

The

2013–2014

Air University Catalog



AU-10

The Air University Catalog

Academic Year
2013-2014



October 2013

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AIR UNIVERSITY PRESS

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The Air University Catalog is the official Air University publication for disseminating information on Air University educational programs, including professional military education. This catalog is supplemented by the following publications: *Air Force Institute of Technology (AFIT) Catalog*; *Community College of the Air Force (CCAF) General Catalog*; and *Air Force Career Development Academy (AFEDA) Catalog*.

The Air University Catalog serves as both a source document and a planning document for Air University schools and staff personnel. It serves as a public relations medium for Air Force, Department of Defense, and civilian audiences. The catalog also provides a brief description of the schools and professional organizations that make up the Air University. Finally, it describes the educational opportunities available in each school, the work performed by each related organization in carrying out the educational objectives of the Air University, and all Air University educational support organizations.

The statements in this catalog outline the current rules, regulations, and policies of the Air University and are for informational purposes only. They should not be construed as the basis of a contract between the student and the university. While the provisions of this catalog normally will be applied as stated, the university reserves the right to change any provision listed in this catalog.

The Air University Catalog and other information about Air University organizations are available over the World Wide Web on the Air University home page (<http://www.au.af.mil/au>).

The Air University, Maxwell Air Force Base, Alabama, provides the full spectrum of Air Force education, from precommissioning to the highest levels of professional military education, including degree-granting and professional continuing education for officers, enlisted, and civilian personnel throughout their careers. The Air University is accredited by the Commission of Colleges of the Southern Association of Colleges and Schools.

Disclaimer

This catalog is nondirective and should not be used for quoting Air University, Air Force, or Department of Defense policy. It is intended as a compilation of Air University academic information. Cleared for public release: distribution unlimited.

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INTRODUCTION TO THE AIR UNIVERSITY

Air University Key Staff

| | |
|----------------------------|--|
| Lt Gen David S. Fadok | Commander and President, the Air University |
| Maj Gen Walter D. Givhan | Vice Commander, the Air University; Commander, Curtis E. LeMay Center for Doctrine Development and Education |
| Dr. Anthony C. Cain | Vice President for Academic Affairs, the Air University |
| Mr. Allen G. Peck | Director, Air Force Research Institute |
| Maj Gen Brian T. Bishop | Commander, Carl A. Spaatz Center for Officer Education |
| Brig Gen Robert D. Thomas | Commander, Jeanne M. Holm Center for Officer Accessions and Citizen Development |
| Col Jeffrey J. Smith | Commandant, School of Advanced Air and Space Studies |
| Col Jefferson Dunn | Commander, Thomas N. Barnes Center for Enlisted Education |
| Col Roland K. Van Deventer | Commander, Ira C. Eaker Center for Professional Development |
| Col Lawrence Hoffman | Commandant, USAF Test Pilot School |
| Dr. Todd I. Stewart | Director/Chancellor, Air Force Institute of Technology |
| Col Trent H. Edwards | Commander, 42d Air Base Wing |

Air University Advisory Bodies

Command Board of Advisors

The Air University (AU) Command Board of Advisors provides the commander and president of AU with feedback from the customer perspective of the major commands (MAJCOM). Board members inform the AU commander and president about the educational needs of their respective commands and their degree of satisfaction with AU's products and programs.

The board is advisory in nature and generally meets periodically at Maxwell AFB, AL, or the Department of Defense (DOD) at the Pentagon.

The membership is comprised of the vice-commanders of the MAJCOMs, to include the Air National Guard and AF Reserve Command, and the chief master sergeant of the Air Force. The Air Force deputy chief of staff for manpower and personnel, the superintendent of the US Air Force Academy, and the vice president for academic affairs at Air University are advisors (nonvoting members).

Voting Members: Vice-commanders (or equivalent) of the following major commands and the chief master sergeant of the Air Force (or designee)

| | |
|------------------------------------|----------------------------|
| Air Education and Training Command | Air Force Materiel Command |
| Air Combat Command | Air Mobility Command |
| Air Force Global Strike Command | Air National Guard |
| Air Force Reserve Command | Air Force Space Command |
| Pacific Air Forces | Air Force Special |
| USAF Forces in Europe | Operations Command |

Advisors (nonvoting):

- Deputy chief of staff, Air Force Manpower and Personnel
- Superintendent, Air Force Academy
- Vice president for academic affairs, the Air University

Advisee (nonvoting): Commander and president, the Air University

Air University Board of Visitors 2013

The Board of Visitors is chartered to provide independent advice and recommendations on the educational, doctrinal, and research policies and activities of the Air University. The board meets with and advises the secretary of the Air Force and the AF chief of staff on matters of policy regarding the mission of the Air University. The board meets several times throughout the academic year. The board presents a written report with its views and recommendations to the Air University commander and president. This report is then presented to the chief of staff, US Air Force, and to the secretary of the Air Force. The secretary of defense appoints members who are eminent authorities in the fields of airpower, defense, management, leadership, and academia. Members normally serve annual renewable terms up to a maximum of nine years.

Mr. Norman Augustine, Chair
Former Chairman and CEO, Lockheed Martin Corporation
Bethesda, MD

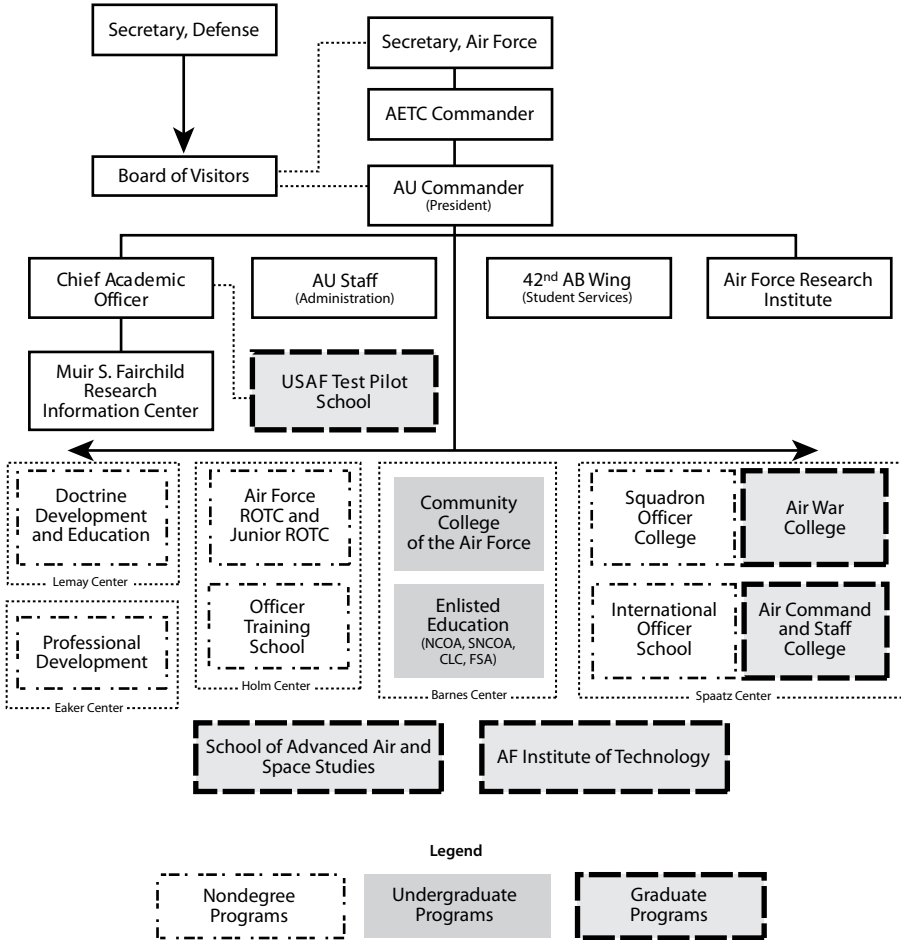
Dr. Muriel Howard, Chair-Elect
President, American Association of State Colleges and Universities
Washington, DC

| | |
|---|--|
| Col Robert Beasley, USAF, Ret Principal Research Engineer, Georgia Institute of Technology Atlanta, GA | Rev. Edward Beauchamp President, University of Portland Portland, OR |
| Mrs. Mary Boies Attorney-at-Law, Boies & McInnis, LLP Armonk, NY | Gen Charles Boyd, USAF, Retired Former President and CEO, Business Executives for National Security Washington, DC |
| Ambassador Gary J. Cooper, Maj Gen, USMC, Retired Chairman, CNB Bankcorp Mobile, AL | Dr. Mary Cummings Associate Professor of Aeronautics and Astronautics, Massachusetts Institute of Technology Cambridge, MA |

AU BOARD OF VISITORS 2013

| | |
|--|--|
| <p>Dr. Ding-Jo Currie Former Chancellor, Coast Community College District Costa Mesa, CA</p> | <p>Mr. Henry Fong Chairman, Fast Funds Financial Corporation West Palm Beach, FL</p> |
| <p>Dr. Stephen Fritz Dean, Honors College, Texas Tech University Lubbock, TX</p> | <p>Dr. Rufus Gasper Chancellor, Maricopa Community College Phoenix, AZ</p> |
| <p>Dr. Benjamin Lambeth Senior Researcher, RAND Corporation Santa Monica, CA</p> | <p>Gen Duncan McNabb, USAF, Retired Consultant</p> |
| <p>Dr. Ann Millner President, Weber State University Ogden, UT</p> | <p>CMSAF Gerald R. Murray, USAF, Retired Senior Manager, F22 Sustainment, Lockheed Martin Corporation Marietta, GA</p> |
| <p>Maj Gen Richard Paul, USAF, Retired Former Vice President, Strategic Development & Analysis, Boeing Company Seattle, WA</p> | <p>Dr. Ricardo Romo President, University of Texas–San Antonio</p> |
| <p>Maj Gen (Dr.) Ronald Segal, USAF, Retired Woodward Professor of Systems Engineering and Vice President for Energy, Environment and Applied Research, Colorado State University Fort Collins, CO</p> | <p>Lt Gen Mark Shackelford, USAF, Retired Consultant</p> |
| <p>Dr. Eugene H. Spafford Professor and CERIAS Executive Director, Purdue University West Lafayette, IN</p> | <p>RADM Jan Tighe, USN President, Naval Post Graduate School Monterey, CA</p> |
| <p>Dr. Rayford Vaughn Vice President for Research, University of Alabama Tuscaloosa, AL</p> | <p>Mr. Fletcher Wiley Attorney Bingham McCutchen, LLP</p> |

AIR UNIVERSITY ACADEMIC UNITS



General Information

Introduction to The Air University

Internet Address

<http://www.au.af.mil/au/>

AU Mission. *We produce the future. We launch leaders of character, educated to think critically, strategically, and jointly to master and deliver superior Airpower in support of national security objectives..*

AU Vision. *One Team. Transformative Education. The Intellectual and Leadership Center of the Air Force.*

The Air University (AU), headquartered at Maxwell AFB, is a major component of Air Education and Training Command (AETC) and is the Air Force's center for professional military education (PME).

AU provides the full spectrum of Air Force education, from precommissioning to all levels of PME, including degree-granting and professional continuing education for officers, enlisted, and civilian personnel throughout their careers. AU's PME programs educate Airmen on the capabilities of air, space, and cyberspace power and their role in national security. These programs focus on the knowledge and abilities needed to develop, employ, command, and support airpower at the highest levels. Specialized professional continuing educational programs provide scientific, technological, managerial, and other professional expertise to meet the needs of the Air Force. Air University conducts research in air and space power, education, leadership, and management. The university also provides citizenship programs and contributes to the development and testing of Air Force doctrine, concepts, and strategy.

History. The Wright brothers established the first US civilian flying school in Montgomery, Alabama, in 1910. By the 1920s, Montgomery became an important link in the growing system of aerial mail service. In the early 1930s, the Army Air Corps Tactical School (ACTS) moved to Maxwell, and Montgomery became the country's intellectual center for airpower education.

Air University, established in 1946, continues the proud tradition of educating tomorrow's planners and leaders in air and space power for the Air

GENERAL INFORMATION

Force, other branches of the US armed forces, federal government civilians, and many international organizations. The Air University's current world-wide reach affects the careers of every Air Force member.

Organizational Structure. The university's primary operating locations are concentrated on four main installations. Most AU programs are located at Maxwell AFB in northwest Montgomery; some are located across town at the Maxwell-Gunter Annex; one is located at Wright-Patterson AFB, Ohio; and another at Edwards AFB, California. Although AU draws students from throughout the Department of Defense (DOD) and from the military forces of other nations, its mission is more easily described in terms of the two main groups it is primarily organized to serve: US Air Force commissioned officers and enlisted members.

Air University institutions include the Carl A. Spaatz Center for Officer Education (the Spaatz Center), Curtis E. LeMay Center for Doctrine Development and Education (the LeMay Center), Jeanne M. Holm Center for Officer Accessions and Citizen Development (the Holm Center), Thomas N. Barnes Center for Enlisted Education (the Barnes Center), Ira C. Eaker Center for Professional Development (the Eaker Center), Air Force Research Institute, and several other support organizations. Support for the AU organizations on Maxwell-Gunter is provided by 42d Air Base Wing, the host organization. Other important parts of AU are the Air Force Institute of Technology (AFIT), located at Wright-Patterson AFB, Ohio, and the United States Air Force Test Pilot School (USAFTPS) at Edwards AFB, California.

Accreditation and Degree-Granting Authority

The Air University is accredited by the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC) to award associate's, master's, and doctoral degrees. Both the Community College of the Air Force (CCAF) and the School of Advanced Air and Space Studies (SAASS) were separately accredited by SACSCOC prior to 2004—CCAF in 1980 and SAASS in 1998. The Air University achieved regional accreditation in June 2004, effective at the beginning of the calendar year. At that time CCAF and SAASS became part of The Air University's regional accreditation. Contact the commission at 1866 Southern Lane, Decatur, Georgia, 30033-4097, or call (404) 679-4501 for questions about the accreditation of the Air University.

Since AU is a federal entity, Congress must grant authority to award degrees. In October 1994 the AU commander received congressional authority to confer the master of airpower art and science degree upon graduates of the School of

Advanced Airpower Studies (SAAS), now SAASS. In October 1999 Congress granted AU the authority to confer the master of strategic studies degree upon graduates of the Air War College (AWC) and to confer the master of military operational art and science degree upon graduates of the Air Command and Staff College (ACSC). An online distance learning version of the ACSC master's degree was approved by SACSCOC on 24 April 2007. On 21 January 2008 Congress granted AU the authority to award the master of science in flight test engineering degree to the graduates of the USAF Test Pilot School (USAFTPS). This approval included students enrolled in the program in April 2007 and those who graduated in USAFTPS classes 06B and 07A. In 2010 Congress granted authority for AU to grant all degrees appropriate to its mission.

The Air Force Institute of Technology (AFIT) is located at Wright-Patterson AFB, OH. AFIT is separately accredited to award master's and doctoral degrees under the Higher Learning Commission of the North Central Association of Colleges and Schools (NCA-HLC), is a member of NCA-HLC, and maintains its own official catalog. The Higher Learning Commission (HLC) is an independent corporation and one of two commission members of the North Central Association of Colleges and Schools (NCACS), which is one of six regional institutional accrediting bodies in the United States. The HLC accredits degree-granting post-secondary educational institutions in the North Central region. The HLC can be contacted at:

The Higher Learning Commission
230 North LaSalle Street, Suite 7-500
Chicago, IL 60604-1411
Phone: 800-621-7400 or 312-263-0456 / FAX 312-263-7462
Website: www.ncahlc.org

In addition to institutional accreditation, the Accreditation Board for Engineering and Technology accredits selected programs within the Graduate School of Engineering and Management. Contact this agency at the Accreditation Board for Engineering and Technology, Inc., 111 Market Place, Suite 1050, Baltimore, MD 21202, phone: (410) 347-7700, fax: (410) 625-2238.

Normal inquiries about the Air University or AFIT, such as admission requirements, financial aid, educational programs, and so forth, should be addressed directly to the institution and not to SACSCOC or NCACS Commission offices. The commissions are to be contacted only if there is evidence that appears to support an institution's significant noncompliance with a requirement or standard.

