical sciences, management and aviation safety to include formal training in aircraft accident investigation.

Degree Requirements

The Associate in Science in Aviation Safety may be completed in the equivalent of four trimesters of academic study. A minimum of 65 credit hours is required.

Curriculum Requirements

Number	Subjects	Credits
AS 100	Foundations of Aeronautics	4
AS 101	History of Aviation	3
AS 102	Navigation I	3
AS 103	Flight Rules and Regulations	3
AS 201	Meteorology	3
AS 303	Government and Aviation	3
HU 120	Communications I	3
HU 121	Communications II	3
HU 220	Communications III	3
HU 221	Technical Report Writing	2
MA 111	College Math for Aviation I	3
MA 112	College Math for Aviation II	3

MS 305	Management Analysis & Concepts	3
PS 101	Basic Chemistry	3
PS 103	Basic Physics	3
SF 195	Safety Management	2
SF 208	Subsonic Aerodynamics	3
SF 219	Aviation Psychology	2
SF 250	Safety Program Development	3
SF 303	Introduction to Aircraft Structures	2
SF 306	Aviation Physiology	2
SF 330	Aircraft Accident Investigation	3
	General Electives (any discipline)	3
	TOTAL CREDITS	65

COURSE DESCRIPTIONS

COURSE DESCRIPTIONS

Course Numbering System

Courses numbered 001-099 are non-credit courses; courses numbered 100-199 are on the Freshman level; 200-299 on the Sophomore level; 300-399 on the Junior level; and 400-499 on the Senior level. Courses numbered 100 through 299 are lower division level and 300 and above are upper division level. Course numbers 297, 298, 397, 398, 497 and 498 are assigned to special and experimental courses. Course numbers 299, 399 and 499 are assigned to individual research topics.

Graduate courses are numbered 500 and above.

The course offerings of the University are described below in alphabetical order by course designations. College and Division responsibility for the course subject areas are as follows:

1) College of Aeronautical Studies
   a) Aeronautical Engineering Division
      AE - Aeronautical Engineering
      ES - Engineering Science
      ET - Engineering Technology
   b) Computer Technology Division
      CT - Computer Technology
   c) Humanities and Social Science Division
      HU - Humanities
      SS - Social Science
      PE - Physical Education
   d) Management Science Division
      MS - Management Science
      EC - Economics
   e) Mathematics and Physical Science Division
      MA - Mathematics
      PS - Physical Science
2) College of Aviation Technology
   a) Aeronautical Science Division
      AS - Aeronautical Science
   b) Aerospace Science Division
      AF - Air Force Studies
      MY - Military Science
   c) Flight Technology Division
      FA - Flight, Academic
      FP - Flight Technology — Flight
      FT - Flight Technology — Classroom
   d) Maintenance Technology Division
      MT - Maintenance Technology
      AP - Aircraft/Powerplant Technology (Off Campus)

NOTE: Corequisites and prerequisites may be waived by permission of instructor and program chairman.

AERONAUTICAL ENGINEERING

AE 101 — Introduction To Aerospace Engineering..... 2 Credits

The aerospace industry. Manufacturing processes; airframe construction and design; structural materials; production planning and scheduling; PERT; prime and sub-contracting. Covers design, development, fabrication, assembly, inspection and testing of aerospace vehicles; aircraft, spacecraft, rocket boosters and related systems. Systems engineering; airframe, propulsion, electronics, control system analysis, system interfaces. To be taken during first year.

AE 301 — Aerodynamics I With Laboratory..... 4 Credits

A study of the atmosphere and the fundamental dynamics and thermodynamics of air. Laminar and turbulent boundary layers and vortex motion. Development of lift, drag and moment equations and their variations with Mach

number and Reynolds number. Supersonic airfoil theory. Correlating factors influencing wing design. Theories of drag and their application. Momentum, blade element and vortex theories of propellers. Prerequisite: MA 243, PS 201.

AE 302 — Aerodynamics II With Laboratory..... 3 Credits
Static performance, including power required and power available for level flight. Effect of weight and altitude on power climb performance, ceiling determination, and time to climb. Special performance problems including take-offs and landings, range, and endurance. Maneuvers such as spins, stalls, turning, gliding and diving. Theory of control surfaces and their design, longitudinal, lateral and directional stability and control. In-flight experiments. Prerequisite: AE 301.

AE 304 — Aircraft Structures I with Laboratory..... 3 Credits
Space structures. Introduction to fuselage stress analysis and wing structural analysis. Inertia forces and load factors for an airplane. Different flying and landing conditions. Mohr's circle for moment of inertia and combined stresses. Introduction to aircraft structures laboratory. Prerequisite: ES 201 & ES 302

AE 310 — Wind Tunnel Laboratory I..... 3 credits
The course consists of a series of experiments using the wind tunnel. Testing parameters development. Wind tunnel design principles. Instrumentation and calibration of the wind tunnel. Manometry. Total pressure and static pressure tubes. Investigation of laminar, transition and turbulent boundary layers. Pressure distribution with multimanometer of a NACA airfoil and calculation and plotting of lift coefficient, center of pressure, pitching moment coefficient, and profile and total drag coefficients at various flight angles of attack. Force balance calibration and operation. Prerequisite: AE 301

AE 401—Advanced Aerodynamics I..... 3 Credits
Kinematics and dynamics of a fluid field; stream function in two-dimensional incompressible flow; Euler's equation, the momentum theorem of fluid mechanics and the energy relations. Vortex flow, flow about a body and an introduction to compressible flow. Prerequisite: AE 302, MA 401, ES 304, ES 305.

AE 402—Advanced Aerodynamics II..... 3 Credits
Wave phenomena, normal shock, oblique shock, Prandtl-Meyer expansion waves and reflection waves. Dynamics of viscous fluids; boundary layer. Principle of similarity; wings in compressible flow. The Von Karman integration relations, Prandtl-Glauert transformation and Navier-Stokes equations. Prerequisite: AE 401.

AE 404 — Aircraft Structures II With Laboratory..... 3 Credits
Shear flow and bending stresses. Analysis of semimonocoque structure members. Beams with unsymmetrical cross-sections. Tapered beams. Cutouts in wing and fuselage members. Analysis of aircraft materials. Laboratory instrumentation for strain and deflection. Prerequisite: AE 304.

AE 405—Aircraft Structures III..... 3 Credits
Deflections of aircraft structures and statically indeterminate structures. Strain energy principle, method of least work and special methods of analysis. Design of members in tension, bending, torsion or compression. Prerequisite: AE 404.

AE 406—Jet And Rocket Propulsion..... 3 Credits
A study of ramjets, pulsejets, turbojets and turboprops. Thrust efficiency, fuel consumption, nozzle flow and Rayleigh and Fanno line conditions. Subsonic and supersonic diffusers. Mass flow. Energy transfer. Centrifugal and axial compressors. Engine and aircraft flight performance. Solid and liquid propellant

rocket motors. Prerequisite ES 305, AE 301.

AE 410—Wind Tunnel Laboratory II..... 3 Credits

This course consists of a series of experiments using the wind tunnel, Tare and interference tests. Model design and construction. Testing procedure. Control surface testing. Propeller testing. Testing windmill generators. Wind tunnel boundary corrections. Wake blocking. Streamline curvature. Solid blocking. Downwash connection. Use of wind tunnel data. Scale effects. Complete model testing. Prerequisite: AE 310

AE 413—Airplane Stability And Control..... 3 Credits

Development of longitudinal, lateral and directional stability and control. Control surface design, control effectiveness and size requirements. Dynamic control theory. Analog Computer simulation of aircraft flight characteristics. Handling characteristics of aircraft. Prerequisite: AE 302. (Lab fee required.)

AE 420—Aircraft Design I..... 3 Credits

Modern aircraft design principles to meet prescribed aerodynamic, structural and performance specifications. Prerequisite: AE 302, AE 304, AE 413. (Lab fee required)

AE 421—Aircraft Design II..... 3 Credits

Design of aircraft and aircraft components; project encompassing the principles of the engineering and aeronautical sciences. Prerequisite: AE 404, AE 420. (Lab fee required)

AE 433—Aerodynamics of the Helicopter..... 3 Credits

The development of rotating-wing aircraft and the helicopter. Hovering theory and vertical-flight performance analysis. Autorotation. Physical concepts of blade motion and control. Aerodynamics and performance of forward flight. Blade stall, stability and vibration problems. Design problems. Prerequisite: AE 302.

AE 299, 399, 499 — Special Topics In Aeronautical Engineering..... 1-6 Credits

Lectures, laboratories, or seminars on selected topics in aeronautical engineering. Prerequisite: Consent of instructor. May be repeated with a change of content. (Lab fee required, if computer used.)

AIR FORCE AEROSPACE STUDIES

AF 101 — U.S. Military Forces General Military Course (GMC).. 1 Credit

Examines the role of the Air Force in the contemporary world by studying the total force structure, strategic offensive, defensive, general purpose, and aerospace support forces. Corps Training (lab) exposes student to the function and organization of a military unit.

AF 102 — U.S. Military Forces General Military Course (GMC).. 1 Credit

Continuation of AF 101

AF 201 — The Development of Air Power General Military Course (GMC).. 1 Credit

Includes the development of flight from balloons through the current employment of U.S. air power including peaceful employment such as relief missions and civic action programs through the 70s. Corps Training (lab) provides leadership experience in officer type activities.

AF 202 — The Development of Air Power General Military Course (GMC).. 1 Credit

Continuation of AF 201

AF 301 — National Security Forces in Contemporary American Society Professional Officers Course..... 3 Credits

An examination of military pro-

fessionalism and existing patterns of civil-military relations to include analysis of the international and domestic environment affecting U.S. defense policy. Within this structure, a survey is conducted of the post World War II development of defense strategy, formulation and implementation of national security policy. Corps Training (lab) provides advanced leadership experiences in officer-type activities.

AF 302 — National Security Forces in Contemporary American Society
Professional Officers Course..... 3 Credits
Continuation of AF 301

AF 401 — Air Force Leadership and Management
Professonal Officers Course..... 3 Credits
A study of Air Force leadership at the junior officer level, including its theoretical professional, and legal aspects. Course also includes a study of military management, functions, principles and techniques applicable to the operation of military units. Corps Training (lab) provides advanced leadership experiences in officer-type activities.

AF 402 — Air Force Leadership and Management
Professional Officers Course..... 3 Credits
Continuation of AF 401

AIRFRAME/POWERPLANT TECHNOLOGY

AP Courses are Taught Only Off Campus; For On Campus Courses, See MT Courses

***AP 101 — Survey of General Aeronautics..... 3 Credits**
Aircraft drawings, hand and machine tools, AN hardware, mathematics, basic physics, materials and processes, cleaning and corrosion control, maintenance publications, maintenance forms and records, mechanics privileges and limitations, basic electricity, ground operation and servicing, and weight and balance.

***AP 102 — Survey of Airframe Maintenance..... 3 Credits**
Wood structures, aircraft covering, aircraft finishes, sheet metal structures, assembly and rigging, aircraft inspection, welding, assembly and rigging rotor-wing, hydraulics and pneumatic power systems, aircraft landing gear systems, position and warning systems, ice and rain control systems, fire protection systems, cabin atmosphere control system, aircraft fuel system, aircraft electrical systems, and communication and navigation systems.

***AP 103 — Survey of Powerplant Maintenance..... 3 Credits**
Reciprocating engines, engine inspection, turbine engines, fuel metering systems, induction systems, lubrication systems, engine fire protection systems, engine instrument systems, engine fuel systems, engine exhaust systems, and propellers.

***These are survey courses for experienced** personnel designed to prepare them to take the FAA written examination for the Maintenance Technician Certificate.

AERONAUTICAL SCIENCE

AS 100 — Foundations of Aeronautics..... 4 Credits
After completion of this course, the student will possess the basic knowledge necessary to pursue further study in Aeronautical Science and will be competent to conduct flight activities as a licensed Private Pilot. The student will be able to explain Flight Theory, compute various basic aircraft performance factors, identify physiological aspects of flight, relate FAA regulations to specific problems, interpret aviation meteorology reports, determine flight conditions to be expected in various situations, and solve navigational problems using basic pilotage, dead reckoning, and basic radio navigational procedures.

AS 101 — History of Aviation..... 3 Credits
A survey of aviation from its beginning to the present age. Major emphasis is on both the aviation industry in the United States and the government's regulation of it. Lesser emphasis is on technological and military developments. Upon successful completion the student can identify significant acts and developments that brought United States' aviation to its present state; and in light of the past, evaluate better such acts and developments as they come to pass in the future.

AS 102 — Navigation I..... 3 Credits
After completion of this course, the student will possess a basic working knowledge of pilotage and dead reckoning, navigation techniques and procedures. He will be able to explain the basis for the construction of maps. He will use charts and the Airman's Information Manual. He will solve problems using the navigation computer and understand its theory of operation through the development of wind triangles. He will apply this knowledge to practical navigation problems. He will be able to explain the types, uses and operating principles of radio navigation aids and equipment. He will be introduced to the theory and operation of electronic navigation equipment and celestial navigation. Prerequisite: AS 100

AS 103 — Flight Rules and Regulations..... 3 Credits
This course is a study, review and analyzation of those selected governmental rules, regulations, publications and procedures promulgated by the Federal Government through the Federal Aviation Administration (FAA) which are needed by pilots, and managers in related aviation fields so as to insure safe and orderly operation of air traffic both in VFR and IFR conditions within the "National Airspace System" structure. The broad range of regulations that are covered are: the issuance of pilot and instructor certificates and ratings and the regulatory conditions under which these certificates and ratings are necessary; the "rules of the road" governing the operation of aircraft within the United States; definitions and abbreviations; medical standards and certification; the rules covering aircraft accident regulatory reporting procedures; the certification and operation of air carriers and commercial operators of large aircraft; and, air taxi and commercial operations of small aircraft. Upon successful completion of the above the student will recognize the conditions under which such rules and regulatory procedures apply. Prerequisite: AS 100

AS 201 — Meteorology..... 3 Credits
The study of atmospheric processes and their relation to weather conditions encountered in the fields of aeronautics. Course includes cloud identification, solution of basic stability problems, study of air masses and the jet stream. Special emphasis is made on the aeronautical codes and weather maps. Practical application is accomplished by individual study in the University Weather Facility.

AS 203 — Aircraft Engines Reciprocating..... 3 Credits
The student must be able to demonstrate a knowledge of the language, materials used in construction, mechanical relationships, power calculations, carburetion, lubrication, ignition, instrumentation, and regulations pertaining to engine certification and operation. Each division of the subject will be presented by the use of textbook, work sheet, lecture and illustration.

AS 209 — Basic Aerodynamics.. 3 Credits
A study of subsonic, transonic, and supersonic aerodynamics, stability and control, aircraft operating strength limitations, and application of aerodynamic principles to flight techniques and procedures. After completion, a student should be able to apply basic principles of physics to aerodynamic problems, state basic aerodynamic results and their limitations, explain relationships in subsonic, transonic and supersonic flow situations, explain effect of airframe changes on stability and control, state operating limitations of the aircraft structure, and apply aerodynamic principles to common flight situations. Prerequisites: MA 112 and PS 103 or equivalent.

AS 210 — Aircraft Systems and Components..... 3 Credits
A comprehensive study of aircraft systems in which the student should be able to describe and explain the major requirements of regulations governing certification. He should be able to perform calculations relating to the electrical, hydraulic and environmental systems and be able to explain the major static and dynamic test requirements for these, as well as the control, fuel, lubrication, and anti-icing systems.

AS 211 — Aircraft Engines and Systems..... 3 Credits
An introduction to reciprocating and gas turbine aircraft engines, coupled with a survey of aircraft systems and components typically found on reciprocating and jet engine aircraft. Theory of both types of engines and their principles of operation, to include power and thrust measurement and operating procedures, are examined. Systems operation, including fuel, oil, hydraulic, electrical and pneumatic systems, is related to the type power plant with which they are normally associated. Differences between reciprocating engines with their associated systems are stressed. Not available to students in Aeronautical Science or the Flight Technology area of concentration of Aeronautical Studies.