GENERAL INFORMATION

Policies

| | |
|-------------------|--|
| AUI 14-301 | <i>Security Review of Research Papers, Textbooks, and Related Documents</i> |
| AUI 16-102 | <i>International Programs</i> |
| AUI 25-201 | <i>Federal Prison Camp Labor and Support</i> |
| AUI 31-501 | <i>Use and Control of AU Form 233, SCI Access Badge (PA)</i> |
| AUI 33-101 | <i>Air University Television (AUTV)</i> |
| AUI 33-103 | <i>Air University Public Affairs Multimedia Center</i> |
| AUI 33-301 | <i>Air University Press Publications</i> |
| AFI 34-270 AU Sup | <i>Air Force Library and Information System</i> |
| CL 34-1 | <i>Sponsoring or Co-Sponsoring Conferences, Symposia, and Other Similar Meetings Checklist (IC 2/28/2008)</i> |
| AUI 35-101 | <i>Air Force Officer Accession and Training Schools Public Affairs Program (PA)</i> |
| AUI 36-105 | <i>Responsibilities for Faculty Development and Enrichment</i> |
| AUI 36-2201 | <i>Scheduling and Conducting Wargames</i> |
| AUI 36-2202 | <i>Protocol Requirements in Support of the Air University</i> |
| AUI 36-2203 | <i>Air Force Institute for Advanced Distributed Learning Information Management Tools (IMT) (PA)</i> |
| AUI 36-2213 | <i>Support of Air University (AU) Education Program Personnel Attending Civilian Institutions by Air Force Reserve Officer Training Corps (AFROTC) Detachments</i> |
| AUI 36-2301 | <i>Use of Contract Instructors and Guest Speakers at Air University Schools</i> |
| AUI 36-2303 | <i>Recognition of Outstanding Student Achievement</i> |
| AUI 36-2304 | <i>AU Formal Schools</i> |
| AUI 36-2305 | <i>Policies on Presenting and Recording Air University Guest Lectures</i> |
| AUI 36-2306 | <i>Air University Educational Program Review</i> |
| AUI 36-2307 | <i>Air University Board of Visitors Actions</i> |
| AUI 36-2308 | <i>Academic Freedom</i> |
| AUI 36-2309 | <i>Academic Integrity</i> |
| AUI 36-2310 | <i>Air University Diplomas and Certificates of Course Completion</i> |
| AUI 36-2312 | <i>Air University Evaluation Programs</i> |
| AUI 36-2313 | <i>Air University–Conducted Education Awards Program</i> |
| AUI 36-2314 | <i>Academic Rank</i> |
| AUI 36-2315 | <i>Student Disenrollment Procedures (PA)</i> |
| AUI 36-2317 | <i>Air University Degree Granting, Accreditation, Reaffirmation, and Substantive Change</i> |
| AUI 36-2318 | <i>Air University Registrar Services/Student Records (PA) (IC 2004-1 incorporated)</i> |
| AUI 36-2319 | <i>Single Input Source for Officer Professional Military Education (IC 2005-1 incorporated)</i> |
| AUI 36-2321 | <i>Research and Publication</i> |
| AUI 36-2322 | <i>Air University Institutional Effectiveness and Institutional Research</i> |
| AUI 36-2323 | <i>Air University Master’s Degree Admissions</i> |
| AUI 36-2324 | <i>Air University Distance Learning (DL) Programs</i> |
| AUI 36-2325 | <i>AU Form 119, Acceptance/Declination to National Security Forum (PA)</i> |
| AUI 36-2326 | <i>Air University Course Establishment, Student Production, Scheduling and Lodging Procedures</i> |

GENERAL INFORMATION

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|------------------|--|
| AUI 36-2327 | <i>Grading and Course Numbering for Air University Degree Programs</i> |
| AUI 36-2328 | <i>Air University Honorary Degrees (PA) (IC 6/19/2009)</i> |
| AUI 36-2801 | <i>Air University Quarterly and Annual Awards Program</i> |
| AUI 36-2802 | <i>Information Manager of the Quarter Program</i> |
| AUI 65-101 | <i>Use of Government Travel Card (PA) (IC 9/24/2009)</i> |
| AUI 65-102 | <i>Commuting Area and Corporate Limits of Maxwell-Gunter Air Force Base</i> |
| AUI 84-101 | <i>Art Program</i> |
| AUI 90-201 | <i>Air University Self-Inspection Program</i> |
| AU Policy Letter | <i>Academic Corporate Process</i> |
| AU Policy Letter | <i>Air University Brand</i> |
| AU Policy Letter | <i>Air University Faculty Management</i> |
| AU Policy Letter | <i>Air University Policy on Sexual Assault Prevention and Response</i> |
| AU Policy Letter | <i>Air University Civilian Overtime Policy</i> |
| AU Policy Letter | <i>Air University MOU/MOA Policy Guidance Memorandum</i> |
| AU Policy Letter | <i>Approval Processing for Guest Speakers and Contract Instructors</i> |
| AU Policy Letter | <i>Student Rights and Grievances</i> |
| AU Policy Letter | <i>International Distinguished Visitors (DV)—Guidance on Event Reporting</i> |
| VA 36-1 | <i>Air University Commander on Equal Opportunity and Treatment</i> |
| VA 90-1 | <i>The Fraud, Waste, and Abuse Kit</i> |
| VA 90-301 | <i>Air University Inspector General</i> |

Privacy Act. As a federal military education institution, AU must adhere to established federal and service policies and guidelines on records. The Air University adheres to the guidelines of the Privacy Act of 1974 to protect the confidentiality and integrity of student records. Though not mandated by law, AU also complies with the basic tenets of the Federal Family Educational Rights and Privacy Act (FERPA). However, the Department of Education, Family Policy Compliance Office, views AU as a DOD Section 6 school that is solely funded by the DOD under 10 *United States Code (USC)* Section 2164 and is therefore exempt. The security and confidentiality of student records are central to the academic integrity of AU. The university is committed to protecting, to the maximum extent possible, the right of privacy of all individuals about whom it holds information, records, and files.

Academic Integrity. The Air University is uncompromising in its adherence to a code of ethics, morality, and conduct related to scholarship and academic activity. (See Air University Instruction [AUI] 36-2309, *Academic Integrity*.)

Admission and Enrollment. Though developing personnel to meet the needs of the Air Force is its primary mission, AU also offers its educational programs to members of US sister services including the Reserves, National Guard, and selected civilian employees of the DOD and other government agencies. Air University programs and schools are not open to the general

GENERAL INFORMATION

public except through special programs. An exception is AFIT, where non-DOD US citizens may enroll in academic programs provided they meet admissions standards. As part of the US military assistance programs, officers from other countries may enroll in the courses and attend several AU schools. Selection for the AU schools and educational programs is made according to Air Force and other relevant government standards. (See AUI 36-2317, *Air University Degree Granting, Accreditation, Reaffirmation, and Substantive Change.*)

Grading Policy for Degree Programs. Students in degree-granting programs will receive course grades based on a four-point system with plus and minus grades. Pass or fail grades may be awarded for designated courses according to school policy. Pass grades will count only toward hours attempted/earned and will not affect the grade point average (GPA). Fail grades will count only as hours attempted but will not count as hours earned, nor will they affect the GPA. (See AUI 36-2327, *Grading and Course Numbering for Air University Degree Programs.*)

Transfer Credit. The Air University's master's degree programs do not accept transfer credit.

Assigning Credit. AU graduate schools, including AWC, ACSC, SAASS, AFIT, and the USAF TPS, follow sound practices for determining the amount and level of credit awarded for courses. Credit is usually awarded by assigning one semester hour to each 15 hours of classroom time. ACSC online master's degree credit is awarded at the ratio of one semester hour for each 40 hours of preparation or classroom time.

AU Definition of a Credit Hour. A credit hour is the amount of work represented in intended learning outcomes and verified by evidence of student achievement. It is an institutionally established equivalency that reasonably approximates one hour of classroom or direct faculty instruction, plus a minimum of two hours of out-of-class student work each week, for approximately 15 weeks. The ACSC distance-learning degree credit is awarded at the ratio of one semester hour for each 40 hours of preparation or classroom time. (See AUI 36-2304, *AU Formal Schools*, paragraph 3.)

Degree Program Withdrawal. Withdrawal/disenrollment is the removal of any enrolled AU student from a course or school before completion. Disenrollment may be accompanied by expulsion from academic credit programs. (See AUI 36-2315, *Student Disenrollment Procedures*.)

Academic Credit. The American Council on Education (ACE) recommends credit for completion of some AU programs. Several colleges and universities accept transfer credits from AU. Accepting/awarding transfer credits is at the discretion of each college or university. For more information, visit <http://www.militaryguides.acenet.edu>.

Educational Documents

Fraudulent Documents. Air University Registrar Student Services personnel authenticate transfer credit, degrees, diplomas, certificates, and certifications. They pursue appropriate action when fraud is suspected, including disenrollment and/or legal action. The offending student's AU transcript will be annotated with "student was disenrolled for submitting fraudulent documents."

Information Release. A student must authorize release of information pertaining to his or her educational record to a third party. Students must submit a release letter (with an original signature) to the university registrar. The student must state what information to release and to whom the information may be released. The Federal Family Educational Rights and Privacy Act of 1974, 5 USC 301, 10 USC 8013, and Executive Order 9397 dictate the policy regarding release of student data. These directives specify that an educational record may not be released without the student's written consent specifying records to be released and to whom.

Transcript Request. Individuals must complete the AU Transcript Request form at http://www.au.af.mil/au/cf/auregistrar/cfrr/how_to_submit_au_transcript_request.pdf, sign it, and submit the request through the Air University Help Desk at www.aueducationsupport.com, or mail it to the Air University Registrar, 60 Shumacher Ave, Maxwell AFB, AL 36112-6337. Transcripts will normally be mailed within seven duty days of receipt. AU transcripts will not be faxed or e-mailed.

GENERAL INFORMATION

Complaint Procedures against Accredited Institutions. Persons having a grievance against the Air University regarding noncompliance with the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC) standards of accreditation or policies may do so by following the SACSCOC policy, Complaint Procedures against the Commission or Its Accredited Institutions. This policy can be located on the SACSCOC website at www.sacscoc.org under the Policies and Publications link or by contacting SACSCOC at:

Southern Association of Colleges and Schools Commission on Colleges
1866 Southern Lane
Decatur, GA 30033-4097

Students

Students should rely on the information listed below to monitor their rights. This information applies to all students.

The Air University Policy Regarding Student Rights. When new students are admitted to residence or distance learning programs, AU schools/centers must inform them of the specific rights afforded them by virtue of their student status that contribute to their overall success and satisfaction. Schools/centers must also ensure this AU policy is extended to all faculty and staff. These rights, responsibilities, and processes do not replace or supersede procedures provided for actions under the *Uniform Code of Military Justice (UCMJ)*, disciplinary or administrative actions provided for in other DOD directives, or instructional documents published at the Air Force, Air Education and Training Command, or AU levels.

Rights include but are not limited to the following:

- The right to be free from discrimination on the basis of race, gender, color, religion, and national origin.
- The right to be free from sexual harassment.
- The right to open and free expression of thoughts and concepts in an environment of academic freedom. See AUI 36-2308, *Academic Freedom*.
- The right to ownership of appropriate intellectual property. See AUI 36-2309, *Academic Integrity*.
- The right to submit a written complaint on AU policies, procedures, or actions through the AU chain of command.

- The right to due process. See AFI 90-301, *Inspector General Complaints Resolution*.

Students enrolled in AU programs are ultimately responsible for their success by fulfilling program requirements with due diligence and dedication to excellence. They have the responsibility to:

- Abide by appropriate military, department, and agency rules, regulations, and standards of conduct.
- Abide by AU academic policies and procedures and those of the school or course in which they are enrolled.
- Respect the opinions and rights of other students.
- Adequately prepare for each class.
- Uphold academic integrity.

Students are expected to participate in the success of the educational program to which they are assigned, which includes the right and responsibility to provide feedback about program quality and effectiveness. Schools provide various mechanisms to handle student feedback, complaints, and/or grievances. General guidance includes the following:

- Informal complaints. All AU students are expected to provide constructive feedback about the programs they attend using the mechanisms provided by the servicing school or center. There is no requirement for leadership to provide a written response to informal complaints.
- Formal complaints. AU students have the right to present a program-related grievance or complaint formally, in writing. Matters should be addressed at the lowest authority level possible but may be elevated through the chain of command when attempts at satisfactory resolution fail. For academic matters, this generally means working with course instructors, department chairs, and deans, as applicable. For non-academic matters, this generally means working through supervisory channels before addressing them to higher-level command channels or the Inspector General system. When elevating to a higher-level authority, the student is responsible to notify the current-level authority in writing. The highest decision authority for resolving a formal complaint is the school commander.

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- Appeals. After a final decision is rendered, if a student has a grievance about the school's formal complaint-handling process, he or she may appeal in writing to the center commander. Decisions made at this level are final.

Air University students enrolled in either resident or nonresident programs are afforded certain rights in handling program-related grievances and can seek reconsideration of adverse actions taken by school leadership that impact their student standing or status. Schools/centers will ensure students, faculty, and staff are informed of these rights and this AU policy.

Processes and rights described in this policy do not replace or supersede procedures provided for actions under the *Uniform Code of Military Justice*, disciplinary or administrative actions provided for in other DOD directives, or instructions published at the Air Force, Air Education and Training Command, or Air University levels. This policy addresses complaint-handling provisions that meet federal and accreditation requirements.

AU Policy. Any Air University student has the right to present a program-related grievance or to appeal adverse action taken against him or her to leadership using the channels outlined below. This right to appeal is over and above any rights conferred on students by individual schools/centers. Matters should be addressed at the lowest level possible but may be elevated through the hierarchy when attempts at satisfactory resolution fail.

- a. For academic or nonacademic issues involving students in enlisted PME programs conducted by the Barnes Center, guidance regarding student appeals rights and processes is provided in the USAF EPME Procedural Guidance published under the authority of AFI 26-2301. Student appeals rights and processes for CCAF-affiliated schools outside of AU are under the purview of the specific affiliated school. The Barnes Center will notify AU/CF when appeals processes are changed.
- b. For academic or nonacademic issues involving students in courses conducted by the Spaatz Center, LeMay Center, and Eaker Center, the chain of appeal follows this order:
 - (1) Course instructor (if applicable).
 - (2) Course director (if applicable).
 - (3) School commandant/commander.

GENERAL INFORMATION

- (4) Air University commander and president. This is the highest level of appeal. If the issue is academic related, the AU/CC considers advice and counsel from the AU chief academic officer/vice president for academic affairs. Decisions made at this level are final.
- c. For academic or nonacademic issues involving AFIT students, the chain of appeal follows this order:
- (1) Course instructor.
 - (2) Course director.
 - (3) Appropriate AFIT school dean.
 - (4) AFIT vice commander.
 - (5) AFIT commandant.
 - (6) AU commander and president. This is the highest level of appeal. If the issue is academic related, the AU/CC considers advice and counsel from the AU chief academic officer/vice president for academic affairs. Decisions made at this level are final.
- d. For academic or nonacademic issues involving USAF Test Pilot School students, the chain of appeal follows this order:
- (1) Course instructor.
 - (2) Course director.
 - (3) TPS commandant.
 - (4) Flight Test Center commander. This is the highest level of appeal for TPS students. Decisions made at this level are final.
- e. For academic or nonacademic issues involving AFROTC cadets, the chain of appeal follows this order:
- (1) Detachment commander.
 - (2) AFROTC commander.
 - (3) Holm Center commander. This is the highest level of appeal for AFROTC cadets. Decisions made at this level are final.
- f. For academic or nonacademic issues involving OTS trainees, the chain of appeal follows this order:
- (1) Flight commander.

GENERAL INFORMATION

- (2) OTS commander.
- (3) Holm Center commander.
- (4) AU commander/president. This is the highest level of appeal for OTS trainees. Decisions made at this level are final.

Responsibilities

- a. Student. It is the student's responsibility to initiate grievances and appeals in writing beginning with the lowest level of appeal authority at the school/center. Students have the right to elevate their appeal to subsequently higher levels if a satisfactory outcome is not achieved. When elevating to a higher-level authority, the student is responsible to notify the current-level authority. Unless otherwise noted, the highest level to which a student may appeal is the AU commander and president.
- b. Schools/Centers. Members at each level of appeal are responsible to respond on a timely basis to appeals initiated by students and to document the outcomes of decisions. Documentation should be retained for five years to demonstrate evidence of compliance to external reviewers.