AS 302 — Navigation II..... 3 Credits
A study of the fundamental concepts, techniques, and procedures involved in the science of instrument flight. After completion, a student should be able to apply aerodynamic factors, explain efficient attitude instrument flying techniques, explain operating principles and limitations of the flight instruments, utilize appropriate navigational and safety equipment, facilities, and flight control devices; describe the federal airway system, interpret all charts used in instrument flight; and apply and explain air traffic control procedures, regulations, and publications designed to insure the safe and orderly operation of flight under instrument flight rules. Should be taken one trimester before FA 301. Prerequisite: AS 102

AS 303 — Government and Aviation..... 3 Credits
The chronological development of governmental control and regulation is examined. This survey, together with a detailed study of representative Acts and Conventions, provides the basis for recognizing the origin and status of organizations currently exercising control and regulation, estimating effects of aviation legislation on national and international endeavors, appreciating the need for new or changed control with changing conditions, anticipating the effects of legislative or rule proposals on priority requirements of national defense, the public interest, and rights of the individual.

AS 307 — Flight Physiology..... 2 Credits
A study of aeromedical information significant to pilots. Upon completion, the student will explain the causes, symptoms, prevention, and emergency treatment of ailments common to the flight environment. He will describe man's normal functioning and the variations necessary for the onset of hypoxia, hyperventilation, decompression sickness, vision problems, spatial disorientation, and body heat imbalance. This is accomplished through the determination of the unique factors found at high altitudes.

AS 308 — Aircraft Performance..... 3 Credits
This course of study will provide the student with an understanding of the performance characteristics of modern reciprocating, turbo-prop, and jet aircraft. He will acquire a working knowledge of aircraft weight and balance procedures, takeoff and cruise control, and aircraft performance curves. He will make practical applications of his knowledge by computing operating data from aircraft charts and performance curves in order to obtain the highest degree of aircraft flight efficiencies. Prerequisites: AS 209 and PS 103 or PS 201 or equivalent.

AS 311 — Aircraft Engines, Turbine..... 3 Credits
This is a study of gas turbine fundamentals including thrust, factors affecting thrust, gas generator, mach number, specific fuel consumption, engine station designations, diffusers and diffusion, and types of gas turbine engines. Further, the student examines turbine engine components, including turbofan engine fan sections, compressors, fuel systems and fuel controls, turboprop fuel controls and propeller governors, as well as gas turbine engine operation and engine operational characteristics.

AS 401 — Airport Development and Operations..... 3 Credits
An in-depth study of the managerial problems associated with the development and operation of the small to medium size airport and associated fixed base operations. Representative areas of study include airport and operator expansions as dealt with in terms of federal, state, and local obligations; necessity for good community relations for future development; guidelines for establishing leases; and internal guidelines for good F.B.O. management. A study of the potential business and employment opportunities as represented by the average general aviation airport and fixed base operator. Prerequisite: AS 303.

AS 404 — Principles of Instruction I (Formerly Fundamentals of Flight Instruction)..... 3 Credits
During this course, the student will develop a flight training syllabus, construct a number of lesson plans, demonstrate different teaching methods and techniques of instruction which will include the use of instructional aids and various motivational tools. The student will apply the fundamentals of teaching and learning to flight instruction, analysis of flight maneuvers, and evaluation of performance. After completing the course, the student will be competent to conduct instructional activities as a Flight Instructor — Airplane. Prerequisite: FA 202 or Commercial Pilot Certificate.

AS 405 — Aviation Law..... 3 Credits
A study of the chronological development of air law, including federal and state regulatory functions, rights and liabilities of aviators and operators, rights of third parties on the ground, case history study, liens and security interest in aircraft, international conferences, bilateral and multilateral agreements and treaties and national and international criminal statutes pertaining to aviation. Prerequisite: AS 303.

AS 406 — Principles of Instruction II (Formerly Fundamentals of Instrument Flight Instructing)..... 3 Credits
A continuing examination of educational

theories and techniques, including the application of basic principles of Educational Psychology to instructional situations, developing effective methods for teaching instrument flying procedures, and maximizing competence in IFR operations. After completion, a student should be able to explain cognitive and motivational theories, construct a usable model of the mind, predict changes in behavior according to behavior modification theories, apply psychological models to educational problems, explain instrument training regulations and requirements, teach: operation of flight instruments and aircraft systems, attitude flying technique, flight planning procedures and chart use, utilization of navigation and safety equipment and application of regulations and procedures; and demonstrate a high level of competence in all IFR related areas. After completion of the course, the student should be competent to conduct instruction as an Instrument Flight Instructor. Prerequisites: A Commercial Pilot Certificate with an Instrument Rating; and AS 404 or a Flight Instructor Certificate with an Airplane Rating (single or multi-engine).

AS 408 — Flight Safety..... 3 Credits
A study designed to identify and explain the potential influence on pilot performance of such factors as attitude, motivation, and perception. The course involves oral and written work in formulating and analyzing both ideal and practical personal and organizational safety goals and procedures. Detailed examination of actual accident cases provides the opportunity to analyze examples of real life failures in personal and organizational safety standards. Prerequisites: AS 209, AS 307, and Commercial Pilot qualification or equivalent.

AS 409 — Aviation Safety..... 3 Credits
An examination of aviation safety designed to help the non-flying student identify major problem areas, evaluate safety programs and recognize the value and total impact of aviation accident prevention efforts. Major emphasis is given to recognition of the inherent hazards and vulnerability of the industry to the accident disaster. Underlying human factors which contribute to the aviation accident are identified, and safety prevention responsibilities of both governmental and private sectors are evaluated. Basic principles of investigation are examined; a survey of accident cases is made to improve recognition of real life failures. Not available to students in Aeronautical Science or the Flight Technology area of concentration of Aeronautical Studies.

AS 410 — Air Carrier Operations..... 3 Credits
This course will provide the student with an overview of the organization, management and operating procedures of United States air carriers in intra-state, inter-state, overseas, and foreign operations. He will gain insight into and enhance his knowledge of the functions involved in the overall air carrier operation. Further, the student will acquire a working knowledge of the sources and content of government regulatory matter, both economic and technical, as it pertains to air transportation. He will better understand the United States Air Transport Policy, the government's role in the control of the air carrier, and the relationship of national policy to the air carrier industry. Prerequisite: AS 303.

AS 412 — Corporate/Industrial Aviation..... 3 Credits
The course provides insight into the operation of a corporate flight department. The student will understand the management mobility and the methods for applying the facilities to accomplish it. He will become acquainted with operational and administrative factors peculiar to corporate aviation; how aviation contributes to industry; the typical flight department organization; aircraft and equipment evaluation; operations and maintenance; administrative and fiscal considerations.

AS 299, 399, 499 Special Topics in Aeronautical Science..... 3 Credits
Lectures, seminars, laboratories, independent studies, or combinations of these on selected topics in general aviation. Prerequisites: Consent of instructor and approval of Division Chairman. May be repeated with a change of subject.

COMPUTER TECHNOLOGY

CT 209 — Introduction to Computers..... 3 Credits
..... (Formerly MA 209)
Concepts of algorithms, computers, and programs. Low-level exposure to several computer programming languages, including FORTRAN and BASIC. Student develops an appreciation of what kinds of things can or cannot be done by computer, and the basic capability of programming a computer to achieve desired results. Prerequisites: MA 110 or satisfactory score on Placement Test. (Lab fee required)

CT 309 — Fortran Programming..... 3 Credits
..... (Formerly MA 309)
Solution of engineering problems using FORTRAN IV. Manipulation of arrays. Subroutines and function subprograms. Partitioning of programs. Scientific subroutines, analysis, programming, and documentation of engineering problems. Prerequisite: CT 209. (Lab fee required)

CT 310 — Business Programming..... 3 Credits
Introduction to commercially oriented languages. COBOL language elements and divisions. RPG-II language elements and statements. Applications of the languages with file structures and procedures to typical business data processing applications. Prerequisite: CT 209. (Lab fee required)

CT 312 Assembly Language Programming..... 3 Credits
Symbolic coding techniques. Interrupt processing and queueing. Modular programming at the machine language level. Real time programming techniques. Prerequisites: CT 309 or CT 310.

CT 315 — RPG-II Programming..... 3 Credit Hours
Symbolic programming using the RPG-II language. File processing concepts for totals and sub-totals. Indexed Sequential, Direct, and Sequential file processing techniques will be covered. Prerequisites: CT 209.

CT 320 — Advanced Business Programming..... 3 Credits
..... (Formerly MA 319)
Solution of management problems utilizing computers. Input and output of numerical and non-numerical data arrays. Decision tables. Random and sequential disk files. Analysis, programming, and documentation of management applications. Prerequisites: MS 305, CT 209. (Lab fee required)

CT 340 — Computer Processing of Statistical Data..... 3 Credits
Approximation methods, error analysis, simulation, least squares analysis, analysis of variance and covariance computations. Prerequisites: MA 222, CT 309 or CT 320.

CT 350 — Modeling Using Computers..... 3 Credits
Linear, non-linear, and dynamic programming. Queueing and simulation models. Prerequisites: MA 340, CT 320.

CT 401 — Data Structures and Operating Systems for Business..... 3 Credits
General application of data structures as used in business. Includes data set structures and relationships to file activity. Operating system services, Multi-programming, background-foreground processing, overhead cost analysis. Prerequisites: CT 320, MS 319.

CT 410 — Computing Data Structures..... 3 Credits
Basic concepts of data: linear lists, strings, arrays, orthogonal lists. Ordering or sorting techniques. Recursion, string and list processing languages. Prerequisites: CT 310 or CT 309.

CT 420 Operating Systems..... 3 Credits
Development, structure, and functions of Operating Systems. Demand service models. Development of a Real Time Operating System. Prerequisite: CT 312. (Lab fee required)

CT 430 — Numerical Analysis... 3 Credits
Numerical solution of algebraic/transcendental equations, system of equations, differential equations, integral equations; interpolation; finite differences; error analysis. Prerequisites: CT 309 and MA 401; Corequisite: MA 340.

CT 299, 399, 499 — Special Topics in Computing..... 1-6 Credits
Lectures, laboratories or seminars on Selected topics in computing. Prerequisite: Consent of Instructor and Division Chairman.

COOPERATIVE EDUCATION

CO 296, 297..... 6 Credits
Practical training and work experience in full-time employment in work that is closely related to student's degree program and career goals. Course title is determined by type of work assignment. Prerequisite: approval by Program Chairman and Director of Cooperative Education.

CO 396, 397..... 6 Credits
Continuation of CO 296, 297

CO 496, 497..... 6 Credits
Continuation of CO 396, 397

ECONOMICS

EC 110 — Economics I..... 3 Credits
An introduction to economic principles, problems, and policies, with emphasis on macroeconomic theory, business fluctuations, fiscal and monetary policy, and economic growth.

EC 210 — Economics II..... 3 Credits
An introduction to economic principles, problems, and policies, with emphasis on microeconomic theory, current domestic economic problems, and international trade.

EC 310 — Labor Economics..... 3 Credits
A survey of the economics of the labor market: wage determination and employment theory. Labor organization, labor legislation and current developments in labor relations. Prerequisites: EC 110 and EC 210.

EC 320 — Economics Of Industrial Organization..... 3 Credits
Market structures in American Capitalism. Structure and behavior of firms in particular industries. Government regulation of industry. Anti-trust Laws, Transportation and Public Utilities. Prerequisites: EC 110 and EC 210.

EC 340 — Managerial Economics..... 3 Credits
Use of the tools of economic analysis to develop insights into and to help solve problems in the operation and management of modern business enterprise. Imperfect markets, optimal combinations of products and pricing, forecasting demand, and capital budgeting are presented from the point of view of the decision maker. Prerequisites: EC 110, EC 210, MS 315.

EC 420 — Economics Of Air Transportation..... 3 Credits
A study of the economic aspects of airline service, with consideration given to the impact of federal aid and regulation, types of aircraft, airport problems, consumer interests, and competitive practices. Prerequisites: MS 110, MS 200, EC 210 and AS 303.

EC 299, 399, 499 — Special Topics In Economics..... 1-4 Credits

Lectures, seminars, laboratories, independent studies, or combinations on selected topics in economics. Prerequisites: consent of the Instructor and approval of the Division Chairman. May be repeated with a change of content.

ENGINEERING SCIENCE

ES 201 — Statics..... 3 Credits
A vector treatment of the concepts and characteristics of forces, moments and couples. Equilibrium of particles and rigid bodies. Distributed forces. Static friction. Analysis of structures. Corequisite: MA 243, PS 201.

ES 302 — Solid Mechanics With Laboratory..... 3 Credits
The concepts of stress and strain and their transformation. Elastic stress-strain relations. Analysis of stress and deformation in members subject to axial, torsional, bending and combined loading. Energy methods. Laboratory demonstrations of stress, strain and deflection. Prerequisite: ES 201. (Lab fee required.)

ES 303 — Dynamics..... 3 Credits
A vector treatment of the kinematics and laws of motion of particles and rigid bodies. Acceleration, momentum, work, energy and power. Prerequisite: ES 201. (Lab fee required)

ES 304 — Fluid Mechanics..... 3 Credits
The concepts of stress, deformation rate and viscosity. The basic equations governing fluid flow. The Bernoulli equation. Momentum theorems. Similitude. Elements of potential flow. Flow through tubes and orifices and over surfaces. Prerequisite: ES 201.

ES 305 — Thermodynamics..... 3 Credits
A study of the concepts of heat and work and their transformation, as governed by the first and second laws of thermodynamics. Properties of pure substances. Reversible processes and conventional power and refrigeration cycles. Corequisite: ES 303 and AE 301.

ES 307 — Metallurgy And Materials Science..... 3 Credits
A study of the fundamental nature of metals, alloys, and plastics with emphasis on those used in the aircraft industry. Crystal structure, crystallization and elements of the solid state semiconductors. Phase and equilibrium diagrams. Heat treatment of steel and other alloys. Surface hardening methods and methods of shaping materials. Various physical tests of materials. Materials-joining processes. Corrosion and its prevention. High temperature problems. Prerequisite: PS 106, PS 202. (Lab fee required)

ES 401 — Mechanical Vibrations With Laboratory..... 3 Credits
Simple harmonic motion. Undamped and damped free vibration. Forced vibration. Two-degrees of freedom. Multi-mass torsional and transverse systems. Equivalent torsional systems. Balancing. Dynamic damping. Analog computer laboratory demonstrations of system dynamic performance. Prerequisite: ES 303, MA 340. (Lab fee required)

ES 403 — Heat Transfer..... 3 Credits
One and two-dimensional steady and unsteady-state conduction heat transfer, including an introduction to finite-difference and finite-element methods of analysis. Free and forced convection heat

transfer. Radiation heat transfer. Prerequisites: ES 304, ES 305, MA 340. (Lab fee required)

ES 404 — Electrical Engineering I With Laboratory..... 3 Credits
Introduction to the fundamentals of electrical engineering. Circuit theory and variables. Voltage-current relationship. Circuit analysis and network solutions. Network equivalence. Thevenin and Norton equivalents. Energy storage elements; the capacitor, the magnetic field, the inductor. Graded sequence of applicable laboratory experiments. Prerequisite: PS 202, MA 340.

ES 405 — Electrical Engineering II With Laboratory..... 3 Credits
Continuation of the principles of electrical engineering. Electronic elements; vacuum diodes, triodes, tetrodes, pentodes and biasing. Graphical analysis. RL and RC networks. Sinusoidal steady state analysis. Phasor relationships. Solid-state semiconductor diodes and transistors. Magnetic circuits and electromechanical energy conversion. Graded sequence of applicable laboratory experiments. Prerequisite: ES 404.

ES 407 — Advanced Solid Mechanics..... 3 Credits
The basic equations of the theory of elasticity. Energy principles. Matrix methods of stress and deformation analysis of structures. Axially symmetric problems. Torsion. Plates and shells. Elastic stability. Introduction to the finite element method of stress analysis. Prerequisite: ES 302, MA 340. (Lab fee required)

ES 408 — Continuum Mechanics..... 3 Credits
Kinematics and deformation of a continuum. Stress. Balance principles for mass, momentum and energy. Constitutive equations. Application of the theory to solid and fluid media. Prerequisite: ES 303, MA 401.