Questions regarding this policy should be directed to HQ AU/CFA, Dr. Anthony Cain, chief of academic affairs, DSN 493-5159, or commercial 334-953-5159.

Air University Admission Requirements

Admission. To be admitted to the AU degree programs, an individual must

- be selected to attend the resident programs or meet eligibility requirements for the online program,
- provide proof of academic credentials, and
- obtain an acceptable result on the Test of English as a Foreign Language (TOEFL), if he or she is an international student. (See TOEFL information below.)

Selection. See AFI 36-2301, *Professional Military Education*, and/or the Education and Training Course Announcement (ETCA) for selection processes and eligibility criteria.

US Military Personnel.

- Air Force active duty, Guard, and Reserve officers selected to attend AU degree programs will have their degree status verified by the AU registrar's office without action on their part.
- Sister-service students must request that an official transcript be mailed from their degree-granting school to the AU registrar. The transcript must be received by the AU registrar no later than 31 August of the academic year in which the student is attending. Mail transcripts to:

Air University Registrar
ATTN: Admissions
60 Shumacher Avenue
Maxwell AFB, AL 36112-6337

The student is responsible for the costs incurred in providing academic documents.

US Civilians. Civilian students must have no less than a bachelor's degree from a regionally accredited college or university. Students must request that an official transcript be mailed from their degree-granting school to the AU registrar. The transcript must be received by the AU registrar no later than 31 August of the academic year in which the student is attending. Mail transcripts to:

AU ADMISSION REQUIREMENTS

Air University Registrar
ATTN: Admissions
60 Shumacher Avenue
Maxwell AFB, AL 36112-6337

The student is responsible for the costs incurred in providing academic documents.

International Students. For admission to any AU degree program, international students must meet two requirements: have a US bachelor's degree or equivalent from a regionally accredited college or university and meet the minimum Air University requirement on the TOEFL. International students who are selected but do not meet the admission requirements for the AU degree programs will be allowed to attend the schools and will, upon graduation, receive a diploma from the school they attend.

- **Official Academic Documents.** International students must possess undergraduate- or graduate-degree qualifications equivalent to those required of US students.
 - o International students who *have not* completed a regionally accredited US bachelor's degree must submit academic records/documents from institutions outside the United States to an independent foreign credentials evaluation service.
 - The credentialing agency must be a member of the National Association of Credentials Evaluation Services (NACES) or the Association of International Credential Evaluators (AICE).
 - Official evaluation results must be received by the AU registrar's office no later than 15 August of the academic year in which the student is attending.

Mail transcripts to:
Air University Registrar
ATTN: Admissions
60 Shumacher Avenue
Maxwell AFB, AL 36112-6337

- o International students who *have* completed a regionally accredited US undergraduate or graduate degree must request that their degree-granting school mail an official transcript to the AU registrar. The

AU ADMISSION REQUIREMENTS

official transcript must be received by the AU registrar's office no later than 31 August of the academic year in which the student is attending.

Mail transcripts to:
Air University Registrar
ATTN: Admissions
60 Shumacher Avenue
Maxwell AFB, AL 36112-6337

- Sister-service students must request that official transcript(s) be mailed from their degree-granting school to the AU registrar. Transcript(s) must be received by the AU registrar no later than 31 August of the academic year in which the student is attending. Mail transcript(s) to:

Air University Registrar
ATTN: Admissions
60 Shumacher Avenue
Maxwell AFB, AL 36112-6337

The student is responsible for the costs incurred in providing academic documents.

- **Portfolio Option.**
 - o International students who do not have a US bachelor's degree or equivalent may submit a portfolio to be considered for admission to any AU degree program. Information regarding the portfolio process can be obtained from the AU registrar's office.
 - o Students must also submit their TOEFL result with the portfolio, if applicable. (See TOEFL information below.)
- **Test of English as a Foreign Language.**
 - o International students from countries where the official language is English are not required to take the TOEFL.
 - o International students who have completed a bachelor's or higher degree in the United States during the past four years are not required to take the TOEFL.
 - o International students from countries where the official language is not English must achieve an acceptable result on the TOEFL to be admitted to the master's degree programs.

AU ADMISSION REQUIREMENTS

- o International students who have taken the TOEFL within the past two years and have met the AU minimum acceptable result or higher are not required to take the TOEFL. Those students must provide an official copy of their TOEFL result to the AU registrar for admission.
- o When taking the TOEFL, an individual must indicate Air University Institution Code 9069 for the official result to be sent to the AU registrar.
- o The student is responsible for the costs of the test and for travel to and from the test center.
- o Students must take the TOEFL test no later than 1 August of the year in which they are attending AU. No TOEFL scores will be accepted from any test taken after 1 August of the same year.
- o The minimum acceptable TOEFL result for admission to all AU degree programs is as follows:
 - 83 for the Internet-based test (iBT) or
 - 560 for the paper-based test (pBT).
- **TOEFL Appeal.** Students who have a TOEFL result between 75 and 82 and have completed a US bachelor's degree or equivalent may submit a TOEFL appeal to the AU registrar no later than 12 September of the year in which the student is attending. The TOEFL appeal must include:
 - o the student's TOEFL result and
 - o academic documents.

THE AIR UNIVERSITY

The Air University (AU) is an institution of higher education that encompasses the following colleges and schools: School of Advanced Air and Space Studies, the Carl A. Spaatz Center for Officer Education, the Curtis E. LeMay Center for Doctrine Development and Education, the Jeanne M. Holm Center for Officer Accessions and Citizen Development, the Thomas N. Barnes Center for Enlisted Education, the Ira C. Eaker Center for Professional Development, the Air Force Institute of Technology, and the US Air Force Test Pilot School.

School of Advanced Air and Space Studies

Internet Address

<http://www.au.af.mil/au/saass/>

Mission. *Produce strategists through advanced education in the art and science of air, space, and cyberspace power to defend the United States and protect its interests.*

AU's School of Advanced Air and Space Studies (SAASS) is the US Air Force graduate school for airpower strategists. A highly qualified and motivated faculty, a small and carefully selected student body, a coherent and challenging curriculum, outstanding educational and research resources, and a well-designed facility combine to produce tomorrow's senior military leaders who are experts in the role of military force in the art of statecraft.

Carl A. Spaatz Center for Officer Education

Internet Address

<http://www.au.af.mil/au/spaatz/>

Mission. *Develop leaders, spur innovation, and nurture partnerships through integrated and synchronized programs of officer education, research, and outreach.*

Named after the first chief of staff of the United States Air Force (USAF), the Spaatz Center develops and teaches the entire USAF continuum of officer professional military education (PME).

It does this through its various organizations, which include the Air War College (AWC), Air Command and Staff College (ACSC), Squadron Officer College (SOC), International Officer School (IOS), Spaatz academic research centers (AR), and Education Support Squadron.

The academic research centers located within the Spaatz Center provide a focused capability that meets the requirements of AU and an external sponsoring agency. Centers create professional military and continuing education curriculums and focused research on a subject of particular educational importance. The centers also enhance the prestige of AU through their research and outreach programs within the larger military and academic communities.

Currently, the following centers support this mission: the Air Force Culture and Language Center (which includes the Air Force Negotiation Center of Excellence), Air Force Counterproliferation Center, Air Force Public Affairs Center of Excellence, and Air Force Center for Strategy and Technology.

The Air Force Culture and Language Center (AFCLC) is an institution designed to enhance cross-cultural and language competencies across the Air Force. The center functions as a primary source of expertise for conceptual tools to communicate, collaborate, build relations, negotiate, and influence across cultural barriers. Within the AFCLC, the Air Force Negotiation Center of Excellence spearheads the development and application of negotiation, collaboration, and problem-solving skills as a core competency throughout the Air Force.

The Air Force Counterproliferation Center develops Air Force and DOD leaders to advance the state of knowledge, policy, and practices within strategic defense issues involving nuclear, biological, and chemical weapons. This is accomplished through research and education on nuclear deterrence and nuclear weapons employment, nonproliferation and arms control treaty regimes, activities to counter weapons of mass destruction (WMD), and homeland defense and civil support. The center promotes Air Force nuclear enterprise and counter-WMD activities through workshops, conferences, and outreach efforts within the national security enterprise. The center also publishes books and occasional papers on unconventional weapon issues.

The Air Force Public Affairs Center of Excellence provides education and training on effective strategic communication and associated tactics, techniques, and procedures. The center is responsible for coordinating the instruction of strategic communication topics across professional military and continuing education courses and training programs. In addition, the center serves as the office of primary responsibility for strategic communication research and analysis. Staff members at the center serve as advisors in the development of strategic communication doctrine.

The Air Force Center for Strategy and Technology focuses on education, research, and publications that integrate technology into national strategy and policy. This center supports faculty and student research; publishes research through books, articles, and occasional papers; and engages in collaborative research with academic institutions around the world. The center is responsible for the development and execution of the annual Blue Horizons Study, directed by the chief of staff of the Air Force (CSAF). This study provides a 20- to 30-year strategic and technological estimate that feeds Air Force planning and programming efforts.

Air War College

Internet Address

<http://www.au.af.mil/au/awc/>

Mission. *Educates officers to serve as strategic national security leaders.*

The Air War College (AWC) is the Air Force's senior PME institution. The school is also accredited by the chairman of the Joint Chiefs of Staff to provide joint PME phase II. The War Department established the AWC in 1946 at Maxwell Field, Alabama, and the college has operated continuously except for a six-month period during the Korean conflict. The first class to graduate from the AWC contained 71 students; 32 of those graduates went on to become general officers. The school's mission for that first class was relatively simple: "to promote sound concepts of the broad aspects of air power in order to assure the most effective development and employment of the air arm." To accomplish the AWC mission today, students demonstrate mastery of dual challenges—academic enhancement and professional development. To meet these challenges, the college develops the knowledge, skills, and attitudes in its students that are significant to the profession of arms, with emphasis on air, space, and cyberspace, and its application in joint, interagency, and multinational war fighting. AWC graduates are rising strategic leaders of character who can think critically and creatively in an uncertain global environment.

Since 1946, more than 14,000 military officers and senior government civilians have graduated from the AWC resident program; of those, nearly 1,400 were officers from US friends, allies, and partners. In addition, since 1949, more than 60,000 students have graduated from the AWC Distance Learning program.

AWC is a relatively lean institution. The college is comprised of a command section, one mission directorate (Academic Affairs), and two support directorates (Student Operations and Mission Support). Within Academic Affairs, a single dean (DE) oversees the development, execution, and assessment of curriculum for both the residence and nonresidence (or distance learning [DL]) programs. The DE is also responsible for all aspects of faculty management, including hiring and professional development. An associate dean of resident programs and an associate dean of distance learning lead the faculty and assist the DE in their respective areas. The curriculum for the residence program is developed and delivered through three departments—the Department of Strategy, the Department of Leadership and Warfighting, and the Department

of International Security Studies. These three departments also work together with members of the DL faculty to develop nonresidence curriculum.

Air Command and Staff College

Internet Address

<http://www.au.af.mil/au/acsc/>

Mission. *Prepare field-grade officers to develop, employ, and command air-power in joint, multinational, and interagency operations.*

Air Command and Staff College (ACSC), the Air Force's intermediate PME institution, prepares field-grade officers of all services (primarily O-4s and O-4 selects), international officers, and US civilians for positions of higher responsibility within the military and other government arenas. Geared toward teaching the skills necessary to conduct air, space, and cyberspace operations in support of a joint campaign, ACSC focuses on shaping and molding tomorrow's leaders and commanders. The college's academic environment stimulates and encourages free expression of ideas and independent, analytical, and creative thinking.

ACSC traces its roots to the Air Corps Tactical School (ACTS), located at Maxwell Field from 1931 to 1942. After World War II, as the independent Air Force was formed, grew, and developed, the requirements and expectations of the school evolved to fulfill the service's educational needs. The vision of pre-World War II leaders has withstood the test of time. Although six decades have passed since the founding of ACTS, the present curriculum still focuses on expanding understanding of air, space, and cyberspace power and on increasing the number of midcareer officers. In 1962 the school became known by its current name, Air Command and Staff College.

ACSC is comprised of a command section, an academic directorate (Academic Affairs), a support directorate (Mission Support), and the 21st Student Squadron.

The academic directorate oversees curriculum integration and assessment for both resident and distance learning programs. Within the resident program, the curriculum is developed and delivered through three teaching departments—Department of Leadership and Strategy, Department of Warfighting, and Department of International Security Studies. Within the distance learning programs, curriculum is developed and delivered through the Curriculum and Operations Departments. The Curriculum Department develops courseware and provides instruction and guidance to students and

online instructors, and the Operations Department receives, converts, and delivers curriculum through a spectrum of multimedia delivery methods.

The 21st Student Squadron's leadership consists of a squadron commander and four operations officers. This staff is responsible for the health, morale, and welfare of some 500 resident students and their families.

Squadron Officer College

Internet Address

<http://www.au.af.mil/au/soc/>

Mission. *Develop company grade officers as leaders of integrity ready to fly, fight, and win in air, space, and cyberspace.*

The Squadron Officer College (SOC) is the Air Force's center for company grade officer (CGO) professional development. The college fulfills this role by educating and mentoring its students during the most crucial period of their development—their early, formative years as current and future airpower leaders.

Squadron Officer School (SOS) provides Air Force primary developmental education, as described in AFI 36-2301, *Developmental Education*, by offering PME specific to the needs of the Air Force's CGOs. SOS provides the first level of joint PME as described in the Chairman, Joint Chiefs of Staff Instruction 1800.01, *Officer Professional Military Education Policy*.

Philosophically, the school can trace its roots to the Air Corps Tactical School (ACTS), which was founded in 1920 at Langley Field, Virginia, and subsequently relocated to Maxwell Field, Alabama, in July 1931. The former ACTS was the cornerstone for all Air Force officer education. In terms of junior-officer education, however, SOS traces its roots more directly to the Air Tactical School (ATS), formerly located at Tyndall Field, Florida. After the creation of AU in 1946, ATS was moved to Maxwell Field—later Maxwell Air Force Base—where it continued to produce graduates until it was terminated in 1950, coincident with a major force-structure change at the beginning of America's involvement in the Korean War.

In that same year, Col Russell V. Ritchey founded SOS as a directorate within ACSC. Designed as a leadership development center for junior officers, the school blended graduate-level instructional techniques with thrilling experiential activities to teach and reinforce leadership, team-building, and critical-thinking skills. In 1959 SOS became a separate AU school reporting directly to the AU commander. In 2000 SOS merged with the Air and Space

Basic Course (ASBC) under the newly formed SOC, consolidating those activities focused on delivering PME to CGOs. In the intervening years, however, the mission of the college expanded significantly to include a variety of tactical and functional lessons far beyond the founder's intent. In 2009 the college initiated a massive overhaul of its curriculum and teaching methodologies in both ASBC and SOS to recapture Colonel Ritchey's original vision of a centralized leadership development center for junior officers.

SOC's mission changed again in 2011 with a decision by the Air Force to eliminate ASBC, extend SOS from five to eight weeks, and pursue a 100 percent resident attendance opportunity for all line-of-the-Air-Force captains. Today's SOS offers cutting-edge leadership instruction and experiential applications that students find both challenging and rewarding.

International Officer School

Internet Address

<http://www.au.af.mil/au/spatz/ios>

Mission. *Prepare international military students and their families for Air University PME programs and partner with international leaders through engagement and outreach.*

The International Officer School (IOS) is the lead-up course to prepare all international officers for attending AWC, ACSC, and SOC. While the USAF recently formally recognized building partnerships as a core function, the importance of assisting partner nations has always been implicitly understood and practiced. Allied officers began attending AU in 1946. In 1954 the USAF instituted the Allied Officer Preparatory Phase Course to aid the adjustment for international officers attending AU programs. In 1985, after numerous name changes, the program became IOS. To this day, IOS operates to enable the educational mission of the schools and the programs it supports.

Since 1954, over 11,000 international military students (IMS) from 143 countries have graduated from IOS preparatory courses. A dedicated unit of only 19 members, IOS provides exceptional support to nearly 250 IMSs and their families annually, during their participation in AU programs. The unit is organized with a dean of students providing administrative support prior to the students' arrival and during their stay. The dean of education and faculty execute the preparatory programs readying the international students for seamless integration with their US academic counterparts. Five preparatory

classes are held annually, concluding prior to the start of the educational programs the international students will join. The courses are seven weeks in duration and predominately focus on refinement of communication skills by familiarizing participants with common terminology and stressing the military context the students require for success in their advanced coursework. IOS also executes the congressionally mandated Field Studies Program (FSP) as implemented by the Foreign Assistance Act of 1961, the Arms Export Control Act, and the Security Assistance Training Program. FSP objectives are formed around 11 principle tenants that ensure international students understand government, military, and citizen responsibilities to protect, preserve, and respect individual rights. Graduates will comprehend foundational facets of American life, US society, institutions, and ideals and how these aspects reflect US commitment to internationally recognized human rights. With the help of IOS, international students are able to hit the ground running when integrated alongside US officers into the academic culture of each school.

Curtis E. LeMay Center for Doctrine Development and Education

Internet Address

<http://www.au.af.mil/au/lemay/>

Mission. *The LeMay Center develops war fighters for the joint and combined team through doctrine, education, and war gaming.*

Merging the Headquarters Air Force Doctrine Center (AFDC) and the College of Aerospace Doctrine, Research, and Education (CADRE) created the Curtis E. LeMay Doctrine Development and Education Center on 2 August 2007. The center continues the traditions of the Air Corps Tactical School (ACTS), where in the 1930s future leaders of the USAF were trained and the basic doctrine and concepts of US airpower for World War II were formulated. Just as ACTS instructors such as Gens Harold L. George, Haywood S. Hansell Jr., Claire L. Chennault, and George C. Kenney shaped doctrine and strategy in World War II, the center's staff is committed to providing the Air Staff and the MAJCOMs with original thought and applications of air and space power in the modern world. Placing the AFDC and CADRE into the LeMay Center unites doctrine development with education, concept develop-

ment, and evaluation. It also gives the Air Force, AETC, and AU a central repository for the development of Air Force doctrine, concepts, and strategy.

The LeMay Center combines doctrine development, education, and war gaming into one integrated organization. The LeMay Center is responsible for the development and production of Air Force basic and operational doctrine, critical leadership input for joint and multinational doctrine development activities, doctrine education for the Air Force, and doctrine application within war games and simulations.

The center is aligned under AU and reports directly to the AU commander for doctrine professional continuing education (PCE) and for PME war gaming. It also serves as the executive agent to the CSAF for doctrine development. This unique mission organization and reporting hierarchy ensures that doctrine is produced with a clear connection to the USAF professional education system and the AF senior leadership. Not only is doctrine education in the classroom assured, but it can be effectively applied through war-gaming support also offered by the LeMay Center. The center provides

- airpower doctrine for the Air Force;
- education for the Air Force in airpower doctrine and its doctrinal application;
- study and analysis of the dynamics of warfare through modeling, simulation, and war gaming; and
- intelligence support to AU and its subordinate units.

The LeMay Center resident curriculum offers eight specialized courses: the Joint Flag Officer Warfighting Course (JFOWC), the Joint Force Air Component Commander (JFACC) Course, the Combined Force Air Component Commander (CFACC) Course, the Senior Joint Information Operations Applications Course (SJIOAC), the Air Force Senior Executive Warfighting Perspectives Seminar (AFSEWPS), the Joint Air Operations Planning Course (JAOPC), the Contingency Wartime Planning Course (CWPC), and the Information Operations Fundamentals Applications Course (IOFAC).

These resident courses

- provide general and flag officer attendees the opportunity to participate in joint combat operation exercises;
- provide education and training to active-duty captains through colonels of all services for air campaign planning in conjunction with assignment to joint, combined, and air component command staffs;

- offer USAF staff planners from staff sergeant through colonel an understanding of the DOD planning relationships from a joint deployment perspective;
- instruct future war planners in the art and science of contingency planning; and
- apply and value the principles of information warfare to enhance war-fighting capabilities.

The LeMay Center has four directorates: Warfighting Education, Doctrine Development, Wargaming, and Intelligence.

Warfighting Education Directorate

Internet Address

<http://www.au.af.mil/au/lemay/>

The Warfighting Education Directorate conducts professional continuing education (PCE) courses to develop the judgment and skills required to employ or support airpower effectively in combat. The courses significantly contribute to the war-fighting capabilities of all US military forces.

At the senior-leader level, the directorate conducts the JFOWC, JFACC Course, CFACC Course, and SJIOAC. These premier, executive-level courses prepare officers at the one- and two-star rank from all four services for combat leadership responsibilities in the joint and combined arenas. The directorate conducts the AFSEWPS to expose key senior civilian leaders to air and space power concepts and USAF and joint doctrinal issues affecting the conduct of warfare in the twenty-first century. The directorate conducts the Cyberspace Operations Executive Course to introduce three- and four-star Air Force officers and their civilian equivalents to cyberspace operations.

Doctrine Development Directorate

Internet Address

<http://www.au.af.mil/au/lemay/>

The Doctrine Development Directorate researches, develops, produces, and disseminates basic and operational-level doctrine for the CSAF. Its mission is to lead the Air Force in basic and operational-level service, joint, and multinational doctrine development; to advocate Air Force doctrinal equities

in joint and multinational publications and fora; and to provide doctrinal advice and solutions to shape Air Force senior leader decisions.

The directorate is comprised of Airmen from various backgrounds and training, bringing a breadth of experience to doctrine development. One-third of the directorate is composed of civilian employees, providing depth of doctrinal knowledge. Directorate personnel are chartered by the CSAF to be the chief's doctrinal voice and are directly responsible to the CSAF on all matters of basic and operational-level doctrine. This directorate supports the commander of the LeMay Center in his or her capacity as the CSAF's executive agent for doctrine. To accomplish these duties, the directorate established two divisions: Service Doctrine Development (SDD) and Joint Doctrine Development.

Service Doctrine Development Division. This division researches, develops, produces, and disseminates Air Force doctrine documents for the service. Service doctrine provides the foundation for what the Air Force takes to the joint doctrine development arena, providing the Air Force's best practices to drive joint doctrine. The SDD is responsible for producing the service's capstone doctrine publications, Air Force Doctrine Document (AFDD) 1, *Air Force Basic Doctrine*, and AFDD 2, *Operations and Organization*. It also develops and produces doctrine in air warfare; space operations; irregular warfare; agile combat support; information operations; air mobility; special operations; command and control; intelligence, surveillance, and reconnaissance (ISR); homeland operations; cyberspace operations; and nuclear operations.

Joint Doctrine Development Division. This division is the Air Force voice in the development of joint doctrine publications for the chairman of the Joint Chiefs of Staff (CJCS) and in the development of multinational doctrine publications for the North Atlantic Treaty Organization (NATO). The director for doctrine development is the Air Force chair at the Joint Doctrine Planning Conference. The division chief is the US head of delegation to the NATO Air Operations Working Group, NATO Air Operations Support Working Group, NATO Joint Identification Panel, NATO Joint Unmanned Aerial Vehicles Panel, and Air and Space Interoperability Council. Personnel research and present the consolidated Air Force position for the production of all joint publications and for the specific production of five joint publications for which the Air Force is the lead agent.

Additional Doctrine Development Directorate Activities. In addition to producing service and joint doctrine as executive agent to the CSAF for doctrine, this directorate provides the subject-matter experts to present briefings to general officers and SES civilians at courses presented by the LeMay Center / Warfighting Education (WE), along with precapstone courses, sister-service war colleges, and other far-reaching courses both within and outside

the Air Force. It teaches doctrine development to foreign partners from around the globe and assists sister-service doctrine developers with their efforts. The course also provides doctrinal advice to commanders throughout the service, from numbered Air Force commanders to commanders of Air Force forces in joint task forces (JTF).

Wargaming Directorate

Internet Address

<http://www.au.af.mil/au/lemay/>

In 1975 the Clements Blue-Ribbon Panel on Excellence in Professional Military Education cited a need for service schools to emphasize war fighting and decision making in combat. In 1976 the Air Force Chief of Staff's Constant Readiness Tasking directed AU to "put more war in the War College." The concept for the Air Force Wargaming Institute (AFWI) evolved from these two initiatives. The facility opened in 1986 at Maxwell AFB, AL. When the Air Force Doctrine Center and the College of Aerospace Doctrine Research and Education (CADRE) merged to become the LeMay Center for Doctrine Development and Education, AFWI's Wargaming Directorate was renamed the LeMay Center Wargaming Institute (WG) to reflect the new mission to develop, educate, and apply Air Force doctrine. WG supports a broad range of war games, electives, and events to meet the needs of the Air Force, DOD, and international sponsors.

Facility and Organization. WG is housed in a special-purpose, 56,000-square-foot facility. It can operate in whole or in part as a secure, classified working area. The building has moveable walls, can be configured to make 28 game rooms, and has two conference rooms—all with audio and video capabilities. WG has three divisions: Operations, Information Technology, and Technology.

The Wargaming Operations Division is responsible for the war-gaming life-cycle process, to include definition, testing/preplay, preparation, execution, and post-war-game analysis.

The Wargaming Information Technology Division is responsible for the IT support of all war-gaming events and other organizational needs.

The Wargaming Technology Division plans, develops, integrates, and maintains web-based, client-server, and stand-alone software on several hardware and software platforms in support of war-gaming events and other organizational needs. This division houses the specialists who acquire,

operate, develop, and maintain the WG suite of models. Together, the suite of war-gaming models is called the Air Force Educational Wargaming Toolset (AFEWT).

AFEWT includes the following tools:

1. Simulated Warfare (SIMWAR) XXI is a joint, theater-campaign-level, combat-simulation model. This tool allows students to simulate the air operations center (AOC) planning process by planning the next day's air tasking order (ATO), while simultaneously flying out the current ATO.
2. Rapid Scenario Generator is a scenario-building tool capable of rapidly building real-terrain and infrastructure-based scenarios for use in the SIMWAR XXI model.
3. Accelerated Combat Timeline (ACT) is an operational-level graphical user interface to the SIMWAR XXI model.
4. WebForces is an automated map display tool that allows viewers to see and move forces. This tool can interface with ACT and SIMWAR XXI and stand alone for manual war games.
5. Air Web Planner (AWP) is a web-based planning tool that allows the players to input the air campaign plans.
6. Wargame Interactive Support System Online is a multipurpose tool that facilitates collaboration, reference libraries, requests for information, adjudication, document posting, channeling communication, and electronic surveys.
7. Web Reports is a web-based reporting tool that provides results to the players on the previous day's adjudication as computed by SIMWAR XXI.
8. Bottom Line simulates the impact of national budget decisions on the state of the nation.

War Games and Simulation Exercises. In a typical year, WG plans, develops, and conducts approximately 17 war games (including three international war games conducted via foreign military sales) and exercises for over 5,625 participants. WG uses computers, simulation models, and seminars to address how military forces deploy, fight, and sustain combat. The institute provides a "laboratory environment" in which current and future commanders and their staffs are given the opportunity to study warfare realistically to identify problems in peacetime before they face them in combat.

WG conducts the following war games:

Joint Planning Exercise. The Joint Planning Exercise (JPEX) is the culminating event of the ACSC Joint Campaign Planning course. The primary focus of JPEX is to demonstrate how joint campaign planning requires the integration of leadership, critical thinking, and doctrine through the application of operational art and design to attain unified action across the range of military operations. This gives the students the functional abilities to serve as planners on a joint staff. During JPEX, students, as members of a joint planning cell, will develop and present mission analysis, commander's estimate, and concept of operations briefings to their seminar directors. The concept of operations will serve as the combatant commander's direction to the air component commander to execute in the Joint Air and Space Exercise (JAEX).

Joint Air and Space Exercise. JAEX is the culminating event of the ACSC Joint Air and Space Operations Course. JAEX is designed to equip students to understand and appreciate the complex and time-critical operational control processes that occur within the combined/joint air operations center (C/JAOC) and between the air component and other functional components during execution of air and space operations. For JAEX, students will role-play as members of a combined/joint force air component commander (C/JFACC) staff. Students will focus on the joint air estimate process, evaluating national and theater objectives and military courses of action (COA) to develop a joint air operations plan (JAOP). Students will also focus on C/JFACC guidance, apportionment, targeting, and development of master air attack plans.

Joint War Game. The Joint War Game (JWAR) is the culminating event for the Department of Joint Warfare Studies' (DEW) course structure. The primary purpose of the JWAR is to integrate the materials throughout the entire joint war-fighting curriculum. This exercise will serve as a culminating event where students will apply their knowledge of the joint force, joint planning, and joint air and space operations. The exercise is designed to emulate the fluid environment that exists within a joint air operations center and will require the students to demonstrate their critical thinking skills as they address a rapidly evolving problem focused on joint air operations supporting the joint force commander's requirements. To facilitate student adaptability to a rapidly evolving situation, an adjudication process will be employed to facilitate performance assessment to provide student feedback. There was no change to this year's scenario, and this war game is played at the unclassified level.

Joint Intermediate Planning Staff Exercise. The Joint Intermediate Planning Staff Exercise (JIPSE) focuses on collaborative planning at the JTF and component command levels, providing students from the colleges involved an opportunity to plan and role-play in selected representative staff groups. The exercise is designed to equip students to understand and appreciate the

complex and time-critical operational processes that occur within the JTF and C/JAOC and between the air component and other functional components during planning of air and space operations. JIPSE demonstrates what air and space power and forces—using joint concepts and doctrine—bring to the fight at the operational level of war. It emphasizes the complexities of warfare through simulated JTF and C/JFACC activities. Student officers apply the basic concepts of campaign planning. This challenging environment requires officers to continually assess the effectiveness of their joint air operations plans and to modify them, if required. Students from ACSC, Army Command and General Staff College (CGSC), College of Naval Command and Staff (CNCS), and the Marine Training and Education Command (TECOM) are invited to participate in this joint exercise annually as part of their joint intermediate-level PME program. Army and Air Force highly qualified experts (HQE) participate in the exercise as JTF commanders. This war game is played at the unclassified level.

Theater Campaign Warfare. Theater Campaign Warfare (TCW) is a capstone war game sponsored by SAASS. Students from SAASS at Maxwell AFB, AL; the School of Advanced Military Studies (SAMS) at Fort Leavenworth, KS; the USN Maritime Advanced Warfighting School (MAWS) at Newport, RI; and the USMC School of Advanced Warfighting (SAW) at Quantico MCB, VA, all participate in the war game. TCW is designed to develop a greater cross-service appreciation of joint, strategic, and operational-level war-fighting issues. The game is a seminar-based educational war game designed to provide students an opportunity for synthesis through the application of service concepts about the nature and employment of military forces in a joint environment. Students evaluate the efficacy of their classroom concepts using the war game as one of the data points in their continuing education and develop a greater cross-service appreciation of joint theater, strategic, and operational issues. The game consists of two separate worlds, each with four independent seminars, playing over five days. Game moves facilitate educational objectives by covering periods varying from a few days to several weeks. TCW is played at the unclassified level.

Air Sea Battle. Air Sea Battle (ASB) is a multi-event war game for the Grand Strategy Concentration (GSC) for AWC (as of December 2010). The primary purpose of the war game is to develop a “fresh look” at the ASB operational concepts. AWC students participate in a three-day war game, in the format of a small group discussion, based on a WESTPAC (Western Pacific) scenario in the South China Sea. All monitoring, controlling, and evaluating of students during the war game is accomplished by AWC faculty. The second

event is in support of the DOD “Net-Assessment” war game, which the GSC students travel to support.

Global Challenge. Global Challenge (GC) is the capstone war game of AWC’s academic year and includes the themes of leadership, doctrine, strategy, political/military affairs, joint/combined warfare, airpower, and technology. GC was previously known as Solo Challenge, but the name was changed in 2010 to acknowledge the worldwide nature of the war game. GC provides AWC students with the opportunity to demonstrate their ability to translate national-level decisions into strategic and operational-level action. During GC participants manage ongoing global crises and a homeland security scenario, while confronted with projected limits on force structure and overseas basing. This war game is conducted at the unclassified level and includes international officers.