ES 409 — Space Mechanics..... 3 Credits
Review of mathematical fundamentals including vectors. The two body problem; orbits, satellite launch, cotangential transfer between circular orbits, interception and rendezvous, long range ballistic trajectories. Gyrodynamics and gyroscopic instruments, precession and nutation, gyrocompass, stable and three-axis platform, inertial navigation. Vehicle motion. Performance and optimization, single and multi-stage rockets, flight trajectories, utilization of propellant, gravity turn. Generalized theories of mechanics; systems with constraints, generalized coordinates, D'Alembert and Hamilton's principles, LeGrange equations, missile dynamics and analysis. Prerequisite: ES 303 and MA 441.

ES 299, 399, 499 — Special Topics In Engineering Science..... 1-6 Credits
Lectures, laboratories or seminars on selected topics in engineering science. Prerequisite: Consent of Instructor and Division Chairman. May be repeated with change of content. (Lab fee required if computer used.)

ENGINEERING TECHNOLOGY

ET 101 — Engineering Graphics I..... 2 Credits
Principles of lettering. Drawing instruments and their use. Linework code and drafting techniques. Geometrical construction. Multiview projection. Sectional and auxiliary revolutions. Dimensioning, shop processes and tolerances. Threads and fasteners.

ET 102 — Engineering Graphics II..... 2 Credits
Continuation of Engineering Drawing I. Detail and assembly drawings. Com-

parison of the following methods of graphic representation: orthographic, axonometric, oblique and perspective projections. Introduction of descriptive geometry; the principles of orthographic projection applied to the solution of three dimensional problems. Space relationship of points, lines and planes. Curved and wrapped surfaces. Intersections and developments. Vector applications. Prerequisite: ET 101.

ET 303 — Aircraft Drafting And Detail Design..... 3 Credits
General arrangement of layout, detail and assembly drawings. Dimensioning, local and general notes, and specification of shop processes. Design and drafting of formed sheet metal parts; riveted, bolted, bonded and welded assemblies; control cable, push-pull rod, and torque tube assemblies. Hydraulic and electrical schematic and drafting. Prerequisite: ET 102.

ET 311 — Materials And Processes Laboratory..... 1 Credit
Sheet metal, welding, riveting, cutting, bending, rolling, stretching, shrinking, crimping, and nibbling. Power tools; saws, drill press, lathe, grinder. Basic shop procedures. (Lab fee required.)

ET 400 — Engineering Measurements Laboratory..... 2 Credits
Measurement standards and calibration hierarchy. Principles of modern laboratory test instrumentation. Basic electrical measurements and sensing devices. Meaasurement of displacement and area; fluid pressure and flow; temperature; thermal and transport properties; force; torque; strain; motion and vibration. Processing and analyzing experimental data. Report writing and data presentation. Prerequisite: ES 302, ES 303, ES 404. (Lab fee required)

ET 401 — Machine Elements..... 3 Credits
Study of machine motion, velocity, acceleration and cycling. Sizing of machine elements under operational conditions. Application and design of mechanical linkages, springs, clutches, brakes, cams, sprockets, gears and gear trains, bearings and lubrication. Other selected topics. Prerequisite: ES 302.

FLIGHT-ACADEMIC

FA 101 — Primary Flight..... 2 Credits
Airplane registration, airworthiness, equipment documents, log books, and inspection reports; performance, range and operations; loading and line check. Pre-flight operations, taxiing, normal and crosswind takeoffs and landings; climbs, level flight and descents at normal and minimum controllable speeds; stalls and stall recoveries; 720° steep turns about a point; normal landings; short and soft field takeoffs and landings; slips; emergency operation of aircraft equipment; cross-country flight planning; cross-country flying; cross-country emergencies; use of radio aids to VFR navigation and control by reference to flight instruments in preparation for the FAA private pilot flight test. Corequisite: AS 100.

FA 112 — Basic Flight..... 2 Credits
Review of FA 101 maneuvers and procedures, basic instruments; use of radio aids to VFR navigation; short and soft-field takeoffs and landings; review of cross-country flying; introduction to advanced precision maneuvers. Prerequisite: FA 101 or equivalent experience based on ERAU evaluation. Corequisite: AS 102, AS 103.

FA 113 — Single Engine Transition..... 0 Credit
Transition course in a single engine aircraft with a constant speed propeller and

retractable landing gear. May be taken in conjunction with FA 201 or 202. Completion is required prior to completion of FA 202. Prerequisite: FA 101, FA 112 or equivalent experience based on ERAU evaluation.

FA 201 — Advanced Flight I..... 2 Credits
Review and continued study of the subjects in FA 112; extensive navigation training including radio navigation utilizing VHF and LF radio navigation aids; air surveillance radar approaches; night operations including night navigation; extensive basic instrument training including radar approach procedures. Prerequisite: FA 112 or equivalent experience based on ERAU evaluation. Corequisites: AS 201, AS 203.

FA 202 — Advanced Flight II..... 2 Credits
Review and continued study of the subjects in FA 201; advanced precision maneuvers including chandelles, lazy eights and eight-on-pylons and 720° power turns; gliding spirals; 180° side approaches and 360° overhead approaches; accuracy landings. Prerequisite: FA 201 or equivalent experience based on ERAU evaluation. Corequisites: AS 209, AS 210.

FA 301 — Instrument Flight..... 2 Credits
Instrument flight planning; filing an instrument flight plan; aircraft performance, range and fuel requirements; required instrumentation and equipment and their proper use; advanced instrument flight techniques; recovery from unusual attitudes; emergency procedures; IFR navigation and instrument approach procedures including VOR, ILS, DME, ADE, and radar approach procedures; holding procedures; missed approach procedures; compliance with ATC procedures including actual IFR cross-country flying. Prerequisites: AS 201, AS 302 and FA 202 or equivalent experience based on ERAU evaluation, plus FAA Commercial Pilot Certificate.

FA 310 — Multi-Engine Flight..... 1 Credit
Multi-engine aircraft systems, loading and performance; V speeds; theories of multi-engine flight; preflight procedures; basic airwork; landings and takeoffs, cruise control and fuel management; emergency procedures-general; engine-out emergencies night landings and takeoffs; multi-engine instrument flight including all types of approaches; emergency procedures in instrument flight including engine-out instrument approaches and missed approaches. Prerequisites: FAA Commercial Pilot Certificate and Instrument rating. Corequisites: AS 308. A one hour flight allowance is included for FAA check ride.

FA 401 — Advanced Instrument Flight I..... 1 Credit
Advanced training for the FAA Instrument rated pilot including instrument flight planning; instrument cross-country flying; instrument enroute procedures and navigation; instrument approach procedures of all types; and emergency procedures. Includes five hours of pilot in command time. Prerequisites: FA 301 or equivalent experience based on ERAU evaluation, plus FAA Commercial Certificate and Instrument rating.

FA 403 — Advanced Instrument Flight, Multi-Engine..... 1 Credit
This course is offered as an alternate to FA 401. Instruction in all of the same subject matter given in FA 401 is conducted in the multi-engine aircraft and the multi-engine flight simulator. Prerequisites: FA 310 or equivalent experience based on ERAU evaluation, plus FAA Commercial Certificate and Instrument rating; or FP 310 or equivalent experience based on ERAU evaluation plus FAA Multi-Engine Certificate.

FA 404 — Flight Instructor Flight Laboratory..... 1 Credit
Practice in the explanation and demonstration of all prescribed flight maneuvers and the practical in-flight application of teaching techniques and methods, in preparation for the FAA Flight Instructor-

Airplane flight test. Prerequisite: FAA Commercial Pilot Certificate with instrument rating. Corequisite: AS 401.

FA 406 — Instrument Flight Instructor Flight Laboratory..... 1 Credit
Training, practice, and demonstration of prescribed instrument flight training maneuvers and procedures. Practical application of instructing techniques in preparation for the FAA Flight Instructor-Instrument flight test. Prerequisites: FA 404 or FAA Commercial Pilot Certificate with Instrument rating and Flight Instructor-Airplane. Corequisite: AS 406.

FA 410 — Multi-Engine Flight Instructor Laboratory..... 1 Credit
This course is offered as a follow-on to FA 404 and FA 310. It is designed to qualify the Multi-Engine rated pilot with an instructor's rating to teach the Multi-Engine Transition and to qualify him for the FAA Multi-Engine Instructor's rating. Prerequisites: FA 310 or equivalent based on ERAU evaluation, plus FAA Multi-Engine certificate and FA 404 or equivalence based on ERAU evaluation. (Special fee required)

FA 299, 399, 499 — Specified Flight Technology Course..... TBA Credit
Variable content, variable cost. May be used for extra flight instruction, student evaluation, student flight proficiency, extra synthetic trainer or ground instruction, based upon individual student requirements. The Chairman, Flight Technology, will establish course content, charges and credit hours for each Specified Flight Technology course.

FLIGHT TECHNOLOGY — FLIGHT COURSES

FP 100 — Private Pilot Flight..... 0 Credits
Airplane registration, airworthiness, equipment documents, log books, and inspection reports; performance, range and operations; loading and line check. Pre-flight operations, taxiing, normal and crosswind takeoffs and landings; climbs, level flight and descents at normal and minimum controllable speeds; stalls and stall recoveries; 720° steep turns about a point; normal landings; short and soft field takeoffs and landings; slips; emergency operation of aircraft equipment; cross-country flight planning; cross-country flying; cross-country emergencies; use of radio aids to VFR navigation and control by reference to flight instruments in preparation for the FAA private pilot flight test. Corequisite: FT 100.

FP 200—Commercial Flight..... 0 Credits
Review of FP 100 maneuvers and procedures, basic instruments including radar approaches, use of radio aids for navigation, cross-country flying, night operations. Transition to higher performance aircraft. Introduction and practice of precision maneuvers in preparation for the FAA Commercial Pilot flight test. Level of Commercial syllabus to be enrolled in is dependent upon previous experience and ERAU flight evaluation. Prerequisites: FP 100, Private Pilot Certificate, or equivalent experience based on ERAU evaluation. Corequisite: FT 200.

FP 300—Transition Flight..... 0 Credits
A specialized course designed to prepare FAA certificated Commercial Rotocraft/Helicopter pilots for the addition of airplane-single engine land and instrument ratings to existing pilot certificates. Includes familiarization with fixed wing aircraft, stalls, takeoffs and landings, ground reference maneuvers, precision maneuvers, basic instruments, instrument flight planning, instrument navigation and approaches. Prerequisites: FAA Commercial Pilot Certificate with Rotocraft/Helicopter Category and class ratings. Corequisite: FT 301.

FP 301—Instrument Flight..... 0 Credits
Instrument flight planning; filing an instrument flight plan; aircraft performance, range and fuel requirements; required instrumentation and equipment and their proper use; advanced instrument flight techniques; recovery from unusual attitudes; emergency procedures; IFR navigation and instrument approach procedures including VOR, ILS, DME, ADF and radar approach procedures; holding procedures; missed approach procedures; compliance with ATC procedures including actual IFR cross-country flying. Prerequisites: FP 200, or equivalent experience based on ERAU evaluation, plus FAA Commercial Pilot Certificate. Corequisite: FT 301.

FP 310—Multi-Engine Flight..... 0 Credits
Multi-engine aircraft systems, loading and performance; V speeds; theories of multi-engine flight; preflight procedures; basic airwork, landings and takeoffs; cruise control and fuel management; emergency procedures-general, engine-out emergencies; night landings and takeoffs; multi-engine instrument flight including all types of approaches; emergency procedures in instrument flight including engine-out instrument approaches and missed approaches. Prerequisite: FAA Commercial Pilot Certificate and Instrument rating.

FP 401—Advanced Instrument Flight I..... 0 Credits
Advanced training for the FAA Instrument rated pilot including instrument flight planning; instrument cross-country flying; instrument enroute procedures and navigation; instrument approach procedures of all types; and emergency procedures. Includes five hours of pilot in command time. Prerequisites: FAA Private rating.

FP 403 —Advanced Instrument Flight Multi-Engine..... 0 Credits
This course is offered as an alternate to FP 401. Instruction in all of the same subject matter given in FP 401 is conducted in the multi-engine aircraft and the multi-engine flight simulator. Prerequsites: FAA Private Certificate, with Multi-engine and Instrument rating.

FP 404—Flight Instructor Flight Laboratory..... 0 Credits
Practice in the explanation and demonstration of all prescribed flight maneuvers and the practical in-flight application of teaching techniques and methods, in preparation for the FAA Flight Instructor-Airplane flight test. Prerequisite: FAA Commercial Pilot Certificate with Instrument Rating. Corequisite: FT 404.

FP 406—Instrument Flight Instructor Flight Laboratory..... 0 Credits
Training, practice, and demonstration of prescribed instrument flight training maneuvers and procedures. Practical application of instructing techniques in preparation for the FAA Flight Instructor-Instrument flight test. Prerequisites: FP 404 or FAA Commercial Pilot Certificate with Instrument rating and Flight Instructor — Airplane. Corequisite: FT 406.

FP 410—Multi-Engine Flight Instructor Laboratory..... 0 Credits
This course is offered as a follow-on to FP 404 and FP 310. It is designed to qualify the Multi-Engine rated pilot with an Instructor's rating to teach the multi-engine transition and to qualify him for the FAA Multi-Engine Instructor's rating. Prerequisites: FP 310 or equivalent based on ERAU evaluation plus Multi-Engine certificate; and FP 404 or equivalent based on ERAU evaluation.

FP 299, 399, 499 — Specified Flight Technology Course..... TBA Credits
Variable content, variable cost courses. May be used for extra flight instruction, student evaluation, student flight proficiency, extra synthetic trainer, or ground instruction, based upon individual student requirements. The Chairman, Flight Technology, will establish course content credit hours, and charges for each Specified Flight Technology course.

FLIGHT TECHNOLOGY — CLASSROOM

FT 100 — Private Pilot Ground School..... 0 Credits
A comprehensive study of basic topics necessary for the beginning flight student. Upon completion, the student will be qualified to pass the FAA Private Pilot written examination. The student will explain and use the elementary principles of radio communications, radio navigation, elements of the airplane, aircraft systems, weight and balance, aerodynamics, basic piloting procedures, and maneuver techniques, Federal Aviation Regulations, navigation computer, basic navigation (pilotage and dead reckoning), airports, Airman's Information Manual, and physiology of flight. Corequisite: FP 100

FT 200 — Commercial Ground School..... 0 Credits
A study of those aeronautical subjects which are necessary for a commercial pilot. Upon completion, the student will be highly qualified to pass the FAA Commercial Pilot written examination. The student will describe and, where appropriate use, weather charts and forecasts, navigation computer, radio navigation aids, Federal Aviation Regulations, aircraft performance, weight and balance, and aerodynamics. Prerequisite: FT 100 or FAA Private Pilot Certificate. Corequisite: FP 200.

FT 301 — Instrument Ground School..... 0 Credits
A complete study of gyro and differential pressure instruments incuding their construction, operating characteristics, and use under actual instrument weather conditions. Upon completion, the student will be qualified to pass the FAA Instrument Pilot written examination. The student will interpret and use Instrument Approach Charts, Enroute Charts and associated in-flight procedures. He will explain Federal Aviation Regulations pertaining to instrument flight, departure, enroute, arrival, and emergency procedures. He will evaluate aviation weather (including charts, forecasts and severe weather). He will exhibit the use of IFR flight planning and Air Traffic control procedures. The student will demonstrate the procedures to file for and conduct instrument flights under actual instrument conditions, safely, efficiently, and in compliance with Air Traffic Control instructions and Federal Aviation Regulations. Prerequisites: FT 200 or FAA Commercial Pilot Certificate. Corequisite: FP 301

FT 404 — Fundamentals of Flight Instruction..... 0 Credits
A study of the fundamentals of teaching and learning. The student will show a knowledge of effective teaching methods, instructional management, aeromedical information for instructors, instructor responsibilities, flight training syllabus, federal regulations for instructors and maneuver analysis. Upon completion he will be qualified to pass the FAA Flight Instructor-Airplane written examination. Prerequisite: FAA Commercial Pilot Certificate. Corequisite: FP 404

FT 406 — Fundamentals of Instrument Flight Instruction..... 0 Credits
The student will demonstrate effective teaching methods, instructional management, aeromedical factors related to instrument flight, instructor responsibilities, instrument flight training syllabus, federal regulations for instructors and instrument flight training maneuvers and procedures. Upon completion, the student will be qualified to pass the FAA written examination for Flight Instructor-Instrument. Prerequisite: FT 404 or FAA Flight Instructor-Airplane Certificate. Corequisite: FP 406

HUMANITIES

HU 010 — Cultural and English Language Seminar..... 0 Credits
Designed for students from other countries with limited command of the English language and experience of the culture of the United States. Daily instruction in reading, speaking, and listening to ordinary and technical English (in particular, terminology used in shop labs and on the flight line). Field trips to plays, movies, restaurants and other places. The course runs for 7½ weeks. (Special fee required)

HU 015 — Developmental Reading..... 0 Credits
A 7½ week course meeting 4 days per week, concurrently with introductory MT or FT courses. Designed to improve vocabulary, comprehension and speed with emphasis on basic technical knowledge; visual accuracy and quick recognition of patterns; aural discrimination in radio listening; study habits, note-taking, and test-taking techniques. (Special fee required)

HU 105 — Developmental English..... 3 Credits
Designed to improve competence in reading, writing, and speaking the English language. Grammar and mechanics, sentence and paragraph construction, vocabulary building. (Credit not applicable to any degree.)

HU 115 — Developmental Reading..... 1 Credit
Designed to aid students to increase comprehension and speed in reading. (Lab fee required)

HU 120 — Communications I.... 3 Credits
The course concentrates on expository writing, interpretation, analysis, and research exercises. Fiction and non-fiction from library and textbook sources are used to aid the student to develop communicative and evaluative skill.

HU 121 — Communications II... 3 Credits
A continuation of HU 120. Reading material — selected novels, poems, and plays. Prerequisite: HU 120

HU 130 — Elementary Spanish I..... 3 Credits
Basic grammar and reading. Introduction to conversation. Not open to students with two or more years of high school Spanish or equivalent.

HU 135 — Elementary Spanish II..... 3 Credits
A continuation of HU 130.

HU 220 — Communications III
A continuation of Communications I and II with concentrated emphasis upon speaking effectively. Modern and traditional theory and methods, study and practice of informative, persuasive, and symposium rhetorical forms are included in the course. Prerequisite: HU 121.

HU 221 — Technical Report Writing..... 2 Credits
The preparation of formal and informal technical reports, abstracts, resumes, and business correspondence. Emphasis will be placed on the long technical paper. Prerequisites: HU 120 and HU 121.

HU 230 — Advanced Spanish Conversation And Reading..... 3 Credits
Continuation of HU 130 and HU 135 with emphasis on development of fluency in conversation and reading.

HU 240 — Art Appreciation..... 2 Credits
A survey of painting, architecture, and sculpture, covering the major period of art history and basic criteria for aesthetic understanding.

HU 245 — Music Appreciation.. 2 Credits
Introduction to the history and appreciation of music that has substantially influenced our culture. Lecture and listening hours.

HU 250 — Introduction to Logic..... 3 Credits
Principles of valid thinking; the nature of inductive and deductive inferences and their applications.

HU 300 — World Literature..... 3 Credits
Major works and literary trends in world literature. Prerequisites: HU 120 and HU 121.

HU 305 — Modern Literature... 3 Credits
The mainstreams of literature of this century. The specific content — genre and major writers to be studied — will vary from trimester to trimester. Prerequisites: HU 120 and HU 121.

HU 310 — American Literature..... 3 Credits
A survey of intellectual backgrounds, major works and literary trends in American literature. Prerequisite: HU 121.

HU 340 — Introduction to Philosophy..... 3 Credits
An integrated study of man and the concepts of his culture, including views about himself, society, religion, science, the nature of knowledge, and some of the major philosophical systems such as dialectical materialism, pragmatism, and existentialism.

HU 345 — Religions Of Mankind..... 3 Credits
A survey of the major religions of the world, including Judaism, Christianity, Islamism, Hinduism, Buddhism, and Confucianism, along with a brief examination of the development of religion as a vital aspect of man's experience in history.

HU 350 — Journalism..... 2 Credits
Presents simultaneously the theory and practice of the techniques of journalism, familiarizing the student with the functions, skills, and responsibilities required in writing, editing, and producing ERAU's student publications. Open to students working on the staff of campus publications.

HU 299, 399, 499 — Special Topics In Humanities..... 1-6 Credits
Independent study, seminars, and other specially arranged courses not regularly scheduled. Prerequisite: Consent of Instructor and approval of Division Chairman.

MATHEMATICS

MA 011 — Developmental Math..... 0 Credits
A developmental course for MT and FT students with skill deficiencies in basic mathematics. The course is designed to advance the elementary skills of numerical operations and algebraic manipulations, along with a remedial introduction to simple geometry and trigonometry. Major topics include whole numbers, fractions, decimals, averages, ratio and proportion, square roots, geometry, signed numbers and trigonometry.

MA 104 — Slide Rule..... 1 Credit
Basic slide rule principles and use.

MA 105 — Basic Mathematics... 3 Credits
Fundamentals and theory of algebra, basic laws of fractions, exponents, radicals, factoring, linear equations, graphs and systems of linear equations. (Credit not applicable to any degree.)

MA 111 — College Mathematics for Aviation I..... 3 Credits
A precalculus course with applications to navigation, aircraft performance, aircraft design, aerodynamics, stability and control. Linear equations and inequalities; systems of equations; graphing; exponents and roots; quadratic equations; ratio and proportion; logarithms; mensuration formulae; trigometric ratios and identities. Prerequisite: MA 110 or equivalent.

MA 112 — College Mathematics for Aviation II..... 3 Credits
Basic Calculus with an introduction to

probability and statistics designed for the student of aviation. Differentiation and integration of polynomials and transcendental functions, applications of velocity, acceleration, area, volume, work and fluid pressure and design; comparison of discrete and continuous systems, frequency distribution, histograms and other statistical measures. Prerequisite: MA 111

MA 120 — Quantitative Methods I (Formerly College Math I)..... 3 Credits
Fundamental arithmetic and algebraic operations, functions, graphs, logarithms, matrix algebra. Prerequisite: MA 111 or equivalent.

MA 140 — College Algebra..... 3 Credits
Sets, equations, inequalities, functions, systems of equations, determinants, quadratic equation, partial fractions, logarithms. Prerequisite: MA 111 or equivalent.

MA 141 — Trigonometry..... 2 Credits
Solution of right triangles, reduction formulas, functions of several angles and multiple angles, trigonometric equations, inverse functions and complex numbers. To be taken concurrently with MA 140. Prerequisite: MA 111 or equivalent.

MA 211 — Introduction to Statistics..... 3 Credits
Measures of central tendency and dispersion; histograms and percentile rank; elementary distributions; one and two sample hypothesis testing involving proportions and means; confidence interval estimation of proportions and means; Chi Square distribution; correlation and Pearson's coefficient. Prerequisite: MA 112. Offered fall term.

MA 220—Quantitative Methods II. (Formerly College Math II)..... 3 Credits
Limits; differentiation and integration of algebraic, exponential and logarithmic functions; applications of differentiation to maximizing, minimizing and curve sketching; the differential; marginal values; applications to economic and business problems. Prerequisite: MA 120 or MA 111 or MA 140.

MA 222—Business Statistics..... 3 Credits
Measures of central tendency and dispersion; histograms; axioms and arithmetic of probability; finite sample spaces; dependent events and Bayes Theorem with applications to management problems; binomial, Poisson, and normal distribution and their interrelationships; discrete and continuous random variables; special continuous distributions; sampling distributions; hypothesis testing; estimation and confidence intervals. Prerequisite: MA 220, or MA 241 or MA 112. Offered fall & spring.

MA 241—Calculus and Analytical Geometry I..... 4 Credits
Graphs and equations; limits and continuity; differentiation and integration of algebraic functions; application of first and second derivatives. Prerequisite: MA 140 or MA 120 or MA 112. Corequisite: MA 141 or permission of Division Chairman.

MA 242—Calculus and Analytical Geometry II..... 4 Credits
The definite integral; differentiation and integration of trigonometric and exponential functions; parametric equations; polar coordinates; Arc length; center of mass. Prerequisite: MA 241.

MA 243—Calculus and Analytic Geometry III..... 4 Credits
Solid analytic geometry; vector functions in three dimensions; elements of infinite series; partial differentiation; multiple integrals. Prerequisite: MA 242.

MA 300—Applied Logic..... 3 Credits
Algebra of logic; truth tables; axiomatic systems; set theory; Boolean algebra; design and simplification of digital circuits. Prerequisite: MA 111 or MA 120 or MA 140. Offered spring term.

MA 320—Decision Mathematics. 3 Credits
The mathematical concepts and applications in mathematical model building and problem solving. Included are

mathematical areas which are basic to decision theory. Prerequisite: MA 222.

MA 340—Differential Equations. 3 Credits
Treatment of ordinary differential equations to include principal types of first and second order equations; methods of substitution on simple higher order equations; linear equations and systems of linear equations with constant coefficients; methods of undetermined coefficients and variations of parameters; Laplace transforms, series solutions applications to physics and engineering. Prerequisite: MA 243.

MA 412—Probability and Statistics. (Formerly Math. Stat.)..... 3 Credits
The probalistic model; probability in finite sample spaces; conditional probability and Baye's Theorem; discrete and continuous random variables; functions of random variables; expected value, variance and standard deviation; systematic study of the major discrete and continuous random variables; moment generating functions. Prerequisite: MA 242 concurrently or MA 220. Offered spring term.

MA 430—Linear Algebra and Linear Programming..... 3 Credits
Matrices, vectors, mathematical systems, determinants. Characteristics of linear programming problems, the simplex method, the transportation problem. Prerequisite: Junior or senior classification. Offered fall term.

MA 441—Advanced Engineering Mathematics I..... 3 Credits
Line integrals in rectangular coodinates. Vector fields with the study of Green, Guass and Stoke's theorems. Applications of vector field theory. Fourier series and orthogonal functions. Prerequisite: MA 340. Offered spring term.

MA 442—Advanced Engineering Mathematics II..... 3 Credits
The solution of linear differential equations with variable coefficients; study of the derivation, characteristics and solutions of partial differential equations; Fourier series, Fourier transform, Laplace transform and Green's function; applications in science and engineering. Prerequisite: MA 441. Offered fall term.

MA 443—Complex Variables..... 3 Credits
A study of complex numbers, complex functions, derivatives and analytic functions. Additional topics on complex integration, power series expansion, conformal mapping and their applications are covered. Prerequisite: MA 441. Offered summer term.

MA 299, 399, 499—Special Topics in Mathematics..... 1-6 Credits
Lectures, seminars, laboratories, independent studies, or combinations on selected topics in mathematics. Prerequisite: Consent of instructor and approval of Division Chairman.

MANAGEMENT SCIENCE

MS 110 — Accounting I..... 3 Credits
An introduction to accounting: double entry, income statement, balance sheet, interpretation of accounts; partnerships and corporations. (Lab fee required)

MS 112 — Accounting II..... 3 Credits
(formerly MS 212)
The purpose of this course is to acquaint the student with the basic principles and fundamentals of cost and income tax. At the end of the course the student should be able to prepare and analyze the books for partnerships and small corporations; set up basic cost systems; prepare financial statement analysis and give reasons for their evaluations. Prerequisite: MS 110.

MS 200 — Principles of Management..... 3 Credits
An overview of business management. Stress placed on management, its nature,

environment and opportunities. Organization, marketing, and operational factors considered.

MS 305 — Management Analysis And Concepts..... 3 Credits
Relevance and limitations of management theory in contemporary organizations. Current managerial problems and issues in a world of rapid change. Prerequisite: MS 200.

MS 308 — Public Administration..... 3 Credits
Characteristics of organization and management in government; impact of political processes and public pressures on administrative action; role of regulatory agencies; governmental personnel and budgetary procedures; unique qualification of the public administrator. Prerequisite: MS 305.

MS 311 — Marketing..... 3 Credits
Marketing theory; marketing management; sales management; market research. Public and customer relations; advertising; distribution. Government agencies as customers. Prerequisite: MS 305.

MS 312 — Accounting for Managerial Planning and Control..... 3 Credits
The objective of this course is to explain how accounting data can be interpreted and used by management in planning and controlling business activity. The student will acquire a knowledge of the usefulness and limitations of accounting and how it can help managers operate more effectively. Prerequisites: MS 112, MS 305, MA 120.

MS 313 — Personnel Management..... 3 Credits
An introduction to the methods and viewpoints of modern personnel administration. Case studies are selected to develop logical thinking in actual situations. Prerequisites: SS 210 or SS 220 and MS 200.

MS 315 — Finance..... 3 Credits
The finance function, financial analysis and control, financial planning, short-term and intermediate term financing, long-term financing and financial strategies. Prerequisites: MA 222, MS 112 and MS 305.

MS 316 — Psychology Of Management..... 3 Credits
A basic course about human problems within the supervisory and management ranks. An introduction to individuals, pairs, and different-sized groups in organizations. Prerequisites: SS 210 or SS 220 and MS 200.

MS 318 — Business Data Processing..... 3 Credits
A management approach to understanding the computer's impact on the business enterprise. Characteristics, potentialities, and limitations of electronic data processing are included. The major emphasis is on problem solving and preparation of reports commonly used in business activities. Prerequisites: MS 110, MS 200 and CT 209. (Lab fee required)

MS 319 — Management Information Systems..... 3 Credits
Management information acquisition and presentation, information economics and information management, information systems analysis, and operations analysis tools, accounting systems, critical-path information systems, inventory information systems, marketing information systems. Prerequisites: MS 305, MS 318 and MA 222. (Lab fee required)

MS 322 — Aviation Insurance..... 3 Credits
An introduction to the basic principles of insurance and risk with its special application to the aviation industry. An in-depth review of the aviation insurance industry in the United States including the market and types of Aviation Insurers. Prerequisite: MS 200.

MS 331 — Transportation Principles ..... 3 Credits
Basic principles of the several modes of transportation — air, sea, rail, motor,

water, and pipeline, including problems of competition, the importance of each in the economy, and future developmental prospects. Prerequisites: EC 110, EC 210 and MS 200.

MS 390 — Business Law I..... 3 Credits
A survey of the legal aspects of business transactions. Contracts, agency, bailments, negotiable instruments. Prerequisite MS 200.

MS 400 — Business Law II..... 3 Credits
Continuation of MS 390 to include legal aspects in the areas of: partnerships, corporations, sales, consumer credit, and government influence on business law. Prerequisite: MS 390.

MS 401 — Management Planning And Control..... 3 Credits
The requirements for short term and long range planning are investigated. New product planning is discussed. The importance of the control functions will be emphasized. Prerequisites: MS 315, MS 319 and MA 320. (Lab fee required)

MS 405 — General Aviation Marketing..... 3 Credits
Basic marketing concepts and procedures involved in the sale of general aviation aircraft and components to private industry and government. Particular emphasis will be on corporate aviation and commuter airlines. Prerequisites: EC 210 and MS 305.

MS 408 — Airport Management..... 3 Credits
Comprehensive examination of the major functions of Airport Management including master planning. Study of the socio-economic effect of airports on the communities they serve. Prerequisites: MS 305, EC 210.

MS 410 — Management Of Air Cargo..... 3 Credits
Intensive study of the practices and problems of management with respect to air cargo. Importance of air cargo service to the economy, rate and tariff problems, terminal facilities, competition, and future prospects. Prerequisites: MS 110, EC 210 and MS 305.

MS 415 — Airline Management..... 3 Credits
An introduction to the administrative aspects of airline operation and management. Topics include the Annual Profit Plan, Uniform System of Accounts and Reports, demand analysis, scheduling, the theory of pricing, fleet planning, facilities planning and airline financing. Prerequisites: MS 110, MS 305 and EC 210.