Joint Land, Air, and Sea Strategy Exercise. Joint Land, Air, and Sea Strategy Exercise (JLASS-EX) is a computer-assisted, theater-level seminar war game. It is the only joint-sponsored war game conducted by the senior-level PME colleges. Its overall goal is to enhance joint PME through an examination of potential US military responses to regional crises. The primary focus is on joint and combined warfare conducted at the operational and strategic levels. Air War College, US Army War College, US Marine Corps War College, College of Naval Warfare, and Industrial College of the Armed Forces students make up the Blue team, while AWC acts as the Southwest Asia area of responsibility (AOR) Red-team staff. Red teams for Pacific Command (PACOM) and Africa Command (AFRICOM) AORs come from sister-service college faculty members and the LeMay Center contract intelligence support personnel. Participants start with a crisis scenario that involves regional conflicts 10 years into the future. The distributive phase of the game takes place at the player and faculty home stations in December. The teams make inputs via a collaborative website. World situation and specific scenario briefings establish the crisis at hand. The teams also identify national interests and objectives of all concerned nations and establish allied relationships. The teams then create a combined command and subordinate component command staff and develop a theater campaign plan. They establish their campaign strategy, evaluate enemy intent and capability, posture forces, and determine logistical requirements to sustain combat operations. With the completion of the campaign planning phase, participants assemble at the LeMay Center/WG in April and begin the war game. Force-on-force employment of player assets occurs through written move orders. Adjudication is then performed through a combined manual/computer analysis of alliance inputs. The war game continues for up to four additional moves, with game time intervals varying from

days to several weeks or months. Ongoing intelligence and situation updates apprise participants of campaign performance.

Pegasus–Australia. Pegasus–Australia is an unclassified, computer-adjudicated, theater-level war game developed by the WG and used by the Australian Command and Staff College. The simulation models the first days of war between two opposing alliances. The Australian Command and Staff College divides participants into Blue and Red teams that assume the role of the combined command staffs of the two opposing alliances. Approximately 60 participants are divided into Blue and Red syndicates and are pitted against each other. The game covers one day of prewar maneuvering followed by four days of computer-adjudicated warfare. The game begins with the development of theater campaign plans by opposing syndicates. Assuming roles as commanders and their staffs, participants develop strategy, evaluate enemy intent and capability, posture forces, and determine logistical requirements to sustain combat operations. Computer-generated map displays and web-based status reports provide intelligence support. Once the campaign plan is complete, participants move to the execution phase of the war game, making air, land, and sea order inputs on personal computers using AWP and WebForces software. Participants assign aircraft packages to accomplish offensive, defensive, interdiction, reconnaissance, airspace control, and support missions. They accomplish land and sea moves and also have the opportunity to task certain space-based reconnaissance assets. After players finish their moves at the end of the day, the SIMWAR XXI model adjudicates the inputs. Updated electronic map displays and web-based status reports provide battle damage assessment and current intelligence. Armed with the previous move's results, syndicates continue the game cycle by returning to the planning phase, where they either continue or modify their campaign plan and enter a new set of inputs, as they deem appropriate. After the last day of battle, syndicates debrief their campaign plans and provide insights into their successes and failures. Pegasus–Australia is typically conducted in the May–June time frame.

Pegasus–UK. Pegasus–UK (United Kingdom) is a computer-adjudicated, theater-level war game of the SIMWAR XXI series developed by WG for Britain's Joint Services Command and Staff College (JSCSC). The exercise models the first days of a notional war between two fictional alliances. The JSCSC directing staff divides the participants into Blue and Red syndicates (teams) that assume the role of the Combined Forces Command (CFC) staffs of the two opposing alliances. Approximately 100 participants divide into five Blue and five Red syndicates pitted against each other in simultaneous and independent games. The game covers one day of prewar maneuvering followed by four days of computer-adjudicated warfare. The remainder of the week is

similar to the Pegasus–Australia game. Pegasus–UK is typically conducted in the fall.

Pegasus–Netherlands. Pegasus–Netherlands is a computer-adjudicated, theater-level war game of the SIMWAR XXI series developed by WG for the Netherlands Defense College Joint Advanced Staff course. This is a two-week event starting with a review of joint air operations followed by a computer-based simulation. The exercise models the first days of a notional war between two fictional opposing alliances. The Netherlands Defense College directing staff divides the participants into Blue and Red syndicates that assume the role of the CFC staffs of the two opposing alliances. Approximately 16 participants divide into Blue and Red syndicates pitted against each other. The game covers one day of prewar maneuvering followed by three days of computer-adjudicated warfare. The students and staff participate in this war game at LeMay Center/WG in the summer.

JAGWAR/JAGGED SWORD. Judge Advocate General Wargame (JAGWAR) and JAGGED SWORD are computer-assisted capstone war-game events for the Air Force Judge Advocate General’s School (AFJAGS). JAGWAR supports GATEWAY, a three-week professional continuing education course for JAG Corps officers in the grade of major. GATEWAY is the first JAG Corps 21-era course and is designed to prepare students for leadership challenges that field-grade judge advocates face at every level. The war game is designed to reinforce the concepts taught in the course by presenting a scenario highlighting front-burner legal issues and allowing each student to hone leadership, management, and communications skills. JAGGED SWORD supports the AFJAGS entry-level course, Judge Advocate Staff Officer’s Course (JASOC). JASOC is an entry-level, AFSC-awarding course with officers in the grade of lieutenant as the primary participants.

Future Capabilities Game. Futures Capabilities Game (Futures) is one of the CSAF’s two Title X war games. Futures is a long-range strategic planning activity designed to compare alternative futures and force structures to support strategic planning inputs. The game influences (and is influenced by) the Air Force’s other Title X war game, the Unified Engagement series. The insights gleaned from the game impact Air Force strategic planning, concept development, and force structure investment streams. As a long-range planning activity, Futures focuses on evaluating strengths and weaknesses of future concepts based on the Air Force vision and strategic plans and testing alternative force structures to help shape future investment strategies. AF/A8XC, in coordination with AF/A5XS, is responsible for game design and execution, and it is hosted at the AFWI.

Exercise in National Budget Priorities. The Comptroller School executes Exercise in National Budget Priorities (XNBP) several times each year. This is an unclassified, stand-alone, computerized executive planning exercise that addresses national budget priorities as impacted by presidential and cabinet-level decisions. This strategic-level exercise utilizes the Bottom-Line computer model, which analyzes presidential, economic, political, and military budget decisions and their impact on the state of the nation. Each game year provides a state-of-the-nation report, which is a compilation of social and economic indices including voter support, unemployment, gross national product, war risk, and inflation. The XNBP stimulates participants to actively test their understanding of budgetary and economic relationships in a realistic and enjoyable environment. It reinforces the relationships between foreign and domestic policy decisions and shows how allocation of scarce resources to support those decisions affects the state of the nation. The Bottom-Line model resides on one compact disc and can be executed on any portable computer. XNBP is conducted as an independent three-hour game with each seminar acting as a team. The game represents a four-year presidential term, with participants making four moves in the form of constructing four annual budgets.

Intelligence Directorate

Internet Address

<http://www.au.af.mil/au/lemay/>

The Intelligence Directorate (IN) delivers intelligence, surveillance, and reconnaissance (ISR) education throughout the AU continuum. Its goal is to educate AU resident and distance-learning students and develop faculty on the core tenets of ISR operations in the air, space, and cyberspace domains, thereby preparing them to create innovative solutions to operational and strategic issues. IN personnel focus on ISR doctrine, policy, programs, strategy, employment, and vision for current and future ISR operations and issues essential to leaders' understanding of the operational environment. IN develops ISR curriculum guidance for AU schools, centers, and educational organizations. This directorate is the AU ISR curriculum chair responsible for overseeing intelligence and ISR language in key guidance documents and ensuring the appropriate issues are taught at all levels of AU. The IN coordinates the research and publication of materials on key ISR issues facing the Air Force, joint war fighter, and nation. As the AU senior intelligence officer, the IN sup-

ports the AU commander and AU colleges and centers by providing ISR expertise and guidance and by coordinating guest speakers throughout the year. Additionally, he or she maintains regular liaison with the Air Force A2 and other senior members of the national intelligence community. The IN coordinates ISR issues with senior leaders and students assigned to AU. The IN conducts the following educational activities:

- teaches ISR electives at AWC and ACSC, emphasizing the full integration of ISR operations into military operations;
- instructs ISR research seminars at ACSC by allowing students to investigate ISR issues in depth;
- provides lectures on ISR doctrine and operations at the Spaatz Center, the Holm Center, and the LeMay Center;
- provides lectures on ISR doctrine and operations within AU distance learning curricula; and
- leads the AU intelligence mentoring and cross-talk program, consisting of over 100 ISR professionals assigned to AU.

The LeMay Center/Intelligence Security is the AU Special Security Office (SSO). The SSO controls, safeguards, and ensures proper use of sensitive compartmented information (SCI), manages over 1,300 SCI billets, and provides physical security for four temporary secure working areas and three accredited SCI facilities. The SSO also operates AU's SCI communications center, maintaining the Joint Worldwide Intelligence Communications System for users at Maxwell-Gunter AFB, AL.

Jeanne M. Holm Center for Officer Accessions and Citizen Development

Internet Address

<http://www.au.af.mil/au/holmcenter/>

Mission. *Develop Air Force leaders and citizens of character to serve the nation.*

In 1995 the AU Board of Visitors recommended that AU bring together officer accession sources to streamline the organizational structure and reduce

the commander's span of control. Air Force Officer Accession and Training Schools (AFOATS) was activated on 14 February 1997, merging the Officer Training School (OTS) and the Air Force Reserve Officer Training Corps (AFROTC).

The Jeanne M. Holm Center for Officer Accessions and Citizen Development (the Holm Center) succeeded AFOATS and was formally established at Maxwell AFB, AL, in June 2008. The Holm Center is named for the first female Air Force officer to achieve general officer rank. Four distinct organizations make up the Holm Center: AFROTC, OTS, Civil Air Patrol–USAF (CAP–USAF), and the Air Force Junior Reserve Officer Training Corps (AFJROTC).

AFROTC, located at 147 host universities and at more than 1,000 associated colleges and universities, is designed to educate, train, and commission officers for the US Air Force. The AFROTC program is a four-year university-level program at 145 universities and a two-year program at two universities. The AFROTC program presently commissions approximately 2,000 new Air Force officers each year.

OTS, located at Maxwell AFB, is the Air Force's flexible officer commissioning program and is capable of increasing its enrollment rapidly to meet changing Air Force officer-accession requirements. Currently, OTS Basic Officer Training (BOT) produces approximately 600 new Air Force officers per year (500 active duty and 100 Air Force Reserve), the Academy of Military Science (AMS) produces about 500 new Air National Guard (ANG) officers per year, and OTS Commissioned Officer Training (COT) trains about 1,400 newly commissioned medical professional, chaplain, and judge advocate general officers for active duty, Air Force Reserve (AFRES), and ANG assignments. AFROTC and OTS taken together produce over 70 percent of the current Air Force requirement for newly commissioned line officers and train nearly all of the newly commissioned nonline officers.

The Holm Center also directs the Air Force's middle- and high-school citizenship training programs: the AFJROTC and the Civil Air Patrol (CAP) cadet program. The AFJROTC program, located at 868 high schools worldwide, is a citizenship-development program with a current enrollment of about 120,000 cadets. In June 2009 the Holm Center added Headquarters CAP–USAF, which acts as a liaison providing assistance and oversight for the CAP in its role as the Air Force's official auxiliary. The CAP's 61,000 senior and cadet members operate a fleet of 550 aircraft, perform emergency services, and provide cadet program activities and aerospace education support for federal, state, and local customers.

As of fiscal year 2010, the civilian training program Civilian Acculturation and Leadership Training (CALT) became a course of the Holm Center. Two hundred and twenty-five students completed the course in 2012.

The Holm Center furnishes coordinated leadership and policy direction for the Air Force's officer recruiting, training, and commissioning programs at OTS and at AFROTC detachments at host universities. The Holm Center's staff manages, supports, and develops curriculum and support activities to train tomorrow's Air Force officers. The merger of AFROTC and OTS provides

- a single focal point for AETC's officer accessions,
- centralized support and curriculum development—one organization to commission and train over 70 percent of Air Force line officers, 100 percent of new Air Force Reserve and Air National Guard lieutenants, and nearly 100 percent of nonline (medical professionals and chaplains) and legal officers—and
- a method to smooth production flow between AFROTC and OTS.

Thomas N. Barnes Center for Enlisted Education

Internet Address

<http://www.au.af.mil/au/barnes/>

Mission. *Provide the continuum of education necessary to inspire and develop enlisted leaders with the moral framework of integrity, service, and excellence.*

The Thomas N. Barnes Center for Enlisted Education was activated in July 2008. The Barnes Center provides degree and professional-development education opportunities to more than 300,000 enlisted Airmen each year. The center provides oversight and direction for eight enlisted academic program areas. Educational programs organized under the Barnes Center are affiliated through the Community College of the Air Force (CCAF), which is accredited through AU by the Southern Association of Colleges and Schools, Commission on Colleges, to award the associate's degree.

The CCAF provides associate in applied science degrees and other academic credentials that enhance mission readiness, contribute to recruiting, assist in retention, support the career transition of Air Force enlisted members, and facilitate enlisted members in completing their bachelor's degrees.

Enlisted professional military education (EPME) programs are managed through the center's dean of academic affairs. Academic Affairs is responsible for the development and standardization of four resident EPME programs and three distance learning programs encompassing all levels in the continuum of enlisted leadership development. Academic Affairs is also responsible for faculty and staff development for personnel assigned to EPME programs Air Force-wide. More than 50,000 enlisted Airmen complete EPME programs each year.

The Enlisted Professional Military Education Instructor Course (EPMEIC) strives to produce NCOs who can both teach and lead effectively in and out of the classroom. The curriculum is designed to heighten students' appreciation for and understanding of classroom fundamentals, technical skills associated with EPME classrooms, and typical day-to-day performance expected of EPME professionals. EPMEIC teaches methodologies that are very specific to EPME and is considered the "gateway" for an EPME instructor.

The Airman Leadership School (ALS) is the first level of the EPME continuum and prepares senior Airmen to be professional, war-fighting Airmen who can supervise and lead Air Force work teams to support the employment of airpower. Currently, there are 68 ALS programs worldwide. ALS is also available via distance learning (DL).

The Noncommissioned Officer Academy (NCOA) is the second level of enlisted PME and prepares technical sergeants to be professional, war-fighting Airmen who can manage and lead Air Force units in the employment of airpower. Currently, there are 11 NCOAs worldwide with a DL option.

The Air Force Senior Noncommissioned Officer Academy (SNCOA) is the third level of enlisted PME. SNCOA prepares senior noncommissioned officers to lead the enlisted force in the employment of airpower in support of US national security objectives. There is a single resident SNCOA located at the Maxwell-Gunter Annex, with a DL option.

The Chief Master Sergeant Leadership Course (CLC) is the culminating level of enlisted PME. It provides chief master sergeants a strategic perspective in their role as senior enlisted leaders. The CLC is an in-residence-only program graduating some 600 chief master sergeants annually.

In addition to the above EPME programs, the Barnes Center also provides oversight to the Air Force First Sergeant Academy (FSA). The FSA—a professional continuing education program—educates, trains, and prepares select senior noncommissioned officers to serve as advisors to commanders on issues that impact Airmen as they accomplish the Air Force mission.

The Barnes Center is also home to the Air Force Enlisted Heritage Research Institute (EHRI). EHRI is dedicated to preserving the rich and dramatic heritage and tradition of the enlisted corps of the US Air Force dating

back to the US Army Aeronautical Division, Army Air Service, Army Air Corps, and Army Air Forces.

The Air Force Career Development Academy (AFCDA) is the newest member of the Barnes Center. This organization is responsible for the instructional development, management, delivery, and evaluation of Air Force Career Development Courses (CDC), specialized courses, and select PME courses. AFCDA also produces and distributes study materials for the Air Force Weighted Airman Promotion System (WAPS).

Ira C. Eaker Center for Professional Development

Internet Address

<http://www.au.af.mil/au/ecpd>

Mission. *Provide the highest quality, multidisciplined professional continuing education and training that drives the future success of Air Force, DOD, and international students.*

The Air University Center for Professional Development was activated on 1 August 1986. In October 1993 the center was redesignated the Ira C. Eaker Center for Professional Development to honor General Eaker's significant contributions to the advancement of aviation, the Air Force, and the continuing professional development of its members.