MS 420 — Industrial Management..... 3 Credits
An intensive study of management functions and organizations peculiar to industrial organizations. The interfaces and responsibilities of project, functional, and administrative functions will be investigated. Particular attention will be paid to industrial engineering, quality assurance, and manufacturing management functions. Prerequisites: MS 311, MS 313, MS 315, EC 310 and MA 320. (Lab fee required).

MS 421 — Small Business Management..... 3 Credits
An introduction to the management of a small business; financing, location, marketing, records, advertising, personnel, government agencies, etc. Prerequisite: MS 305. (Lab fee required)

MS 425 — Trends and Current Problems in Air Transportation..... 3 Credits
Analysis of selected contemporary issues, problems and trends facing management in various segments of the aviation industry including general aviation and the airlines. Students apply previously learned concepts to practical problems to develop increased understanding and demonstrate knowledge of the subject. Prerequisites: EC 110, EC 210, MS 305.

MS 430 — Management Applications..... 3 Credits
Case problems in determining business policy, instituting policy and appraising the results. The viewpoint is that of top

and middle management. Prerequisites: MS 401 and MS 420.

MS 299, 399, 499 — Special Topics In Management..... 1-4 Credits
Lectures, seminars, laboratories, independent studies, or combination on selected topics in management. Prerequisites: Consent of the Instructor and approval of Division Chairman. May be repeated with change of content.

MAINTENANCE TECHNOLOGY

MT 010 — General Aeronautics..... 21 CEUs
Aircraft Hand and Machine Tools, AN Hardware, Aircraft Drawings, Fluid Lines and Fittings, Materials and Processes, Ground Operation and Servicing, Cleaning and Corrosion Control, Mathematics, Maintenance Forms and Records, Basic Physics, Maintenance Publications, Mechanic Privileges and Limitations.

MT 011 — Basic Airframe Science..... 21 CEUs
Airframe Wood Structures, Aircraft Covering, Aircraft Finishes, Airframe Sheet Metal Structures, Welding, Assembly and Rigging.

MT 012 — Basic Powerplant Science..... 21 CEUs
Reciprocating Engines, Lubrication Systems, Fuel Metering Systems, Engine Fuel Systems, Induction Systems, Engine Exhaust Systems.

MT 013 — Aircraft Systems Science..... 21 CEUs
Aircraft Drawings, Fluid Lines and Fittings, Ground Operations and Servicing, Aircraft Landing Gear Systems, Hydraulic and Pneumatic Power Systems, Cabin Atmosphere Control Systems, Aircraft Fuel Systems, Position and Warning Systems, Ice and Rain Control Systems, Fire Protection Systems.

MT 014 — Aircraft Electrical Systems Science..... 21 CEUs
Introduction to Electricity, Basic Electricity, Mathematics, Aircraft Instrument Systems, Communication and Navigation Systems, Aircraft Electrical Systems, Position and Warning Systems.

MT 015 — Advanced Reciprocating Powerplants Laboratory..... 21.5 CEUs
Reciprocating Engines, Engine Inspection, Engine Electrical Systems, Ignition Systems, Fuel Metering Systems, Engine Fuel Systems, Induction Systems, Engine Cooling System.

MT 016 — Turbine Engine Laboratory..... 21 CEUs
Introduction to Turbine Engines, Turbine Engines, Engine Instrument Systems, Lubrication Systems, Fuel Metering Systems, Engine Fuel Systems, Induction Systems.

MT 017 — Advanced Airframe Laboratory..... 21.5 CEUs
Weight and Balance, Sheet Metal Structures, Assembly and Rigging, Airframe Inspection, Aircraft Instrument Systems, Rigging Rotor-wing Aircraft.

MT 018 — Propellers Laboratory..... 21 CEUs
Propeller Theory, Propeller Troubleshooting, Installation and Repair.

CEU credit is not posted on the transcript until the entire program is satisfactorily completed.

MILITARY SCIENCE AND TACTICS
ARMY ROTC
(In Conjunction with Stetson University)

MY 101 — Basic Military Science..... 2 Credits

MY 102 — Basic Military Science..... 2 Credits

MY 201 — Basic Military Science..... 2 Credits

MY 202 — Basic Military Science..... 2 Credits

MY 301 — Advanced Military Science..... 2 Credits
Prerequisite: Admission by selection and completion of Basic Course or active military service.

MY 302 — Advanced Military Science..... 2 Credits
Continuation of MY 301.

MY 401 — Advanced Military Science..... 2 Credits
Prerequisite: MY 302.

MY 402 — Advanced Military Science..... 2 Credits
Continuation of MY 401.

PHYSICAL EDUCATION

PE 101, 102, 201, 202 — Physical Activity..... ½ Credit
Participation in University sponsored intramural or varsity sports. A maximum of ½ credit per trimester may be earned, and only ½ credit per intramural sport. See Page 124 for list of intramural sports. Persons who have served a minimum of two years in the Armed Forces will be credited with two hours of Physical Activity upon application.

PE 222 — Science Of Exercise And Athletics..... 2 Credits
Aerobics and other exercise systems, functional human anatomy, exercise physiology, injury prevention and care, basic kinesiology, fundamentals of motor learning, fatigue, stress, nutrition and related topics. Development of a training philosophy and a life-long dynamic health maintenance program.

PHYSICAL SCIENCE

PS 101 — Basic Chemistry..... 3 Credits
Elementary Chemical Theory with considerable application to the Aeronautical Science and Aviation Management student. Covers basic atomic theory, elements, compounds and mixtures, calculation of weight and weight volume relationships, basic descriptive chemistry. (Not open to Engineering majors.) Corequisites: MA 111 or MA 120.

PS 103 — Basic Physics..... 3 Credits
Survey course in elementary physics. Stress will be on basic physics principles. Problem solving and problem solving logic will be an important, integral part of the course. Topics will include: Newton's Laws, gravitation, projectile motion, conservation laws, sound, light special theory of relativity, and quantum theory. MA 112 or MA 220 required before or simultaneously with the course. (Not open to Engineering majors.) (Lab fee required.)

PS 105 — Chemistry I With Laboratory..... 4 Credits
Fundamental principles of chemistry, basic atomic theory, valence, the chemical bond, oxidation number, symbols, formulas, equation and nomenclature. Chemical calculations, rates of reaction. Acids, bases and salt. Oxygen and

hydrogen. The periodic system. Conservation of mass and energy. Corequisite: MA 140 or MA 241. (Lab fee required)

PS 106 — Chemistry II with Laboratory..... 4 Credits
Equilibrium, kinetics, oxidation and reduction, electrochemistry and organic chemistry; study of nomenclature, functional groups, elementary preparations, reactions and uses of organic compounds. Prerequisite: PS 105 (Lab fee required).

PS 201 — Physics I, Mechanics And Heat With Laboratory..... 5 Credits
Vector and scalar quantities, Newton's Laws of motion and gravitation, Friction. Work. Energy. Power. Torque and rotational motion, Momentum, Curvilinear motion. Elastic properties of matter, Fluids at rest and in motion, Properties of gases. Heat. 4 lectures per week and one 3-hour laboratory per week. Corequisite: MA 241. (Lab fee required). Offered fall & spring.

PS 202 — Physics II, Sound, Electricity And Light With Laboratory..... 5 Credits
Wave motion, sound waves, acoustics. Fundamental laws of electricity and magnetism. Electrostatic and electromagnetic field theory. Induced electromagnetic forces. Power, Capacitance, Electrical instruments. Nature of light, index of refraction, refraction by lenses, reflection from mirrors, diffraction, and interference. 4 lectures per week and one 3-hour laboratory per week. Prerequisite: PS 201. (Lab fee required.) Offered fall & spring.

PS 303 — Modern Physics..... 3 Credits
A survey course in modern concepts in physics. The nucleus and atomic structure. Fundamentals of wave mechanics. Basic relativity. Mossbauer effect. Parity and fundamental particles. High energy physics, cryogenics and superconductivity. Fundamentals of electronics. Microwave Optics, Stimulated emission, lasers. Prerequisite: PS 202. Offered spring.

PS 304 — Man And His Environment..... 3 Credits
A survey course in the environmental problems arising from man's use and abuse of his environment. Ecological, Economic, Sociologic and Technologic Principles will be applied to the management control of pollution of the atmosphere, land and water resources of the earth. Prerequisite: PS 101 or PS 105. Offered summer.

PS 299, 399, 499 — Special Topics in Physical Science..... 1-4 Credits
Topics within the fields of the physical sciences impinging on aeronautical engineering development or practices and which are of current or anticipated interest will be discussed on a seminar basis. Prerequisite: Consent of Instructor and approval of Division Chairman.

SOCIAL SCIENCE

SS 110 — World History..... 3 Credits
Designed primarily as a survey of the development and evolution of Western Civilization from 1500 to the present. Emphasis is placed on the effect of Western influence on the globe.

SS 120 — American History..... 3 Credits
(1865 to the present). Reconstruction; the age of big business; the US as a world power; World War I and II. The great depression and its aftermath.

SS 210 — Introduction To Sociology..... 3 Credits
Integrated survey of the fundamental concepts of culture, forms of collective behavior, community and social organization, social interaction, and social change. The social effects of aviation and the

impact of science on the social order living in an air-age will also be investigated.

SS 220 — Introduction To Psychology..... 3 Credits
Designed to help the student become aware of the many factors influencing human behavior and social interaction, and to better understand the context of emotional disturbances.

SS 310 — Personality Development..... 3 Credits
A course to better acquaint the individual with the environmental factors that affect personality development, emotional stability, and interpersonal relationship in our society. Through a better understanding of these factors, the individual will have discovered new modes of adjustment, both in his own life, and in his family and occupational setting.

SS 320 — American National Government..... 3 Credits
Basic issues of American Democracy, Constitutional principles and the Executive, Legislative, and Judicial branches of government.

SS 330 — Current History..... 3 Credits
A course in selected Political-Social-Economic issues of national and international importance. Extensive use of journals magazines, and newspaper to supplement lectures and discussions.

SS 340 — American Foreign Policy..... 3 Credits
A survey of the evolution of present American Foreign Policy, stressing the factors which effect and shape this policy. Attention is given to present governmental offices, agencies and departments and the role each plays in policy formulation. Emphasis is on the period since World War II.

SS 299, 399, 499 — Special Topics In The Social Sciences..... 1-6 Credits
Independent study, seminars, travel seminars, and other specially arranged courses not regularly scheduled in the areas of history, sociology, psychology, and human culture in general. Prerequisite: Consent of Instructor and approval of Division Chairman.

ACADEMIC REGULATIONS

ACADEMIC REGULATIONS

Introduction

This section describes the academic regulations and procedures of the University. The achievement of personal and academic goals depends upon the student's awareness of and adherence to these rules.

Trimester Hour Credits

At Embry-Riddle all credits are recorded in terms of trimester hours. A trimester hour consists of one 50-minute classroom lecture per week for 15 weeks, or its equivalent. Three laboratory hours are equivalent to one lecture hour. A trimester hour is equal to a semester hour; however, since ERAU offers three semesters a year, they are called trimesters.

Grading Procedure

A	Superior	4
B	Above Average	3
C	Average	2
D	Below Average	1
F	Failure	0
W	Withdrawal from course	0
WP	Withdrawal from school — passing	0
WF	Withdrawal from school — failing	0
X	Credit by examination	0
T	Accepted by transfer	0
P	Passing (credit)	0
S	Satisfactory (non-credit)	0
AU	Auditing course without credit	0
I	Passing but incomplete work	0
N	No grade submitted by Instructor	0

If a student cannot complete required work in a course and if his reasons are acceptable to his instructor, he may receive an incomplete grade. A grade of "I" must be made up not later than the end of the sixth week (third week for summer terms) from the end of the trimester in which the student received the (I) Incomplete grade. Otherwise, the "I" is automatically changed to an "F" by the Dean of Admissions and Records.

A student may withdraw from a course during the first twelve weeks (six weeks for summer term) of a course and receive a grade of "W". The date of course withdrawal (drop) is the date that the procedure is completed and recorded by the Dean of Admissions and Records.

If a student stops attending class without completing the official withdrawal procedure, he receives the grade "F." If a student withdraws from school after twelve weeks (six weeks for summer term), he is assigned a WP or WF for each course on the basis of his performance in the course up to the time of his official withdrawal.

Grade Point Average

A grade point average (GPA) is computed for each student at the the end of each trimester. The GPA is determined by dividing the total number of grade points earned at Embry-Riddle by the total number of trimester hours attempted.

When a "W," "X," "P," "I," "N," "AU," "WP," "S," or "P" grade is recorded for a course, the hour value does not count as hours attempted.

A course may be repeated once with the grade awarded for the second attempt replacing the first grade. Both attempts

will appear on the student's record, but only the second grade will be computed in the grade point average. Third and subsequent attempts will appear in the student's GPA along with the second attempt.

Attendance

Regular attendance and punctuality are required at all times in all courses. Arrangements for completing missed work may be made with the instructor at his discretion. It is the responsibility of the student to initiate these arrangements.

An examinnation normally is given in each course at the end of the trimester. A student who misses an examination without advance permission of the instructor may be given an "F" in the course. The student may receive an incomplete grade if he can show evidence that his absence absolutely could not be prevented.

Attendance at Other Schools

Students desiring to take academic courses or technical courses at other institutions of higher education (not over 11 credit hours in any one term) while enrolled at ERAU, must obtain prior permission at the office of the Dean of Admissions and Records of Embry-Riddle Aeronautical University. Once a student enrolls in a flight course at ERAU he must accomplish all subsequent flying required by the program in which he is enrolled in residence in order for credit to be granted toward completion of his program. This applies to currently-enrolled students and to students not currently enrolled but maintaining "continuous enrollment."

Flight training at other schools is generally not permitted. Students who attend other schools without proper prior approval will not receive credit for the courses taken.

Developmental Education

This program has been initiated to provide entering students with an opportunity to improve their capabilities in the basic skills required to successfully compete in a University environment.

Since proficiency in reading is necessary for success in both degree and certificate programs, students whose scores indicate a need to develop their reading skills in order to succeed in their program will be required to take a developmental reading course (HU 015 or HU 115). Since these courses use modern equipment, material and techniques which adapt to individual student needs — all students scoring below the 70th percentile are encouraged to take one of these courses.

Degree students are required to take SAT examinations before entering the University. Students who score below 450 on the SAT mathematics examination and/or who have not completed high school Algebra I with a grade of C or better, are required to take MA 105, "Basic Mathematics."

Certificate students (both Maintenance Technology and Flight Technology) are required to take an ERAU mathematics test upon entering the University. Students scoring below 70% on this test are required to take MA 011, "Developmental Math."

Students whose scores in English usage indicate a need for improvement in order to succeed in college level courses are required to take HU 105, "Developmental English."

Before the end of the first term of the junior year, all academic degree students must pass the college English writing proficiency test. (Foreign students may be exempted from this requirement by the Dean of Academic Affairs.) Students who

fail to pass this examination are required to take (and pass) HU 229. Passing this examination or passing the course, is a requirement for graduation for all academic degree students.

Except for HU 115, these courses do not apply toward the credit hour requirement for any degree program except where specifically indicated in the curriculum outline.

Continuing Education Units (CEU)

Embry-Riddle awards Continuing Education Units and accepts CE Units as partial fulfillment of degree requirements in certain areas of concentration. The Southern Association of Colleges and Schools defines the Continuing Education Unit as ten hours of participation in an organized continuing education experience under responsible sponsorship, capable direction and qualified instruction.

At Embry-Riddle, the CEU is used to measure practical, "hands-on," applications oriented learning experience. A request for Continuing Education Unit credit must be accompanied by an appropriate description of the learning experience and an authorized statement of satisfactory completion. The University Curriculum Committee reviews and determines the applicability and relevance of CEU's to appropriate Areas of Concentration.

Admissions

Academic Regulations related to admissions standards and procedures are included in the Admissions section of this Catalog.

Honor Students

Recognition is provided for outstanding academic performance. An Honor Roll and Dean's List are published at the end of each trimester, based on academic performance for the trimester. Honor Roll: GPA 3.20 — 3.49; Dean's List: GPA 3.50 — 4.00.