The Eaker Center umbrella spans five schools: the Commanders' Professional Development School, USAF Personnel Professional Development School, Defense Financial Management and Comptroller School, USAF Chaplain Corps College, and National Security Space Institute.

Air Force Institute of Technology

Internet Address

<http://www.afit.edu>

Mission. *Advance air, space, and cyberspace power for the nation, its partners, and our armed forces by providing relevant defense-focused technical graduate and continuing education, research, and consultation.*

The Air Force Institute of Technology (AFIT), located at Wright-Patterson Air Force Base, OH, is a key component of AU and Air Education and Training Command. The institute educates more than 6,300 students daily through in-residence, on-site, and distance learning courses offered by its three schools: the Graduate School of Engineering and Management, the School of Systems and Logistics, and the Civil Engineer School. It is also the home of the Air Force Cyberspace Technical Center of Excellence along with the institute's Advanced Navigation Technology Center, the Center for Directed Energy, the Center for Measurement and Signature Intelligence Studies and Research, and the Center for Operational Analysis. Since resident graduate degrees were first granted in 1956, AFIT has awarded more than 17,100 master's and 560 doctoral degrees. In addition, every year more than 28,000 students attend AFIT's professional continuing education in civil engineering, acquisition and logistics, and cyberspace operations career fields.

Accreditation. AFIT is separately accredited by the Higher Learning Commission of the North Central Association of Colleges and Schools (NCACS), is a member of NCACS, and maintains its own official catalog. The NCACS can be contacted at the Higher Learning Commission, North Central Association of Colleges and Schools, 30 North LaSalle Street, Suite 2400, Chicago, IL 60602-2504, phone: (800) 621-7400, fax: (312) 263-7462.

In addition to institutional accreditation, the Accreditation Board for Engineering and Technology accredits selected programs within the Graduate School of Engineering and Management. Contact this agency at Accreditation Board for Engineering and Technology, Inc., 111 Market Place, Suite 1050, Baltimore, MD 21202, phone: (410) 347-7700, fax: (410) 625-2238.

USAF Test Pilot School

Internet Address

<http://www.edwards.af.mil/library/factsheets/factsheet.asp?id=6467>

Mission. *Produce highly adaptive, critical-thinking flight-test professionals to lead and conduct full-spectrum test and evaluation of aerospace weapon systems.*

Established in 1944 at Wright Field, the Test Pilot School (TPS) has always been known for producing high-quality flight testers and engineers. In 1951 the school was moved to Edwards AFB, CA. In 1961 the Aerospace Research Pilot Course was added, and the school was renamed the USAF Aerospace Research Pilot School (ARPS). In 1972 the school reoriented, adding the systems phase terminating the ARPS course, and the school officially became the USAF Test Pilot School. Because of the sophistication of aircraft, as turbojets became more prevalent in the Air Force, the flight test engineering (FTE) program was initiated in 1973, and the flight test navigator (FTN) program was initiated in 1973. This development created three curricula for TPS students: flight test pilot, FTN, and FTE. In 1990 a test management project (TMP) was added to facilitate the understanding of the full flight-test process. In this TMP, TPS students work in groups to create a test package, execute the test, and present the results to the TPS faculty. The school also offers a number of short courses to support various levels of test and evaluation education.

There are 2,492 TPS graduates, including 109+ general officers. Sixty-two of the current 272 NASA astronauts graduated from TPS. There have been 75 civilian and 39 female graduates, including astronaut Eileen Collins, as well as 310 international graduates from 24 countries.

On 21 January 2009 the Southern Association of Colleges and Schools, Commission on Colleges, approved the awarding of a master's degree in flight test engineering to those students enrolled in the program from April 2007 onward.

AIR UNIVERSITY

GRADUATE PROGRAMS

This section includes a description of each graduate degree program offered by Air University.

- Master of Military Strategy
- Doctorate of Philosophy in Military Strategy
- Master of Strategic Studies
- Master of Military Operational Art and Science
- Master of Science in Flight Test Engineering

Master of Military Strategy and Doctorate of Philosophy in Military Strategy

School of Advanced Air and Space Studies

Internet Address

<http://www.au.af.mil/au/saass/>

Master of Military Strategy

Program Description. The School of Advanced Air and Space Studies (SAASS) curriculum is an intensive 50-week program. The primary instructional forum is the graduate colloquium, which facilitates maximum interaction between students and the expert faculty. Class size is limited to 36 AF active-duty officers; three joint-service officers from the Army, Navy, and Marines; two officers from the Air Reserve Component; and several officers from closely allied nations upon invitation from the chief of staff, United States Air Force. Total enrollment will not exceed 45 students. SAASS creates warrior-scholars who have a superior ability to develop, evaluate, and employ airpower as a component of military force in support of state objectives. Upon completion of all requirements and with faculty recommendation, graduates receive a master of philosophy in military strategy. A select few students are allowed to pursue a doctor of philosophy in military strategy.

Learning Outcomes. The SAASS curriculum is designed to accomplish two major objectives.

- Stimulate the student's ability to think critically about the relationship of military force to statecraft resulting from
 - a thorough evaluation of military and airpower theories, and
 - a thorough evaluation of the reality of military experience, resulting in
 - a reasoned synthesis of theory and experience, the articulation of which informs the question of how modern military force and its airpower component can best be applied across the spectrum of conflict.
- Enable the student's ability to argue effectively and responsibly about military strategy using evidence and logic resulting from experience in

introducing and defending propositions in a graduate colloquium environment,

- o composing interpretive arguments in prose that meet accepted publication standards, and
- o reducing complex formal arguments to comprehensible briefings.

Faculty. SAASS faculty members hold a doctorate or equivalent in their fields of academic expertise. The breadth, depth, and diversity of their expertise are enhanced by the fact that the SAASS faculty is divided between terminally credentialed field grade or senior officers and civilian scholars.

Eligibility. SAASS students are chosen by a central selection board at the Air Force Personnel Center (AFPC). To apply for consideration, officers must have completed or be in attendance at an intermediate developmental education (IDE) program in residence.

Admission Requirements. Admission to SAASS is highly competitive. Those wishing to be admitted must formally apply while or after attending an IDE program in residence. The application process includes a requirement to write an essay on a subject selected by the commandant. Applicants must either already have a master's degree from an accredited institution or a bachelor's degree with an overall grade point average (GPA) of 3.25 or higher on a 4.0 scale. The Air Force Institute of Technology (AFIT) verifies academic qualifications for applicants attending non-degree-granting intermediate residence programs. A central selection board convened at AFPC makes the final admission selections among qualified applicants. International students must be native English speakers or score in the 95th percentile of the Test of English as a Foreign Language (TOEFL) within the three years before entering SAASS. Nonnative English speakers must have attended an English-speaking, residence IDE program, preferably Air Command and Staff College. Those attending ACSC must attend the International Officer School prep course. Those entering without having attended ACSC must have attended an English-speaking intermediate program in residence but will forego the prep course due to conflicts with the SAASS course schedule. International students should possess undergraduate- or graduate-degree qualifications equivalent to those required of US students.

Graduation Requirements. To graduate with a master of philosophy in military strategy degree, a student must

- achieve a weighted grade point average for all letter-graded courses of 3.0 or higher,
- achieve a “pass” grade for all courses graded “pass/fail,”
- prepare a thesis based on research in original source materials that meets generally accepted standards of research, analysis, and expression at the master’s degree level, and
- complete an oral comprehensive examination conducted by a faculty board with a grade of “B” or higher.

To graduate with a “certificate” in military strategy, a student must

- achieve a weighted grade point average for all letter-graded courses of 2.5 or higher,
- achieve a “pass” grade in all courses graded “pass/fail,”
- prepare a thesis based on original research that meets generally accepted standards of research, analysis, and expression for Air Force staff work, and
- complete an oral comprehensive examination conducted by a faculty board with a grade of “B-” or higher.

Doctorate of Philosophy in Military Strategy

Program Description. SAASS is the foundation for an Air University doctorate of philosophy in military strategy. Successful completion of the SAASS program at the standards required for the master of philosophy in military strategy degree is necessary, but not sufficient, for the PhD program. Key components of the PhD program occur before, during, and after the year at SAASS, which runs from early July to mid June.

Program-Level Learning Outcomes. Through a series of research papers, oral arguments, comprehensive written and oral exams, and a dissertation, graduates will

- demonstrate the ability to think critically about the relationship of military force to statecraft,

- articulate a thorough understanding of military history, military air-power, and political theories and their modern application to air, space, and cyberspace power,
- articulate a thorough understanding of military history, military air-power, and political theories and their modern application as a strategic instrument of national policy,
- articulate, using a reasoned synthesis of theory and experience, how modern military force and its airpower component can best be applied across the spectrum of conflict, and
- argue effectively and responsibly about military strategy using evidence and logic.

Admission Requirements. In addition to completing the SAASS master of philosophy in military strategy, students must (parenthetical expressions denote when during the year at SAASS these events occur):

1. Provide a letter of application for admission with a dissertation topic (early April).
2. Earn a cumulative GPA of 3.7 or higher (throughout the SAASS year).
3. Have earned 14 semester hours of transferable graduate credit in a field related to strategy or security studies from an accredited institution (before attending SAASS). (SAASS faculty will judge acceptability of transfer credit.)
4. Complete a written qualifying examination in the fields of theory, military practice, and strategic synthesis to an A- standard (early April).
5. Complete an oral comprehensive examination to an A- standard (early June).
6. Complete a thesis that meets standards expressed for the master of philosophy in military strategy and also indicates ability to (a) research a dissertation over the next three to seven years and (b) compose the findings into a publishable manuscript (throughout the SAASS year).
7. Be recommended by the SAASS PhD Selection Committee for admission into the SAASS PhD program (late April).

Post-SAASS PhD Activity. PhD candidates (those who have completed all but the dissertation [ABD]) will form a committee, with the chairman normally being a long-term SAASS faculty member. The chairman will aid in finding additional committee members suitable for the proposed topic. One committee member normally will be from outside of SAASS and Air University. Candidates normally will have seven years from SAASS graduation to write and defend their dissertation. During that time, SAASS will fund research as candidates serve in post-SAASS duty assignments. Active-duty Air Force candidates may be awarded a Stephen R. Lorenz Fellowship, from three to five years after SAASS graduation. The fellowship is one year in duration for the research and composition of a PhD dissertation and holds equivalency for in-residence senior developmental education. The Lorenz fellowship is an aid to, but not a requirement for, completion of the dissertation.

Degree Requirements. To graduate with a doctor of philosophy in military strategy, a student must research, write, and defend a publishable dissertation on a subject related to strategy or military security studies that presents original research, higher-level critical thinking, and interpretation to the fields of strategy and/or military security studies. Normally, the dissertation must be completed within seven years of graduation from the SAASS residence program.

SYLLABUS

(Not listed in order of presentation)

| Course Number and Title | Semester Hours |
|---|----------------|
| SAASS 600 Foundations of Military Theory | 4 |
| SAASS 601 Foundations of Strategy | 3 |
| SAASS 627 Airpower I: The Age of Total War | 4 |
| SAASS 628 Airpower II: The Age of Limited War, Retrenchment, and Revolution in Military Affairs | 4 |
| SAASS 632 Foundations of International Politics | 4 |
| SAASS 643 Strategy and Campaign Planning | 4 |
| SAASS 644 Irregular Warfare | 3 |
| SAASS 660 Technology and Military Innovation | 3 |
| SAASS 665 Space Power | 3 |
| SAASS 667 Information and Cyber Power | 3 |
| SAASS 690 Thesis | 7 |
| SAASS 699 Comprehensive Examination | 4 |
| Total | 46 |

Course Descriptions

SAASS 600 Foundations of Military Theory **4 Semester Hours**

This course analyzes the writings of military theorists who significantly influenced thought about the art and science of war. Through this analysis, students gain a broad background in the development of military thought and develop critical thinking skills as they test theoretical propositions against the criteria of logic and evidence.

SAASS 601 Foundations of Strategy **3 Semester Hours**

This course is an interdisciplinary examination of the theories, methods, and concepts that inform the art and science of strategy and decision making. It draws upon some of the finest writings from a variety of sources to include the study of politics, history, economics, organizational behavior, science, culture, and morality. Students will read widely and be exposed to a number of ways humans think about social phenomena.

SAASS 627 Airpower I: The Age of Total War **4 Semester Hours**

This course examines the historical development of airpower and strategy in the crucible of the two world wars and the early Cold War. It also explores a number of key issues dealing with airpower development and employment during that period. The course is organized around a series of core books, selected for their impact upon airpower's theoretical development, contribution to our understanding of airpower's impact on events, or issues worthy of discussion and examination.

SAASS 628 Airpower II: The Age of Limited War, Retrenchment, and Revolution in Military Affairs **4 Semester Hours**

This course bridges the historical experience of airpower's youth and adolescence (1914–55) and the maturation of the United States Air Force as an independent service. Proxy wars under the nuclear umbrella, decolonization, rapid technological change, and the uncertain international environment following the fall of the Iron Curtain and the outbreak of the “global war on terrorism” all shaped—and were shaped by—the air weapon. The theme of this course is a familiar one: a consideration of the interaction between airpower and strategy, writ large.

SAASS 632 Foundations of International Politics **4 Semester Hours**

This course stems from the conviction that one cannot do strategy without a working knowledge of international politics and the role of force in international life. It orbits around two big theoretical questions: How does the world hang together? And what role does force play in the world? In formulating answers, students read widely from the theoretical canon that governs the contemporary study of international politics. Topics include theories of international politics, coercion, international political economy, and international ethics.

SAASS 643 Strategy and Campaign Planning **4 Semester Hours**

This course serves as the capstone course for the SAASS year. Students evaluate the substance and processes for making strategy in the real world and the difficulty associated with solving ill-structured, complex problems. Students also analyze various strategies throughout history using modern campaign concepts. Furthermore, students explore and evaluate the latest developments in Adaptive Planning and Execution (APEX), the joint operation planning process (JOPP), and operational design. The course includes seminar sessions with Air Force senior mentors to clarify course concepts in the context of current planning and operations and culminates with a multiworld realistic wargame.

SAASS 644 Irregular Warfare **3 Semester Hours**

This course develops all facets of irregular warfare, including terrorism, insurgency, revolution, and civil wars. Particular attention is paid to the role that geography, ideology (including violent extremism), technology, and grievances play in starting and sustaining irregular groups. Lessons within the course also devote significant attention to combating and defeating irregular threats and the challenges and opportunities associated with them.

SAASS 660 Technology and Military Innovation **3 Semester Hours**

This course focuses on the theory and history of technological development and its impact on innovation in military affairs. The course attempts to develop habits of mind and patterns of inquiry that inform successful military innovation. Theories of technological determinism, social construction, and heterogeneous engineering form the basis of inquiry.

SAASS 665 Space Power**3 Semester Hours**

This course examines the development of military space operations, organizations, strategy, and policy. It explores the contentious issues surrounding space in modern warfare and deals explicitly with weaponization and privatization as well as the organization of space forces in the Department of Defense.

SAASS 667 Information and Cyber Power**3 Semester Hours**

This course defines the cyber domain and explores networks, influence operations, and the paramount role of information in modern warfare. The history of computers and network development as well as the implications for terrorism receive treatment.

SAASS 690 Thesis**7 Semester Hours**

The students develop and present to the faculty a research proposal. Once their proposal is approved, the students, with the advice and assistance of a faculty research advisor, prepare a 50- to 100-page thesis based on primary sources. In writing their theses, the students must demonstrate sound scholarship and conform to generally accepted stylistic and methodological canons.

SAASS 699 Comprehensive Examination**4 Semester Hours**

A two-hour oral examination by a board of three faculty members (one of whom is usually from outside the SAASS faculty) is designed to determine if the student has satisfactorily synthesized the entire SAASS curriculum. The interrelationship among courses and the embedded material are often prominent features of the examination.

Master of Strategic Studies

Air War College

Internet Address

<http://www.au.af.mil/au/awc/>

Program Description. The Air War College (AWC) resident program class membership includes officers from each US military service, civilian employees of federal government agencies, and officers from the international community.

All US students will be dually enrolled in the AWC senior-level professional military education (PME) program and the AU master of strategic studies degree program and, therefore, must meet admission requirements for the master of strategic studies degree. The AWC PME program is accredited for joint professional military education (JPME) phase II as defined for senior-level colleges in the Chairman of the Joint Chiefs of Staff Instruction (CJCSI) 1800.01D, *Officer Professional Military Education Policy*. International Fellows who qualify for entry in the AWC program are enrolled in the AWC senior-level PME program and may choose to apply for admission to the master of strategic studies degree program.