Honors are also awarded upon graduation based on overall GPA, as follows: "Cum Laude," GPA 3.50 — 3.69; "Magna Cum Laude," GPA 3.70 — 3.89; "Summa Cum Laude," GPA 3.90 — 4.00. To be eligible for graduation honors, a student must complete a minimum of sixty (60) trimester hours in residence. Graduation honors are only awarded for Baccalaureate Degrees.

Classification of Students

Students are classified at the end of each trimester as follows:

1. Academic Student: A student enrolled in a program for which the goal is a degree (BS or AS).

a.	Freshman:	30 hours or less
b.	Sophomore:	31-60 hours
c.	Junior:	61-90 hours
d.	Senior:	91 hours and up

Full time academic status is a trimester credit hour load of 12 or more hours. A GPA of 3.0 is necessary to enroll for more than 18 credit hours per trimester, or 9 credit hours per half Summer trimester. Any exception must be approved by the Dean of the College in which the student is enrolled.

2. Flight and Maintenance Technology Students: Students enrolled in technical programs for which the goal is a Certificate; or an academic student earning a requisite technical Certificate.

   a. A Maintenance Technology student is classified by the number of the full-time trimesters in

which he is enrolled — first, second, etc.

b. A Flight Technology student is classified by the Phase in which he is enrolled.

3. Special: A student not seeking a specified degree or certificate and not enrolled in a program.

   a. Special Student: Receives credit as appropriate.
   b. Auditor: Does not receive credit for courses.
   c. Special Flight Student: Takes Flight Technology courses only.

Academic Students, Special Students, Auditors and Special Flight Students are classified as full-time students if carrying 12 or more credits or non-credit hours; otherwise, they are classified as part-time students. Technology students carrying 30 clockhours are full-time students.

Auditing

A student may audit one or more courses without credit. The fee for auditing is the same as for registering for credit. At no time can a student registered for audit receive credit.

Changes from audit to credit, or credit to audit, may be made only during the published "add" period and are made by a procedure similar to adding and dropping a course.

A student enrolled in a course for audit who fails to maintain satisfactory class attendance as determined by the instructor, is assigned a grade of "W."

Academic Probation and Dismissal

Academic probation is imposed when the cumulative grade point average of the student falls below 2.0.

A student who is on academic probation will not be permitted to serve as an elected member of the S.G.A., serve on the editorial staff of a campus publication, or participate in intercollegiate athletics.

If academic probation is removed by converting a grade of "I" to a grade of "A," "B," "C," or "D," the academic probation will not become a part of the permanent academic record.

After being placed on probation, a student is given two trimesters to raise his grade point average to 2.0. If he fails to do so, he is subject to dismissal.

Any student who has a trimester GPA of less than 1.00 may be academically dismissed at the discretion of the Dean of the College in which the student is enrolled.

Dismissal From The University

When a student makes application for entrance to ERAU he thereby understands and agrees that the University reserves the right to dismiss him at any time if his/her conduct, academic standing, or other performance is regarded by the University as undesirable, without assigning any further reason therefor. Upon enrollment, it is understood and agreed that the University or any of its officers, administrative staff, or faculty shall not be liable in any way for such dismissal.

Withdrawal from the University

A student desiring to withdraw from the University must do so officially by executing a clearance form at the Dean of Students Office.

Change of Program

If a student wishes to change his academic or technical program, he must apply for such change through the office of the University Registrar. A student

desiring to change from a technical to a degree program must comply with all degree admission requirements. Under no circumstances will a retroactive change of program be accepted by the University.

When a student changes programs, he will be required to meet the requirements of the bulletin in effect at the time of the change.

Graduation Requirements

In order to graduate from any academic or certificate program, a student must:

1. Successfully complete all required courses. (The Dean of Admissions and Records must certify satisfactory completion of all courses required by the ERAU catalog in effect when the student entered the program.) When a student has interrupted his studies for more than one trimester and is re-admitted by the Admissions Office, he must meet the requirements of the Catalog in effect for the trimester he is re-admitted. A student may elect to graduate in accordance with a later Catalog.

2. Have completed a minimum of 30 hours of course work for a B.S. degree or 12 hours for an A.S. degree at Embry-Riddle and the last 30 hours or the last 12 hours, respectively, completed in residence. Students enrolled at off-campus locations must be enrolled in ERAU courses during the last two terms prior to graduation.

3. Have obtained a cumulative grade point average of 2.0, or better, for any undergraduate degree (BS or AS). (70% in Flight and Maintenance Technology Programs.)

4. For a B.S. degree have completed a minimum of forty credits in upper division (300 and 400 level) courses. The status of the course is determined by the college initially granting the credit.

5. Have been enrolled in the degree or certificate program in which he is graduating for at least one applicable course in the trimester immediately preceding graduation. (When graduating with more than one degree must have been enrolled in the higher one.)

6. Satisfy all financial obligations.

7. Be recommended by the faculty and Dean of the appropriate college.

Diplomas are awarded to graduates of curricula composed of college credit courses. Graduation certificates are awarded to students completing other programs, such as Maintenance Technology and Flight Technology programs. Application for a diploma or certificate must be initiated by the student and received (after appropriate recommendations, approvals and fee payment have been made) by the Dean of Admissions and Records eight weeks before the end of the trimester when the degree or certificate is to be awarded.

Two degrees of the same rank (e.g., BSAE and BSAET), will be conferred only upon earning an additional 30 credits more than is required for the lesser of the two degrees for two B.S. degrees or 12 credits more for the lesser of two A.S. degrees. For two B.S. degrees, a minimum of 60 credit hours must be earned in residence. The required additional credit hours (30 for B.S., 12 for A.S.) for the second degree must be applicable to the requirements of the second degree and not required or applicable to the first degree. For the second B.S. degree 20 of the 30

additional hours must be in upper division courses.

Graduation ceremonies for eligible students are held in April, August and December of each year. Students completing requirements in mid-term may participate in the ceremony following.

Candidates for graduation may apply for graduation "In Absentia" to the office of the Dean of Students. If approved, the graduate's diploma/certificate will be mailed at a date subsequent to that established for his particular ceremony by the Office of the Dean of Admissions and Records.

Student Responsibility

The student is responsible for informing himself of all rules, regulations and procedures required for continued attendance at the University. These are generally embodied in this catalog, the Student Handbook, Dormitory Regulations, and such other instructions as are published from time to time. Regulations will not be waived nor exceptions granted because a student pleads ignorance of the regulations or claims failure of his advisor to keep him informed.

Student Rights and Privacy

Rights and privacy of students is the subject of Public Law 93-380 which became effective November 19, 1974. The law requires a student to sign individual release forms for each company, school, etc., to whom he wants information released. Additionally it allows students to review their files. Any student desiring more information should contact the Dean of Students Office.

STUDENT SERVICES AND ACTIVITIES

STUDENT SERVICES AND ACTIVITIES

Student Government Association

The Student Government Association of Embry-Riddle Aeronautical University has as its membership all full-time students. The governing body of this Association is the Student Senate. It is composed of representatives elected by the student body.

The purpose of the Student Government Association is to promote the welfare and represent the interests of the student populace in relations with the University and other organizations. It maintains liaison with the administrative staff and cultivates relations with other Universities.

The Student Government Association is responsible for conducting student oriented social functions including dances, barbecues, lectures, trips, movies, and other activities. It makes recommendations for governing vehicular traffic on campus, and is responsible for promulgation and enforcement of such regulations as may be required. It assists the office of the Dean of Students in governing student conduct.

The Embry-Riddle Aeronautical University Student Government Association enjoys a unique position among student organizations throughout the world in the degree of responsibility and authority delegated to and administered by its membership. The SGA has two voting members on the University Board of Trustees.

Appearance and Dress Policy

All faculty, staff, and students:

1. Must wear shoes on the campus.
2. Will not wear undergarments in place of outergarments.
3. May not wear trousers or shorts that are "cut off" or "torn off" on campus (except in dormitory areas).
4. Are to be clean with hair well groomed.
5. Should present an appearace at all times which will reflect favorably upon themselves, their associates, the University, and the aviation community.

Safety in the many aviation activities at Embry-Riddle is of paramount importance; therefore, individual dress should be in accordance with the safety requirements of the task being performed.

Counseling and Guidance Service

The Counseling and Guidance Service is a facility whose primary concern is to assist the students in pursuing a successful college career. The professionally trained Counseling and Guidance Staff offers confidential counseling through individual or group guidance interviews. The students are encouraged to utilize this counseling service and to allow the counselors to assist them with personal, educational, and/or vocational problems. Guidance is provided in areas concerning decision making, choosing a specific college major, and improving study habits. The Counseling and Guidance Staff is prepared to aid students in discovering their own values and goals and help them fully develop their abilities.

Mail Service

Prior to a student's arrival, all personal mail and baggage should be addressed as follows:

Name
c/o Embry-Riddle Aeronautical University
Regional Airport
Post Office Box 2411
Daytona Beach, Florida 32015

All baggage and express packages must be sent prepaid. Baggage is stored at the risk of student and the University accepts no responsibility for theft or missing baggage. Baggage will be stored in a locked room.

During registration each student will be assigned to a mail room box which he is required to check on a daily basis, not only for his personal mail but to enable delivery of official University notices. The correct address will then be:

Name MR#
Embry-Riddle Aeronautical University
Regional Airport
Post Office Box 2411
Daytona Beach, Florida 32015

Library Facilities

The library subscribes to approximately 250 periodicals and contains over 25,000 books. It receives trade journals, house organs and general publications of the major airlines. Photocopying services are available.

An up-to-date reference collection is maintained and kept current for the needs of the Aeronautical Engineering, Aeronautical Science, Aeronautical Studies and related programs, including FAA publications, CAB regulations and NASA documents and reports.

Other services include individual reference service, and instruction in the use of the library. The library is classified according to the Library of Congress system.

On-Campus Housing

Modern, air conditioned dormitory facilities are available for full time unmarried or unaccompanied students. However, since applications may exceed available accommodations, students are urged to make their applications as early as possible. Priority for room reservation is based on the date of receipt of the application and accompanying deposit.

Students wishing dormitory accommodations should contact the Director of Housing and request a Dormitory Rental Agreement. Rental agreements are normally written for a full academic year (two consecutive trimesters), or equivalent period.

Those students who wish to apply for dormitory housing and pay the deposit even though space cannot be guaranteed at the time of arrival, will be provided temporary accommodations at dormitory rates for a period up to fourteen (14) days until such time as dormitory space becomes available or a suitable residence can be found off-campus, whichever occurs soonest. In event dormitory space cannot be provided and the student then moves to an off-campus residence, unused dormitory funds on deposit will be credited to tuition charges.

Costs for meals and incidental expenses range from $30 to $50 weekly, depending on the individual requirements.

Laundry facilities are available. A linen service is mandatory for all dormitory residents. The linen fee of $12 per trimester provides for a weekly issue of two sheets, two bath towels, a washcloth, and pillow case. Students are expected to provide their own bedspread, blankets, and study lamp, if desired.

The University reserves the right of entry into dormitory rooms at any time for purpose of inspection, cleaning, repair, or to enforce regulations.

Off-Campus Housing

There are many furnished apartments and homes for rent in the near-by com-

munities to both married and single students. In addition, several mobile home parks are located within a few miles of the University for the convenience of those students owning or desiring to rent a mobile home. The Housing Office will offer all possible assistance in locating off-campus housing. For such information, please contact the Director of Housing.

Placement Office

The Placement Office is the focal point for all employment activities for currently enrolled students, student wives, and alumni; and embraces the entire job-student relationship from part-time employment through career counseling and graduate placement.

Specific functions of this office include: (1) serving as a liaison between students and industrial, commercial, and government employers; (2) arranging and scheduling interviews with prospective employers; (3) preparation of cover letters and resumes; (4) maintaining files of employment reference material; (5) compiling statistics on placement activities; and (6) maintaining and updating data on graduate employment.

The Placement Office is dedicated to serve, not only students and alumni, but faculty, staff, and employers, through communication of employment climate and opportunities, qualifications sought by employers, and statistical data on numbers of students in each curriculum.

Sports

Embry-Riddle, a member of the National Collegiate Athletic Association and the NAIA, participates in intercollegiate competition in soccer, tennis, basketball, baseball and golf. Students who are on academic probation may not compete in intercollegiate athletics.

Intramural and/or league competition is available in baseball, basketball, bowling, flag football, golf, softball, volleyball, parachuting, flying and fencing.

Health Service

Physical examinations are required for all entering students. The Health Examination Form is provided by the Admissions Office and must be completed and returned to the University Health Service prior to formal admission (an FAA medical will NOT meet this requirement). This Health Examination form provides authority from the parents/sponsors (or the student if legal entity) to the University administration for emergency medical treatment as directed by competent medical authority. It is agreed that no legal action will be brought against the University or its officers when such authorization by the administration is granted.

The University maintains an infirmary staffed by properly qualified medical personnel.

The Halifax District Hospital is three blocks from the campus and referral service is conducted by the medical personnel at the University infirmary.

Organizations

There are eight campus fraternities. University policy requires at least one trimester in residence prior to pledging except for qualified transfer students. Pledges must not be on academic or disciplinary probation.

SIGMA PHI DELTA Professional Engineering Fraternity; founded at the University of Southern California, 1926; Pi Chapter at Embry-Riddle organized in 1960.

ALPHA ETA RHO International Aviation Fraternity; founded at the University

of Southern California, 1929. Epsilon Rho Chapter at Embry-Riddle organized in 1962.

ALPHA RHO OMEGA Professional Aircraft Maintenance Technology Fraternity; founded Embry-Riddle Aeronautical University, 1971.

DELTA CHI International Social Fraternity; founded at Cornell University, 1890; colony at Embry-Riddle established 1971.

LAMBDA CHI ALPHA International Social Fraternity; founded at Boston College, 1909; colony at Embry-Riddle established 1971.

SIGMA CHI International Social Fraternity; founded at Miami of Ohio University, 1855; Eta Iota Chapter at Embry-Riddle installed 1971.

ARNOLD AIR SOCIETY Professional honorary service fraternity of Air Force ROTC cadets; founded at the University of Cincinnati, 1947; Gill Robb Wilson Squadron of Arnold Air Society at Embry-Riddle organized in 1973.

ICARUS HONOR SOCIETY Leadership and scholarship honor fraternity; founded at Embry-Riddle Aeronautical University in 1974.

Student organizations include the Bowling, Sailing, Scuba, Parachute, Rifle and Pistol Clubs, Experimental Aircraft Association, American Institute of Aeronautics and Astronautics, Veteran's Association, International Student Association, Army Aviation Association of America, Soaring and Fencing Clubs.

University Center

The University Center provides a central point of campus activity, including dining and recreational facilities, post office, bookstore, and barbershop. The Center also houses the University Reception Center, Infirmary, Guidance Offices, Placement Office, Student Government Association offices and offices of the student newspaper and yearbook—the AVION and PHOENIX, respectively.

Veteran's Association

The Embry-Riddle Veteran's Association is one of the larger organizations on campus. Its membership consists of veterans and active duty military personnel enrolled at Embry-Riddle. Its main functions are to provide communications between the members and the administration, to assist the veteran to be active within the University and the community. The organization also holds numerous social functions throughout the trimester for the enjoyment of the membership. For more information about the club, contact the Veterans Association Bookstore located in the University Center.

Parents Association

The Parents Association is one of the most active groups in the University community. Its purpose is to facilitate closer personal relationships among students, parents, faculty, and staff. The president of the Parents Association is elected at the annual meeting which is normally held on campus and he or she becomes a voting member of the University Board of Trustees. Parents are always welcome to visit the campus and chat informally with the faculty and staff of the University. When campus visits are not possible, letters or phone calls will receive personal and prompt attention.

Alumni Association

All Embry-Riddle students are invited to join the Embry-Riddle Alumni Association

upon graduation from the University. More than 75,000 Embry-Riddle alumni who have graduated since 1926 take part in the growth and development of their alma mater through local chapters of the Alumni Association located throughout the country and in England. The chapter in England is comprised of former RAF pilots who trained at Embry-Riddle during World War II.