Learning Outcomes. The AWC resident program produces graduates who are able to

- lead successfully as senior officers in joint, coalition, and interagency environments, exhibiting the traits essential to the profession of arms and promoting the proper employment of airpower capabilities;
- analyze complex political-military situations in order to influence senior-level decision making by clearly articulating critical thought through written and oral communication;
- develop and shape military strategies which, in concert with other instruments of national power, achieve national security strategy objectives; and
- capitalize, as senior leaders, upon diverse personal and professional relationships forged from the broader AWC educational experience.

Faculty. The Air War College's unique mission requires a distinctive mix of faculty qualifications and credentials. Traditional civilian academics provide the depth and breadth of subject-matter expertise to guarantee the academic rigor of the college's offerings while simultaneously ensuring adherence to validated educational theory and practice. Military officers also contribute depth and breadth of expertise as well as relevant, unparalleled currency in military affairs critical to the college's success.

Duration. The resident program consists of 10 months of graduate-level study. As the senior Air Force PME school, AWC annually educates about 240 resident students from all US military services, federal agencies, and 45 other nations.

Eligibility. Lieutenant colonels, colonels, and the equivalent in sister-service ranks or civil service grades are eligible to attend AWC. The Central Senior Service School Selection Board, Headquarters USAF, selects Air Force active duty officers who have demonstrated an outstanding potential for senior command and staff positions to attend AWC. Additionally, US Air Force Reserve (AFRES) officers, Air National Guard (ANG) officers, officers from other US military services, officers from other nations, and US federal government civilians are selected to attend by their respective personnel systems. Reference AFI 36-2301, *Professional Military Education*, and the ETCA website at <https://etca.randolph.af.mil> for additional information.

Degree Admission Requirements. To be admitted to the master of strategic studies degree program, individuals must (1) present proof of academic capability either by holding a qualifying undergraduate degree from a regionally accredited college/university (US bachelor's degree or its equivalent) or by meeting academic credentials admission requirements through the portfolio admission process and (2) provide an acceptable score on the Test of English as a Foreign Language (TOEFL), unless they are from an English-speaking country.

International Fellows not meeting the admissions requirements for the master's degree program will be allowed to attend AWC and will, upon completion of the resident program, receive the AWC resident diploma but will not be awarded a master's degree. Students may not opt out of the master's degree program after admission. Students in resident diploma status cannot be considered for the degree once diploma status is established.

Graduation Requirements. Students fully admitted to the degree program must complete the AWC resident program consisting of a minimum of 33 semester hours. Students must achieve a grade of "C" or higher on each academic course with an overall GPA of at least 3.00 on a 4.00 scale, achieve a "pass" in the war game, and fully participate in the National Security Forum and Distinguished Lecture Series.

International Fellows receiving the diploma participate in core (6200-6800 series) and elective courses (6000 series), the Global Challenge Wargame, the National Security Forum, and the Commandant's Lecture Series. Students earning the diploma may enroll in the research course. Core courses completed for the diploma are graded on a pass/fail basis; elective courses are taken in an audit status.

SYLLABUS

| Course Number and Title | Semester Hours |
|---|----------------|
| EL 6000 Elective(s) | 2 |
| RE 6100 Research | 5 |
| LD 6200 Joint Strategic Leadership | 3 |
| NS 6300 National Security and Decision Making | 3 |
| FS 6400 Foundations of Strategy | 5 |
| WF 6500 Warfighting | 6 |
| RS 6600 Regional and Cultural Studies | 4 |
| GS 6700 Global Security | 3 |
| WG 6800 Global Challenge Wargame (P/F) | 2 |
| Total | 33 |

Note: All courses must be taken in residence at AWC. Courses taken in the distance learning program may not be used to satisfy course requirements of the resident master's degree or diploma.

Grand Strategy Concentration. The Grand Strategy Concentration (GSC) is an intense course of study for selected students seeking a deeper understanding of the development and implementation of grand strategy than is attained through the regular curriculum. The concentration examines the historical practice of strategic art, the challenges of leadership and innovation at the strategic level, the relationship between the military instrument of power and national political objectives, and the interplay of global and regional security trends. Those selected for this concentration are degree-eligible students and complete all courses required for the master of strategic studies. The GSC is a volunteer concentration of approximately 12 students forming a separate seminar at the beginning of the academic year. Interested officers are encouraged to speak with the GSC director for additional information, but those officers with prior experience at strategic-level assignments who have completed an Advanced Studies Group school and/or who have well-developed writing and critical thinking skills are encouraged to apply. The AWC commandant will approve all selections for GSC enrollment. Course descriptions for the GSC follow the regular concentration course descriptions.

SYLLABUS

| Course Number and Title | Semester Hours |
|---|----------------|
| SA 6050 Theory and Practice of Strategy | 3 |
| RE 6150 Research | 5 |
| LD 6250 Functions of Senior Leadership | 2 |
| NS 6350 National Security Policy | 4 |
| FS 6450 Foundations of Strategy | 5 |
| WF 6550 Campaign Design and Execution | 4 |
| RS 6600 Regional and Cultural Studies | 4 |
| GS 6750 Global Security | 3 |
| WG 6850 Wargames (P/F) | 3 |
| EX 6950 Comprehensive Oral Exam (P/F) | 1 |
| Total | 34 |

Note. All courses must be taken in residence at AWC. Courses taken in the distance learning program may not be used to satisfy course requirements of the resident master's degree or diploma.

AWC Resident Curriculum Course Descriptions

The AWC resident curriculum includes the core curriculum and an elective program. The core curriculum consists of four major areas: leadership and ethics, international security studies, national and military strategy, and joint war fighting. The AWC resident curriculum consists of the following course offerings by the associate dean of resident programs; the Departments of Strategy, Leadership, and Warfighting; and International Security Studies.

RE 6100 Research

5 Semester Hours

The research requirement is designed to allow students to perform in-depth critical analysis on a subject of US national security interest. The research process provides the opportunity to improve student argumentation and expression skills while creating products that address strategic and operational issues and topics vital to the national security community and its senior leadership. For successful completion of the research requirement, students must produce a professional studies paper (PSP) in accordance with college standards. Most research will be conducted as an individual effort, but the AWC may offer selected students the opportunity to complete this requirement via a faculty-led group research project.

LD 6200 Joint Strategic Leadership**3 Semester Hours**

Joint Strategic Leadership is designed to introduce and develop the concepts and skills required of professional leadership through an examination of the attributes of character at a senior level as well as responsible command, leadership, and management practices. Successful leadership at the strategic level in today's environment calls for unique sets of knowledge, skills, and abilities. The course of study facilitates these objectives through thoughtful reflection, critical assessment, creative thinking, and consideration of the issues found in the current volatile, uncertain, complex, and ambiguous environment. At the conclusion of the course, the students will better understand the role of leaders as change agents for their organizations and the expanding challenges of leading at the strategic level.

NS 6300 National Security and Decision Making**3 Semester Hours**

The National Security and Decision Making (NSDM) course assesses the context and processes for developing US security strategy and policy as well as the use of the national instruments of power in support of that policy and strategy. The context assessment encompasses the overarching political and economic currents that influence global, regional, and national security environments. The course assesses the influence of a variety of factors on the national security decision-making process, including individual psychology, bureaucratic politics, Congress and the presidency, interest groups, think tanks, civil-military relations, intelligence, and the interagency process. The course synthesizes context and processes by analyzing the politics of planning, developing, and acquiring military forces as well as other case studies in national security decision making. To enhance the practical elements of the curriculum, the course includes instructional periods that incorporate State Department members in the seminar.

FS 6400 Foundations of Strategy**5 Semester Hours**

Foundations of Strategy (FS) is designed to develop senior leaders who can think incisively about, develop, and implement strategy at the highest levels of war in the context of national policy objectives and available resources; work comfortably while considering a broad range of strategic issues that constantly change depending upon a range of circumstances at the local, national, and international level; and work effectively in a joint and multinational environment. The course uses seminar discussions, readings, lectures, case studies, practical exercises, and students' written (and briefing) products to facilitate

the evaluation of various themes such as the influence of politics across the full spectrum of warfare, the importance of particular circumstances, the challenges of converting military victory into political success, the contribution of airpower at the strategic and operational levels of war, the challenges of coalition warfare, and the challenges of irregular warfare. The course serves as the foundation for further study of strategy in other resident courses that examine the national security decision-making process and the application of military power as a means to attain national objectives.

WF 6500 Warfighting

6 Semester Hours

The Department of Leadership and Warfighting develops senior leaders with the skills to plan, deploy, employ, control, and lead US and multinational forces throughout the range of military operations with an emphasis on air, space, and cyberspace forces as they contribute to joint, multinational, and interagency operations. During the Warfighting curriculum, students will synthesize theater strategies, joint operations plans, and campaign plans that translate national military strategy into unified and multinational operations using joint doctrine. Additionally, they will synthesize current and emerging joint warfighting capabilities across the range of military operations to include the employment of air, space, and cyberspace forces in support of the unified commanders.

Students will also analyze the issues associated with the application of joint forces throughout the continuum of conflict from the perspective of a unified commander to include the employment of air, space, and cyberspace forces as supporting instruments of power. The intent is to present students with an opportunity to apply the knowledge and skills derived from the Strategy, Leadership, and National Security Decision Making courses to a number of “wicked problems” in the form of historical examples and a realistic planning exercise. They will use critical and creative thinking, viewed through the lens of operational design, to enhance their knowledge and develop new skills essential to functioning as a senior leader.

RS 6600 Regional and Cultural Studies

4 Semester Hours

The Regional and Cultural Studies (RCS) course is an integral part of the curriculum, preparing senior leaders to evaluate the economic, political, cultural, and security issues within a particular region. The RCS course provides the opportunity for students to gain unique perspectives by studying and visiting one of approximately 12 international regions and, for International Fellows, three US locations. The students complete 30 classroom hours of focused academic

preparation, followed by regional field study that allows students to discuss security policy issues with senior political, military, cultural, and economic officials.

GS 6700 Global Security

3 Semester Hours

The Global Security (GS) course is designed to give students the ability to evaluate today's complex, interdependent, and dynamic international system and how it affects global, regional, and national security. The course uses a comparative approach to identify growing and emerging security concerns, analyze power politics from a region-to-region perspective, examine the roles nations and nonstate actors play in addressing key issues that shape the global environment, assess potential challenges to US security, and evaluate the relationship between economic factors and international security. The GS course follows and is symbiotic with the Regional and Cultural Studies program. It capitalizes upon students' experience from their RCS academics and field study.

WG 6800 Global Challenge Wargame

2 Semester Hours

Global Challenge is Air War College's capstone exercise conducted during the last week of classes. The five-day exercise requires students to demonstrate mastery of concepts taught over the course of the academic year. Students must critically analyze complex political-military situations and articulate recommendations at the national-strategic and theater-strategic levels of war. Each student seminar plays the role of a "council of colonels" that has been assembled to provide recommendations to strategic leaders. Senior faculty panels, assisted by seminar teaching teams, evaluate specific learning outcomes derived from each core curriculum course.

Grand Strategy Concentration Course Descriptions

SA 6050 Theory and Practice of Strategy

3 Semester Hours

This course provides an intensive study of strategy, rooted both in international relations theory and history. Block I consists of an overview of the security studies subfield of international relations. The overview has two goals: (1) to understand the major theoretical perspectives in security studies, and (2) to survey some of the most important debates in the field with an emphasis on recent contributions. Topics addressed include realism, liberalism, constructivism, international institutions, nuclear proliferation, counter-insurgency, and unipolarity. Block II examines a series of case studies of the formulation and execution of grand strategy by rising, declining, and hege-

monic powers seeking to maintain their status in a variety of historical and regional contexts. Rather than examining American grand strategy, the intent of the block is to expose students to examples of the strategic art as practiced by decision makers in other states and other periods of history. This will provide students with valuable comparative context for the subsequent study of American strategy in the GSC National Security Policy course. It will also encourage them to consider the role of culture and historical context in shaping the strategic priorities and decisions of states and leaders.

RE 6150 Research**5 Semester Hours**

The GSC research program is designed to allow students to perform in-depth critical analysis on a focused topic of US national security interest. The research topic changes each academic year and is chosen by the GSC faculty in concert with the CSAF's Strategic Studies Group. The research program is focused on improving students' argumentation and expression skills while they explore relevant strategic and operational issues. Students must produce a professional studies paper (PSP) that does not exceed 5,000 words.

LD 6250 Functions of Senior Leadership**2 Semester Hours**

This course analyzes and evaluates the key aspects of strategic (senior) leadership so as to facilitate critical thinking, peer-to-peer discussions, and professional reflection focused upon concepts, frameworks, logic, and techniques that develop senior leaders of character prepared to lead in joint, combined, interagency, and multinational environments. It focuses in particular on the complexities and unique challenges involved in leadership at the senior level. Through a series of seminar discussions as well as off-site strategic engagements, students will examine senior leader character and decision-making, the impact of ethics on senior leadership, the role of the senior leader as an agent of organizational transformation and change, failures in leadership, and leadership in extremis. In addition, the course will highlight the five essential functions of senior leadership: sense making, relating, visioning, inventing, and negotiating. The pedagogical premise upon which the course rests is one that combines theory, relevant readings, and field study (strategic engagements) in a manner that reinforces important principles of senior leadership.

NS 6350 National Security Policy**4 Semester Hours**

This course examines the context and processes for the development of American national security strategy and policy and the use of the nation's instruments of power in support of that strategy and policy. It begins with an examination of the history of American national security strategy and contemporary debates regarding the future orientation of this strategy. It then assesses the influence of various institutions and factors, such as Congress, government agencies, interest groups, the media, and public opinion, on the national security decision-making process. To enhance the practical elements of the curriculum, the course includes a trip to Washington, DC, involving visits to government institutions and agencies as well as nongovernmental entities involved in the development of American national security policy. Every effort will be made to ensure that the GSC curriculum incorporates certain activities outside the confines of the normal classroom that are designed to expose students to senior military decision and policy makers. One such expected event is a TDY considered to be part of the course. This trip is anticipated to take place in and around the national capital region to interface with Department of Defense and joint military strategic planners, senior strategy and policy planners on the National Security Council staff, senior policy planners in the Department of State, and certain members of influential and varied think tanks.

FS 6450 Foundations of Strategy**5 Semester Hours**

Foundations of Strategy (FS) is designed to develop senior leaders who can think incisively about, develop, and implement strategy at the highest levels of war in the context of national policy objectives and available resources; work comfortably while considering a broad range of strategic issues that constantly change, depending upon a range of circumstances at the local, national, and international level; and work effectively in a joint and multinational environment. The course pays special attention to strategy development for the venues of air and space and to the impact of airpower on national and military strategy. The course uses seminar discussions, readings, lectures, case studies, practical exercises, and students' written (and briefing) products to facilitate the evaluation of various themes such as the challenges of strategy development, implementation, and analysis; the influence of politics across the full spectrum of warfare; the importance of local circumstances; the challenges of converting military victory into political success; the challenges of coalition warfare; and the challenges of warfare in an age of information and globalization. The course also serves as the foundation for further study in other resident courses

that examine the national security decision-making process and the application of military power as a means to attain national objectives. The GSC FS course differs from the core curriculum course in that it requires, on average, one additional reading per seminar and, upon occasion, individual seminars may be lengthened to provide more active learning time to more thoroughly examine the issues under consideration.

WF 6550 Campaign Design and Execution **4 Semester Hours**

The Campaign Design and Execution course evaluates the development of theater strategies, campaign plans, and their execution in the contemporary operating environment. It also assesses the integration of joint, interagency, and multinational capabilities, as well as the joint air domain, in contemporary campaign planning and execution. The course consists of in-depth case studies of Operations Enduring and Iraqi Freedom, evaluating each phase of these campaigns chronologically, including an assessment of the application of joint, service, and interagency doctrines and capabilities. Focus is placed on the strategic and operational levels of war. The course uses a book-based approach in which students will read most or all of a number of contemporary books on the wars in Iraq, Afghanistan, and Libya and concludes with a student-led campaign assessment focusing on a recent conflict, based on the current situation and formulation of a campaign design that achieves US strategic objectives.