FINANCIAL INFORMATION

FINANCIAL INFORMATION

Payment Procedure

Payment in full of all tuition and fees must be made in cash or combination of cash and student loan (See Student Loan Program) prior to the announced payment date but in no case more than two weeks after the start of classes. New students upon acceptance for admission incur a financial obligation of $100 tuition deposit and $100 dormitory deposit (where applicable). Continuing students may be required to make a $100 dormitory deposit as determined by the Director of Housing.

Subject to the regulations concerning funds, the total of tuition and fees is considered fully earned by the University upon completion of registration by the student.

The University reserves the right to make revisions to the prices, schedules and conditions listed in this Catalog at any time.

Students are not encouraged to maintain a credit balance in their accounts as a depository for personal withdrawals. There are many excellent local banking facilities in which accounts may be opened for the safeguarding of personal funds.

Parents, guardians and agencies providing funds for payment of tuition and fees are advised that overpayments to students' accounts will be refunded directly to the student. Any exception to this procedure must be by notice to the University Bursar containing specific instructions for the return of the over payments.

The Board of Trustees has directed the administration to regard quality education as a criterion and to make adjustments to tuition and fees when necessary to ensure continued academic quality.

Tuition Charges Per Trimester

Aeronautical Science Degree Program — **Amount**
12-19 hours (Includes Scheduled Flight Courses) — $1850

a. Part-time students (less than 12 hours) will receive $70 per credit hour deduction allowance.
b. Excess hours (more than 19) are charged at the rate of $70 per credit hour.
c. The Aeronautical Science program has a flat tuition charge for the trimester. The fact that a student might not register for a flight course, adds or drops a flight course, or does not start instruction in a flight course has no effect on his charges or refund. The charges for this program are considered to be tuition and will be handled in accordance with the published policy.

Maintenance Technology Certificate Program (Non-degree)
a. Full trimester $750
b. Half trimester $375
c. Academic courses per credit hour (optional) $70

All Other Degree Programs — $850.
12-19 hours (e.g., Aeronautical Engineering, Aeronautical Studies, Aviation Management)

a. Part-time students (less than 12 hours) are charged at the rate of $70 per credit hour.
b. Excess hours (more than 19) are charged at the rate of $70 per credit hour.
c. Aircraft Engineering Technology and Aviation Maintenance Management and Aviation Maintenance Technology students may include up to seven credit hours in addition to Maintenance Technology courses at no additional charge.

Other Fees and Charges Per Trimester

Dormitory Charges* — **Rate**
1) Dormitory Charges (Women) — $275

Dormitory Charges (Men)	$265
Linen Fee	$12
Dormitory Charges for Flight Technology (per month)	$75
Flight Technology Student Linen Fee (per month)	$3
** Dormitory Damage Deposit	$20

Insurance

2) Insurance Fees Student	$15
Student/child	$30
Student/spouse	$45
Family	$45

Miscellaneous

Student Service Fee	$25
Student Government Association	$11
3) Miscellaneous Fees Where Applicable	
Laboratory Fees	$ (See page 130)
ROTC Activity Fee	$6
Budget Payment Plan Service Charge	$25

*Includes Pro-rate charges for campus bus transportation and custodial services.

**Initial Deposit Only — Student required to maintain minimum balance of $20 in account — refundable.

Prices, schedules and conditions listed in this Bulletin are subject to change without notice.

One Time Non-Refundable Fees — All Students

Application	$25

Non-Refundable Fees Where Required

Flight Placement Check Ride 1	$25
Flight Course Equivalency Examination 2	$50
Maintenance Technology Orals & Practicals	$50
SAT Bypass Fee	$7
SAT Fee (Includes late registration)	$100
Late Registration Fee	$50
Re-instatement of a cancelled registration	$100
Late Payment Fee	$25

1. Single Engine; Multi-engine at hourly rates prescribed.
2. Minimum charge. Fees according to type examination given.

Aircraft Rates for FAA Flight Examinations (Maximum hours as approved for Veterans.)

Course Description	H.P.	Hrs.	Rate	Charge
Multi-Engine (C-310)	520	2.0	$83.00	$166
Flight Instructor (Airplane)	100-150	2.0	$18.50	$37
Instrument	100-150	2.0	$18.50	$37
Commercial	100-150	2.0	$18.50	$37

FLIGHT TECHNOLOGY CERTIFICATE PROGRAM FEES

	PRIMARY PHASE	
FP 100	Private Pilot Flight	$1123.00
FT 100	Private Ground School	$ 135.00
	INTERMEDIATE PHASE	
FP 200*	Commercial Flight	$3354.15
FT 200	Commercial Ground School	$ 506.25
FP 300**	Transition Flight	$2430.50
FP 301	Instrument Flight	$ 912.50
FT 301	Instrument Ground School	$ 168.75
	ADVANCED PHASE	
FP 310	Multi-Engine Flight	$1015.00
FP 401	Advanced Instrument Flight I	$ 750.00
FP 402	Advanced Instrument Flight II	$ 590.00
FP 403	Advanced Instrument Flight, Multi-Engine	$ 970.75
FP 404	Flight Instructor Flight Laboratory	$ 750.50
FT 404	Fundamentals of Flight Instructing	$ 168.75
FP 406	Instrument Flight Instructor Flight Laboratory	$ 773.00
FT 406	Fundamentals of Instrument Flight Instructing	$ 90.00
FP 410	Multi-Engine Flight Instructor Laboratory	$1028.25
FP 499	Special Topics—Flight	TBA

*Flight Technology students from FP 100 will normally enter FP 200. Students initially entering the Flight Technology Program at this level will be assigned to one of these courses, based upon ERAU flight evaluation results.

**A specified course to prepare FAA

certificated Commercial Rotorcraft/Helicopter pilots for the addition of airplane-single engine land and instrument ratings to existing pilot certificates.

ACADEMIC FLIGHT FEES

Flight costs for students enrolled in degree programs other than Aeronautical Science and who are concurrently enrolled in flight courses are as follows:

FA 101	Primary Flight	$1123.00
FA 112	Basic Flight	$ 851.75
FA 113*	Single Engine Transition 1	$ 313.50
FA 201	Advanced Flight I	$1216.15
FA 202	Advanced Flight II	$ 972.75
FA 301	Instrument Flight	$ 912.00
FA 310	Multi-Engine Flight	$1015.00
FA 401	Advanced Instrument Flight I	$ 750.00
FA 402	Advanced Instrument Flight II	$ 590.00
FA 403	Advanced Instrument Flight, Multi-Engine	$ 970.75
FA 404	Flight Instructor Flight Laboratory	$ 750.50
FA 406	Instrument Flight Instructor Flight Laboratory	$ 773.00
FA 410	Multi-Engine Flight Instructor Laboratory	$1028.25
FA 499	Special Topics in Flight	TBA

*Completion required prior to completion of FA 202.

Flight fees in all degree and certificate programs are based on the number of flight hours specified in each of the Scheduled Flight Courses. Excess flight hours are charged in accordance with the following aircraft rates per hour:

Type	Dual	Solo	Instrument
Primary Aircraft (Up to 150 H.P.)	$26.50	$18.50	$30.00
Transition Aircraft (Retractable Gear)	$32.00	$25.50	$35.50
Twin-Engine Aircraft Cessna-310	$60.00	$53.00	$60.00
Oral Instruction	$11.50		
Flight Simulator Single Engine GAT	$14.00		
Multi-Engine GAT	$37.50		

ACADEMIC LAB FEES

Course	Fee	Course	Fee
AE 331	$5.00	ES 401	$10.00
AE 420	$10.00	ES 299, 399 and 499	*
AE 421	$10.00	ET 400	$20.00
AE 499	*	HU 010	$425.00
AS 201	$10.00	HU 015	$30.00
CT 209	$35.00	HU 115	$10.00
CT 309	$35.00	MA 011	$30.00
CT 310	$35.00	MS 318	$10.00
CT 320	$35.00	MS 319	$10.00
CT 420	$35.00	MS 420	$10.00
CT 499	*	PS 103	$10.00
ES 302	$10.00	PS 105	$20.00
ES 303	$10.00	PS 106	$20.00
ES 307	$15.00	PS 201	$20.00
		PS 202	$20.00
		MS 110	$10.00
		MS 401	$10.00
		MS 421	$10.00

Course Equivalency Exam $45.00
Cooperative Education, per trimester $150
*If Computer Used; Fee To Be Determined.

Penalties

Students failing to make scheduled payments of tuition and fees within prescribed dates are subject to the following conditions:

a) All unpaid balance is immediately due and payable.
b) Failure to make monthly payment: Suspension.
c) Payment of trimester charge after published payment date: $25.00
d) Reinstatement fee — $100

Students failing to meet scheduled flight activities are subject to the following penalty:

a) Unexcused absence from a flight activity: $10.00.

Refunds

In order that proper services may be provided to students, obligations are en-

tered into by the University which continue even if students subsequently withdraw. As a result, full recovery of fees by the student at the time of withdrawal is not possible and an equitable charge must be made to recover the loss of income to the University as a result of withdrawal. Refunds may be made to students in good standing in accordance with the following policy:

a) Advance Tuition and Dormitory Deposits by New Students: 100% refundable if University is notified not less than 60 days prior to the date of registration.
b) Advance Payments By Continuing Students: Students who make advance payments of Tuition and Flight to the University for a following course of instruction and who withdraw prior to the first day of instruction will be refunded in full.
c) Students who terminate a course of instruction and/or a Flight Program within the first twenty-one calendar days commencing either on the first day of class as published, or in the case of flight students on the first day of instruction, are entitled to refund of charges made to their accounts as follows: (for either the first or second session of the summer trimester, the refund period is ten days except for flight courses.)
    1) Academic, Maintenance Technology and Combined Students — Fifty percent of Tuition, unused Flight Lab Fees, and Dormitory Charges for that trimester.
    2) Flight Technology Students: Fifty percent of unused Flight Lab fees of designated Flight Program terminated.
    3) Student Government Association Student Insurance Fees and Student Service Fee are nonrefundable.
d) Withdrawal after the grace period outlined above will generally receive no refund.
e) Provided withdrawal is due to circumstances beyond the student's control, such as extended illness or required Military service, determination will be based on the merits of each individual case. Any requests for refund based on illness of the student must be accompanied by a Doctor's statement, or other appropriate documentation verifying such illness.
f) A student dismissed for reasons of conduct or academic standing in accordance with conditions established under the paragraph heading "Dismissal from the University" outlined in the Catalog, page 117, is not entitled to a refund.
g) Refunds for students enrolled under the certification provisions of the Veterans Administration will be processed in accordance with Embry-Riddle Aeronautical University refund schedules and as applicable under the following conditions:
    1) The above refund policy is in effect for veterans and non-veterans in the academic programs. The above policy on refunds is also in effect for the non-degree programs for non-veterans.
    2) Refunds for veterans in the non-degree programs will be in accordance with paragraph E, section 14255 (page 262-R), of VA regulations. The refund of the unused portion of tuition, fees and other charges for veterans or eligible persons who fail to enter

a course or withdraw or discontinue prior to completion will be made for all amounts paid which exceed the pro rata portion of the total charges that the completed portion of the course bears to the total length of the course, less a penalty of 10% of the amount of the used portion will be determined on the ratio of the number of days or hours of instruction completed by the student to the total number of instructional days or hours in the course. (Fixed fees are not refundable.)

h) Students enrolled in the Maintenance Technology Program are considered to have enrolled for the complete Trimester or portion of Trimester as designated and are obligated for the registration charges assigned. No adjustments in refunds may be allowed for any courses not completed within any Trimester period which is inconsistent with the refund policy as stated herein.

i) Only those requests for refunds which are not already covered by provisions cited above, except provision (e), will be submitted to the Refund Committee. All such requests must be in writing.

j) Before any request for refund will be considered by the Refund Committee, the student must have completed proper documentation in the form of a clearance or change of registration.

k) A request for refund must be submitted within six months from the date the student completes a change in registration form or a clearance form.

Delinquent Accounts

Student tuition and fees are payable according to the schedule shown herein. In the instance of debts incurred subsequent to registration, accounts are due at the date of billing. A payment is considered delinquent when it is overdue by thirty (30) days and all unpaid balance is immediately due and payable. When a student's account is delinquent, all academic and administrative processing of his records will be suspended. Information on class performance and grades will be withheld, and registration for a new trimester, graduation, or release of transcripts will be denied. A student failing to satisfy his financial obligations will be subject to dismissal.

Monthly billings are sent to campus mail boxes; if the bill should go to another source before payment can be made, it is the student's responsibility to forward.

Any student who has participated in the National Direct Student Loan Program and/or an Embry-Riddle Loan Plan is required to arrange a repayment schedule with the Bursar before separation from the University.

Student Budget Plan:

Recognizing that the costs of higher education place formidable demands upon students to meet tuition lump sum payments at registration, the University provides for a budget payment plan to assist in financial planning. Under this program, the anticipated tuition and fees for two trimesters can be budgeted over nine monthly installments. A fee of $25 will be charged for this service. Applications and the estimated amount of the tuition to be budgeted will be provided by the Dean of Admissions and Records. Applications for participation should be returned to the University no later than May 15th of each year for the following September.

FINANCIAL AID

Embry-Riddle Aeronautical University makes every effort, within the limitations of its available financial resources, to assure that no qualified student will be denied the opportunity to attend the University because of a lack of adequate funds.

The State of Florida has approved Embry-Riddle for Veteran Educational Benefits. Veterans and disabled veterans planning to enroll in the University should process the required V.A. forms through the Veterans' Affairs Office several months prior to the first day of class. Veterans who do not possess a Certificate of Eligibility by the time of registration must make the necessary financial arrangements in the Financial Aid Office.

Other financial assistance is available in a variety of forms to help meet academic and financial need criteria for eligibility. Scholarships, loans, grants and part-time employment may be used singly or in combination to meet a student's total financial need. Financial assistance is meant to supplement the resources of the student. The primary responsibility for meeting University expenses resides with the student and his family. A student's parents are expected to contribute toward his expenses, insofar as they are able, from income and assets. The student should feel the obligation to provide for his own education through savings, summer work, other resources and, if necessary, part-time campus employment.

Students from low-income families, as reported by the College Scholarship Service, are given priority in the assignment of awards, although each applicant is considered individually on the basis of the family's income and assets, the number of dependents, the number of children in college, obligations against family income and extraordinary family expenses. The financial need is determined by the resources available to a student in relation to University expenses. The amount of financial aid award reflects the financial situation of the student and his family and represents confidential information which should not be made public by the University or by the recipient.

Students, (except foreign nationals) enrolled in degree-granting curricula are eligible to participate in all of the Federal assistance programs. PLEASE NOTE: It is imperative that students seeking Federal financial aid apply early to the College Scholarship Service (CSS) for analysis and determination of need. This is done on the basis of the Parent's Confidential Statement (PCS) if the student is a dependent for income tax purposes, or the Student Financial Statement (SFS) if he is independent. Appropriate applications are available through local high school counselors or financial aid offices at any college or university. It should also be remembered that it takes the CSS approximately six weeks to process an application; therefore, students should start this process well in advance of the trimester in which they plan to enroll.

Educational Opportunity Grants:

ERAU participates in the federally-supported Educational Opportunity Grant (EOG) Program, in which gift assistance is made available to a limited number of undergraduate students who have exceptional financial need. An EOG stipend can range in value from $100 to $1,000 per year, dependent upon congressional appropriations and the recipient's financial circumstances. In addition, the stipend MUST be matched by at least an equal amount of other financial aid. A grant may be renewed from year to year until the recipient completes his undergraduate

work, provided he meets federal criteria of continued financial need, remains in good standing in the University and has a satisfactory conduct and citizenship record. The amount of an award may be adjusted as the recipient's financial needs change.

National Direct Student Loan:

The N.D.S.L. is a fund allocated by the Department of Health, Education and Welfare to this University for the purpose of allowing eligible students long-term, low-interest loans with no repayment due to begin until nine months after graduation (or termination) from ERAU. At that time, three percent simple interest begins to accrue. At least ten percent of the loan is due each year, with a minimum monthly repayment of $15, which can be payable quarterly. A maximum of 10 years can be used for repayment. The University Bursar is responsible for collecting the money, subject to the law and Government auditors. The maximum amount that a student may borrow during an academic year is $1,000. The undergraduate maximum may not exceed $5,000. These loans are an obligation of the student; however, we require that a parent agree to such financial aid by countersigning a Promissory Note. There are so many deserving students who would like to participate in this program that the fund allocation is usually inadequate. It is, therefore, necessary to make awards to the students with the greatest need.

College Work-Study Program:

The purpose of the College Work-Study Program is to stimulate and promote the part-time employment of students, particularly those from low-income families, who are in need of earnings from such employment in order to pursue courses of study at eligible institutions. Work-Study Programs operate under an institutional agreement with the U.S. Department of Health, Education and Welfare. This may involve part-time work for the institution itself or for a public or private non-profit organization in the community. A student is eligible for part-time employment under the Work-Study Program only during periods in which he meets all of the following conditions:

1) Is a national of the U.S., or is in the United States for other than a temporary purpose and intends to become a permanent citizen of the United States;

2) Must be verified by the CSS as qualifying for financial aid;

3) Is capable, in the opinion of the institution, of maintaining good academic standing in such course of study while employed under this program;

4) Has been accepted for enrollment as a full-time student at the institution or, in the case of a student already enrolled in the institution, is in good standing and in full-time attendance there, either as an undergraduate, graduate or professional student.

Federally Insured Student Loans:

"Eligible lenders" are usually banks, but include credit unions, savings and loan associations, insurance companies, colleges, or agencies acting for a group of lenders. The program is primarily for low or middle income families, but any college student who has been declared "eligible" by the CSS can apply. Interest is 7%, but the Federal Government pays the interest for students when the CSS reports the

student's eligibility. An undergraduate may borrow up to $2,500 for a calendar year. Repayment of principal and interest begins nine months after the student has concluded his course of study.

General Information About Federal Financial Aid:

The amount of financial assistance a student may receive at Embry-Riddle Aeronautical University depends upon his financial need. Need is determined by an analysis of the "Parents' Confidential Statement" or, "Student's Financial Statement" as in the case of a student who has been independent of his parents twelve months prior to his application for financial assistance. They simply act as an outside, disinterested agency designed to provide a uniform method of analyzing a family's ability to pay for college expenses. Contact your high school counselor for an application and further details on the Federal assistance programs.

High school counselors or our Financial Aid Officer will be able to help the student work out package financial plans. These plans are designed to make it possible for qualified young people to obtain a college education. Students should initiate their applications for financial aid as early as possible.

Florida Student Assistance Grants:

Grants are awarded to qualified students who have exceptional financial need, to enable their attendance at accredited colleges, universities and junior colleges in Florida. To be eligible, a student must be a citizen of the United States and a bonafide resident of Florida for two years before the beginning of the academic year for which application is made. The awarding and amount of Student Assistance Grants is based on financial need. The maximum amount of a grant for one academic year is $1,200. No grant will be made for less than $200.

For further information contact:
Financial Aid Office, Embry-Riddle
Aeronautical University
Daytona Beach, Florida 32015

Flight Technology Students:

Qualified veterans may enroll in a flight program with a minimum down payment of 10% of the total cost of an approved program. Monthly payments may be arranged to conform to the student's flight program.

Students wishing to make other financial arrangements for meeting tuition payments should contact the Financial Aid Officer.

SCHOLARSHIPS

The Embry-Riddle Scholarship Award

This award is sponsored by the University and honors outstanding scholars at the University. It is a full tuition award to the senior who meets the requirements of the scholarship committee. In addition there are monetary awards for academic excellence for rising sophomores and juniors in both colleges.

The Zonta Scholarship

In honor of Amelia Earhart, the Daytona Beach Zonta Club and the Jacksonville Zonta Club, organizations of executive business and professional women, sponsor qualified young women to prepare for careers in aviation. Recipients are chosen yearly between June and September by the Scholarship Committee and the extent of financial aid determined will be applied against tuition expenses. Financial assistance will be awarded on a yearly basis. It will continue until comple-

tion of the student's educational objectives at ERAU, provided high standards of academic and moral conduct are maintained, as determined by the University. Scholarships will be awarded without prejudice to race, religion or color.

The Volusia County Scholarship

This is a scholarship provided by the University for Volusia County residents. Applicants who have been students in the Volusia County for two years prior to matriculation at Embry-Riddle Aeronautical University are eligible for consideration. The applicant must apply by March 1 for the September trimester by submitting:

1. Application for admission.
2. Application for scholarship.
3. Statement from applicant outlining goals and career plans.
4. Three letters of recommendation; (a) either the high school principal or the Dean of Students of the Community College; and (b) 2 residents of the applicant's local community.

The value of the scholarship is $500 per trimester for two academic years (4 trimesters) in any degree curriculum.

The John Stack Memorial Scholarship

The award is $1,500 for an academic year (2 trimesters) for a junior in the Aeronautical Engineering Program. The Scholarship Committee will determine the recipient based on academic excellence for previous study at Embry-Riddle Aeronautical University.

The Byron Wesche Memorial Scholarship

The Byron Wesche Memorial Scholarship is established for students in the Aeronautical Science degree program; the value of the award varies with the endowment income.

The Rolf Glad Memorial Scholarship

Students in the Flight Orientation Program of Flight Technology, Aeronautical Studies and Aeronautical Science, who are currently enrolled in a flight course, are eligible for this award. The amount varies according to the endowment income.

The Peter Moyer Memorial Scholarship

This scholarship is available to students who are brothers of Delta Chi Fraternity and in flight related academic programs (Aeronautical Science or Aeronautical Studies-Flight Technology). The amount is $600 per academic year (2 trimesters) beginning January, 1976.

Army and Air Force ROTC Scholarships

Air Force ROTC offers four, three and two-year scholarships to students. Each scholarship pays all tuition, Laboratory Fees and Text Books. Also, each scholarship recipient receives a $100 tax-free allowance each month.

In order to obtain a four-year scholarship, a student must apply to Air Force ROTC Headquarters, Maxwell Air Force Base, Alabama 36112. The high school student should apply late in his junior year or early (before November 15) during his senior year. If he receives a scholarship, he must attend a university that offers a four-year Air Force ROTC Program.

The three year scholarship is open to freshmen (men and women) who are enrolled in the Air Force ROTC Program at Embry-Riddle Aeronautical University.

Sophomores (men and women) enrolled in Air Force ROTC at ERAU are eligible to compete for a two-year scholarship. Students apply for three and two-year scholarships through the AFROTC Program at ERAU.

In December 1971, Congress enacted a bill that made Air Force ROTC scholarships available to junior college transferees who wish to fly. Scholarships are awarded on a competitive basis upon completion of the six week summer camp.

Even if a student does not receive an Air Force ROTC scholarship, he/she can apply to enter the Air Force Professional Officers Course (POC). The POC is the advanced program in ROTC (junior and senior year). All students in the POC, scholarship and non-scholarship, receive a $100 tax-free allowance each month. Apply for POC admission at the AFROTC at Embry-Riddle Aeronautical University.

Business and Professional Women's Club of Ormond Beach

Scholarship for qualified female student in a degree program.

FACULTY AND ADMINISTRATION

FACULTY

L. William Motzel, Ph.D., Dean of Academic Affairs

College of Aeronautical Studies

Daniel D. Sain, Ph.D., Dean

D. J. Ritchie, Dr. Psy., *Chairman*
Aeronautical Engineering Division

J. P. Wheeler, Ph.D. *Chairman*
Humanities & Social Sciences Division

E. E. Johnson, *Chairman*
Computer Technology Division

E. L. Chrisman, *Chairman*
Aviation Management Division

I. Hirmanpour, *Chairman*
Mathematics & Physical Sciences Division

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Kemerait, Donald J.
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Lamar, Burdette
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P	Private Pilot
S	Seaplane
AD	Aircraft Dispatcher
IA	Inspection Authorization
ME	Multi-Engine
SE	Single-Engine
A&P	Airframe and Powerplant Mechanic
AGI	Advanced Ground Instructor
ATP	Airline Transport Pilot
BGI	Basic Ground Instructor
CFI	Certified Flight Instructor
CTO	Control Tower Operator
DME	Designated Mechanics Examiner
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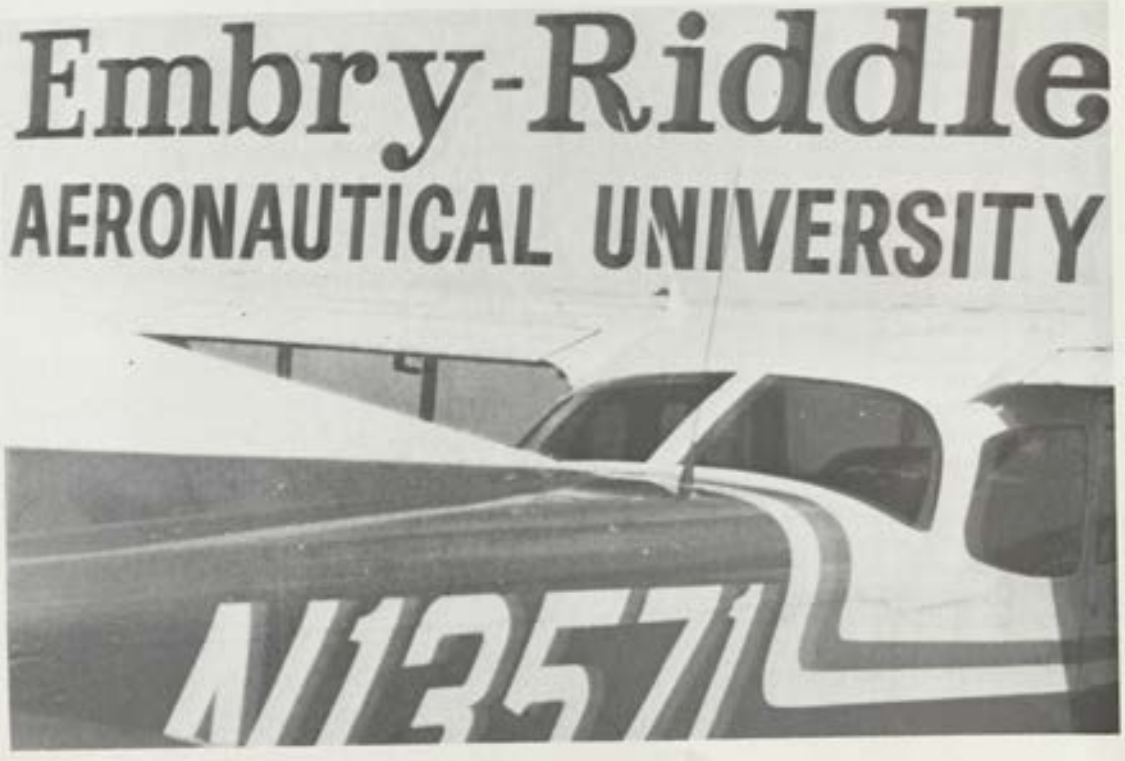
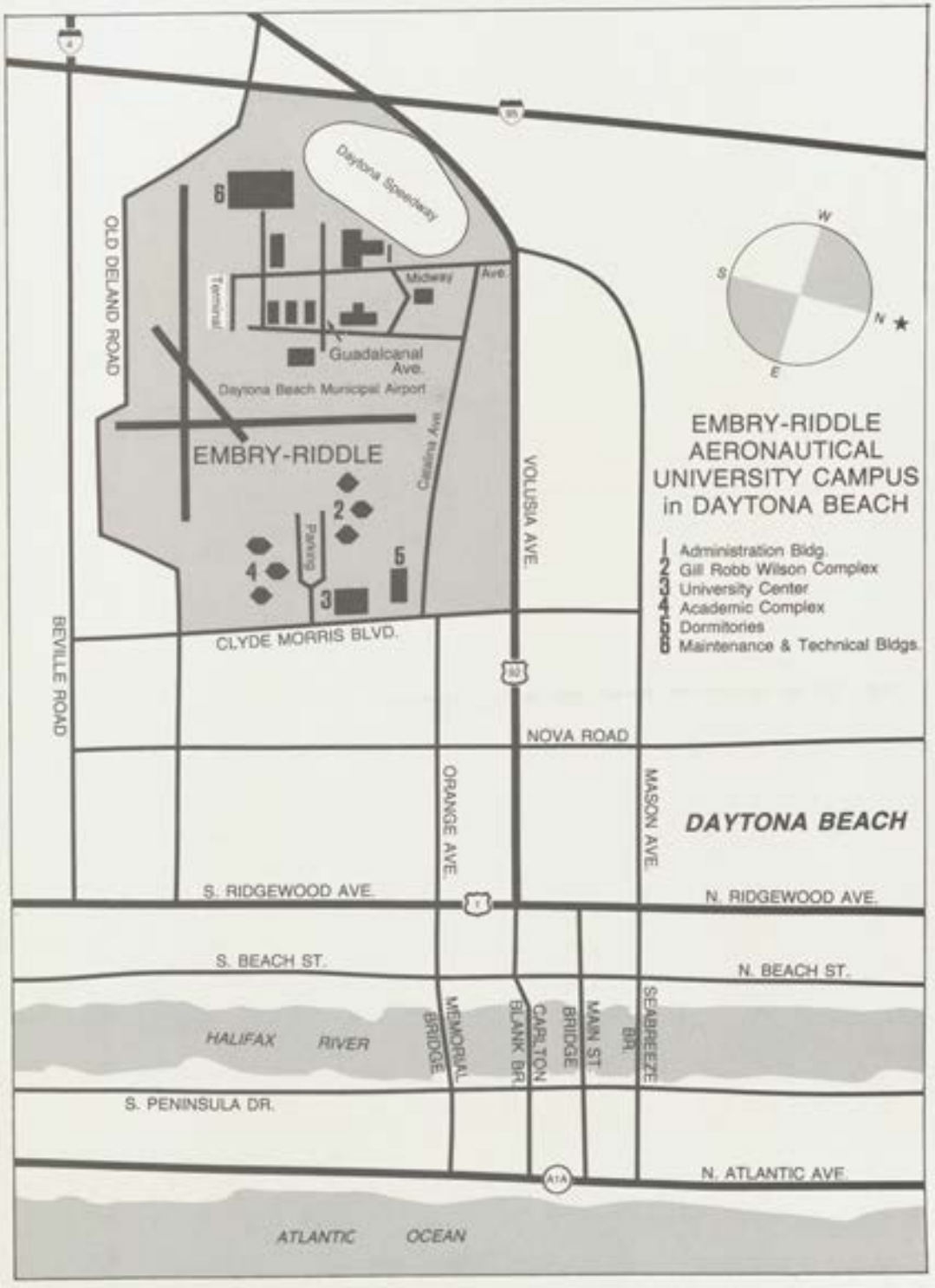
Walter E. Wadsworth..... DeLand, Florida
William A. Welch..... Daytona Beach, Florida
Dr. Russell Welsh..... New Smyrna Beach, Florida
Fred T. Wills..... Daytona Beach, Florida
Edmund Wright..... Ormond Beach, Florida




Daytona Speedway
6
1
Midway
Ave.
Terminal
Guadalcanal
Ave.
Daytona Beach Municipal Airport
OLD DELAND ROAD
EMBRY-RIDDLE
Catalina Ave.
VOLUSIA AVE.
2
4
Parking
5
3
BEVILLE ROAD
CLYDE MORRIS BLVD.
NOVA ROAD
ORANGE AVE.
MASON AVE.
DAYTONA BEACH
S. RIDGEWOOD AVE.
N. RIDGEWOOD AVE.
S. BEACH ST.
N. BEACH ST.
HALIFAX RIVER
MEMORIAL BRIDGE
BLANK BR.
CARLTON BRIDGE
MAIN ST. BR.
SEABREEZE BR.
S. PENINSULA DR.
N. ATLANTIC AVE.
ATLANTIC OCEAN
W
S
N
E
EMBRY-RIDDLE AERONAUTICAL UNIVERSITY CAMPUS in DAYTONA BEACH
1 Administration Bldg.
2 Gill Robb Wilson Complex
3 University Center
4 Academic Complex
5 Dormitories
6 Maintenance & Technical Bldgs.

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University

Daytona Beach
Florida, 32015
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