RS 6600 Regional and Cultural Studies **4 Semester Hours**

The Regional and Cultural Studies (RCS) course is an integral part of the curriculum, preparing senior leaders to evaluate the economic, political, cultural, and security issues within a particular region. The RCS course provides the opportunity for students to gain unique perspectives by studying and visiting one of approximately 12 international regions and, for International Fellows, three US locations. The students complete 30 classroom hours of focused academic preparation, followed by regional field study that allows students to discuss security policy issues with senior political, military, cultural, and economic officials.

GS 6750 Global Security **3 Semester Hours**

The Global Security (GS) course analyzes the complexity of security issues in selected regions of the world through an emphasis on particular themes, including the requisites for democracy, the relationship between democracy and internal/regional stability, models of economic development, environ-

mental issues, internal order, civil-military relations, and the role of religion and politics. These themes allow a focus on a range of developing countries, enabling the students to analyze and interpret conditions of political, economic, and social stability in particular countries of interest. The course is designed thematically with applications, where the thematic readings are reinforced by regional or national applications of the pertinent themes. The Global Security course follows and complements the Regional and Cultural Studies program, capitalizing upon students' experience from their field of study. The course allows students to develop an analytical framework incorporating the role that factors such as region, society, culture, and religion play in shaping the desired outcomes of policies, strategies, and campaigns.

WG 6850 Wargames

3 Semester Hours

The Grand Strategy Concentration's war-gaming curriculum provides a future-oriented look at emergent defense problems. The program consists of two war-gaming practicums, held either at Maxwell AFB or in one of several venues in the national capital region. In the past, GSC students participated in an Office of the Secretary of Defense (OSD) Net Assessment–sponsored war game in Washington, DC. The war-gaming practicums provide an intensive three- to five-day examination of a future operational challenge that leverages outside expertise assembled from across DOD, and the students apply the broader themes of the GSC to analyze an operational-level military problem in a joint and coalition context. Participation in these high-level war games not only provides the students with a platform to synthesize and internalize the program's themes but also presents an opportunity for them to network with active policy planners across government and key think tanks. The connections built through these networks provide a lasting avenue for students to shape debate and impact policy discussions upon graduation. Pending availability of and access to OSD or other suitable war games in the national capital region or elsewhere, GSC students may participate in the Air War College's own culminating war game, Global Challenge. War games will be assessed on a pass/fail basis. It is anticipated that the first of the two GSC war games will take place in April over approximately three days, involve a locally developed scenario, and carry one credit hour or one-third of the course's credit. It is anticipated that the second of the two GSC war games will take place in May over approximately five days. It could be at an external organization such as the OSD or could involve folding into AWC's Global Challenge war game. It will carry two credit hours or two-thirds of the course's credit.

EX 6950 Comprehensive Oral Exam**1 Semester Hour**

Comprehensive oral exams are designed to assess a student's ability to synthesize and evaluate the major bodies of evidence and theoretical propositions examined in the course of studies and across the entire GSC curriculum of instruction. A panel of three faculty members with terminal degrees conducts an intense question-and-answer session of approximately two hours with a single GSC student. The student must demonstrate a high level of synthesis for all GSC courses and experiences and lucidly present a comprehensive vision of the development of grand strategy from a historical perspective, in contemporary America, and into the future. Comprehensive oral exams will be assessed on a pass/fail basis.

Air War College Resident Curriculum Electives

All students within the regular curriculum must complete four semester hours in the electives program. Electives enhance and complement the core curriculum by providing students with opportunities to achieve greater depth and breadth of understanding in issues of special interest and provide the AWC curriculum with the flexibility to adapt quickly to changes in international and domestic security environments. Elective course options follow.

EL 6122 Directed Study**2 Semester Hours**

Students interested in intensive work on a particular topic can develop, with a faculty member, a resource proposal and reading list designed to give them in-depth understanding of the subject. Enrollment is limited and requires approval of the assistant dean of resident programs. Not available as an audit status course.

EL 6212 God and Country: Church, State, and the American Military**2 Semester Hours**

This course explores contemporary issues where American religious and military institutions, cultures, and practices intersect, particularly as they pertain to senior leaders. The course also covers the development of religion in America, particularly in relation to the state and military.

EL 6231 Command and Conscience**2 Semester Hours**

In a prudent and practical manner, this course examines a variety of topics of immediate professional concern to the commander. How does today's leader, for example, resolve the tension inherent in the occasional clash of

command responsibility and ethical imperative? To whom or to what, for instance, does the leader owe the highest loyalty? To his superior? To the Constitution? To his religious and philosophical judgments? Which has priority—mission or men? If integrity is—as it must be—the heart of the officer corps, it must first be examined before it can be assimilated. This course, then, inquires into the nature of military integrity.

**EL 6232 Right, Wrong, and In-Between:
Philosophy and Ethics for Senior Leaders** **2 Semester Hours**

This traditional liberal arts course emphasizes analysis of what is publicly advertised or socially accepted as “good.” It is a challenging examination of those core values which have, over the centuries, been the answers to the questions, “what is the best way to live?” and “what is the best way to lead?”

EL 6234 Expeditionary Leadership in World War II **2 Semester Hours**

Eric Larrabee’s *Commander in Chief* is as good a case study file of biographies of World War II leaders as appears anywhere. This course dissects Larrabee’s biographies and looks at James Stokesbury’s short history of the war to provide reference points and target sets.

**EL 6236 Communicating for Effect:
Global Media Engagement Battle Space** **2 Semester Hours**

Senior military leaders must understand the information environment; how it can be exploited for military gain; the statutory and policy limitations our government places on the exploitation of information and the mass communication mediums it passes through; what effects various public affairs actions, integrated into information operations, can generate on US citizens, allies, and adversaries; what measures must be taken to safeguard information and communication mediums; and how the evolving opportunities and challenges in the information environment affect military decision making. This elective provides a broad-brush approach to how military public communication—in particular, global media engagement—contributes to the exploitation of the information environment. This approach explains how the unique capabilities of joint public affairs operations contribute to achieving effects to ensure successful joint force employment.

EL 6238 Negotiation Theory and Application **2 Semester Hours**

This interactive course develops a critical understanding of and ability to apply a set of essential conflict management tools. This course not only develops negotiation and mediation skills but also improves one's ability to critically think about the processes that people, groups, and even nation-states go through to successfully resolve conflict. Consideration is given to cross-cultural factors, time constraints, negotiation styles and strategies, and assessment of involved parties. Topics include logical analysis, group problem solving, conflict management, and methods of persuasion. This course is built around faculty and guest presentations, mini lectures, research, application and assessment exercises, and seminar discussion.

EL 6239 Cross-Cultural Perspectives in Negotiations **2 Semester Hours**

This course develops the understanding and skills needed to better negotiate conflict resolution between parties with cultural and/or organizational differences in their approach to negotiations and/or conflict management. Emphasis is placed on cross-cultural factors and their impact on the negotiating styles and strategies of the involved parties. Topics in the course include how different cultures view and use the concepts, processes, and intended results of a negotiation. This course is built around faculty and guest presentations, mini lectures, application and assessment exercises, and seminar discussion.

**EL 6240 Overcoming the Fog of Culture:
Tools for the Senior Warfighter** **2 Semester Hours**

From Bagram to the Horn of Africa and Incirlik to Yokota, today's senior military leaders operate in culturally complex environments, working daily with host nation counterparts, nongovernmental organizations, international organizations, and civil society. A slew of recent guidance documents makes it clear that culture is now a core war-fighting competency in the DOD. This places enormous expectations on senior officers to adapt their leadership and strategic skills. However, most force development efforts to date have focused on junior personnel and tactical/operational requirements. This elective helps fill this void, providing a concrete set of tools and perspectives to help senior officers provide the nation with effective global vigilance, reach, and power. Specific topics include the cultural observe, orient, decide, and act (OODA) loop; culture and strategic communication; working through interpreters; protecting cultural property; and more.

EL 6241 Just War: Classical Wisdom and Contemporary Conflict

2 Semester Hours

Despite Clausewitz's famous dictum that "war is an act of force that can theoretically have no limits," political, military, religious, and social leaders do seek to restrain both the occasions for war and the means of fighting. Just war theory is useful for structuring the terms of debate about the justice and injustice of particular wars and tactics. Any question of significance to students (regarding ethics and war) will be fair game in this seminar.

EL 6242 Civil-Military Relations and Senior Leadership

2 Semester Hours

This course examines the concept of civil-military relations as expressed in the relations between senior civilian and military leaders. Is there a clear distinction between the roles and responsibilities of senior civilian and military leaders? Are officers professionals in whose realm civilians are ill-equipped and ill-advised to meddle? Does military professionalism extend to the strategic realm of policy? These questions are theoretically examined, through case studies and historical examination. The students will develop their own points of view on these fundamental questions in an exam to be completed on the final day of class.

EL 6244 From Good to Great—Continuous Process Improvement for Strategic Leaders

2 Semester Hours

This course is designed for highly motivated students who see the need to improve military processes but question the direct applicability of business practices to the military environment. The course focuses on continuous process improvement (CPI) in a military context while avoiding a litany of Japanese terms (*gemba*, *andon*, *kaizen*, *heijunka*, *kanban*, etc.) or hours spent perfecting Balanced Scorecard PowerPoint briefings. In a leadership environment characterized by decreasing budgets, personnel shortages, and aging equipment, pressure to find efficiencies while improving effectiveness will only grow. Through the study of books written by some of the most respected authors in the field, guest speakers, visual media, site visits, and classroom discussion, students will gain a practical understanding of CPI.

EL 6310 Guns and Butter:**International Economics and National Security****2 Semester Hours**

Economic factors are of great importance to the foreign and domestic policies of the United States and other countries. What are the United States' economic interests? Does the international economic system make the United States more or less secure? Will the economic growth of China, India, and other developing countries undermine the existing system of international economic management that was, in large measure, created by the United States? Are the political structures that regulate world financial and trading markets sufficient to manage crises, or are fundamental reforms required to provide sustained stability in international economic relations? This course examines the evolution and functioning of the major countries, institutions, and issues in the international economic system as a way of analyzing the relationship between international politics and international economics. The purpose of the course is to critically evaluate the current structure of the world economy and analyze whether it contributes to or undermines the long-term interests of the United States.

EL 6323 Peace and Stability Operations**2 Semester Hours**

This course focuses on the problems of planning, deploying, sustaining, and reconstituting forces in peace and stability operations, including stabilization/reconstruction/phase IV operations. In doing so, it examines the most important peace and stability operations of the past 15 years and the roles played by the military. The course addresses the strategic and operational decision-making and planning processes of the United Nations, the US DOD, regional organizations (including the North Atlantic Treaty Organization [NATO]), and coalition partners. The course also analyzes the force structure requirements, capabilities, and limitations of multinational, coalition, and joint forces in meeting security objectives, especially in the execution of peace and stability operations and postwar reconstruction.

**EL 6331 Central Intelligence Agency (CIA) Roles,
Missions, and Military Support****(Classified, US Personnel)****2 Semester Hours**

To successfully craft national security policy, the US government requires intelligence—accurate, timely, relevant information and analysis—about current or projected threats to US national interests. The CIA's primary mission is to support the White House by collecting, processing, analyzing, and dis-

**EL 6455 Group Research:
Blue Horizons (Classified, US Personnel) 4 Semester Hours**

The chief of staff of the Air Force has directed that the Center for Strategy and Technology (CSAT) Blue Horizon study for the 2013–14 academic year focus on answering the following question: “What combination of technologies and integrating concepts will enable the Air Force to project sensor and weapons effects at range over time in 2040?” The Blue Horizons team should assume the Air Force retains current missions amid a greater and more diverse set of threats, account for accelerating technological change and continued fiscal constraints over the next decade, and assess supportability issues. Answers should challenge current ideas and search for elegant, but affordable, solution sets that include the costs and benefits of both modular and enterprise solutions. This study will directly inform the congressionally mandated Futures Capabilities Game and Air Force inputs into the Quadrennial Defense Review and guide the Air Force’s program submission.

EL 6462 Why Insurgencies Win (and Lose) 2 Semester Hours

This course assesses the phenomenon of materially weak insurgent victories over far more powerful states by examining the relatively small literature on this timely subject. Explanations of insurgent victories include superior political will and readiness to sacrifice blood and treasure, superior strategy, the nature of the enemy regime, and the availability of foreign assistance.

EL 6463 Coalition Warfare in Grand Strategy 2 Semester Hours

Increasingly, one hears the lament that in times of conflict, coalitions cause more problems than they solve. Coalitions, we are told, can be kept to a bare minimum or eliminated altogether. However, the history of coalitions and of warfare suggests otherwise. This course challenges the notion that coalitions are the weaker form of organizing and conducting warfare. Rather, history shows that coalition warfare, when properly conceived and conducted, is the more powerful, flexible, and resilient form of warfare. Yet coalition warfare, for all its strengths, does bring with it numerous challenges and potential pitfalls of which the military professional must be aware.

**EL 6467 The Vietnam War:
What Happened and Does It Matter? 2 Semester Hours**

This course addresses the causes, characters, consequences, and lessons of the Vietnam War (1945–75) for the purpose of facilitating an informed under-

standing of the challenges the United States faces in Iraq today. It focuses on both the foreign policy context of US intervention in Vietnam and the conduct of US military and other operations during the war. The course is organized into four major sections: (1) an overview of the Vietnam War and its associated issues, (2) an examination of the foundations of post–World War II US foreign policy—and domestic political considerations—that propelled the United States into the Vietnam War, (3) an assessment of America’s conduct of the war and the reasons for its defeat, and (4) an analysis of the differences and similarities between the Vietnam and Iraq wars.

**EL 6469 Ethics and the Legitimate
Use of Military Force**

2 Semester Hours

Values and perspectives help determine normative standards of human behavior, and these, in part, serve to influence individual and collective behavior. The course will examine a variety of ideological and philosophical perspectives and certain non-Western perspectives, including Islamic, Hindu, and classical Chinese perspectives concerning the legitimate use of armed force. Finally, these various perspectives concerning the legitimate use of armed force will be used as a basis for formulating individual beliefs and approaches about the decision to use armed force and the degree to which force should be limited in its application.

EL 6471 Development of Expeditionary Airpower

2 Semester Hours

The US Air Force and a number of its closely allied airpower partners have considerable experience in the employment of air, and later air and space, power in an expeditionary role. Understanding through evaluation of how the operational and strategic concepts of employment developed is the focus of this course.

EL 6475 Strategic Dilemmas

2 Semester Hours

The course will analyze and assess a series of case studies focusing on difficult strategic dilemmas that have confronted a variety of policy makers and military strategists as they attempted to formulate grand strategy, national military strategy, and theater strategy in pursuit of their respective national objectives. As such, the course will explore a series of historical examples in which there are arguably several viable courses of action, each of which carries with it both the potential for success, but also significant problems, drawbacks, costs, and risks that must be taken into account. It will review the impact

of the personalities involved in the decision-making processes, consider context in which decisions were made, analyze the intelligence that was available to decision makers at the time the decision was taken, assess the options available, analyze the considerations that led to the adoption of the particular course of action, and evaluate the outcome based upon the option selected. Not only will students gain a deeper familiarity with the complexity involved in the strategy formulation process, they will also expand their appreciation for the importance of strategic leadership and the role of ethics in the formulation of grand strategy, national military strategy, and theater military strategy.

EL 6487 Strategy, Technology, and War**2 Semester Hours**

War is both a profoundly human and technological phenomenon. Innovations in weapon technology and employment can change the conduct and outcome of battle, with tremendous consequences for societies. At the same time, cultural, industrial, and bureaucratic factors in society shape the form and function of military technology. Consequently, the course is a focused study of the drivers of military innovation and change. The course analyzes the process of innovation and change at multiple levels: conceptual, societal, resource driven, organizational, and individual. While following a loosely chronological organization, the course will not cover military innovation and change during all periods and places. Instead, it incorporates 10 key books providing different perspectives and approaches to understanding military innovation as well as its intersection with national power and strategy.

EL 6515 Defense Acquisition:**Providing Military Capability to the Warfighter****2 Semester Hours**

Defense acquisition is a political and administrative process by which the department converts material resources into military capabilities. This course will examine the basics of acquisition, including research, development, test, and evaluation (RDT&E), procurement, and life cycle support. It also will examine the intersection with the user community, as well as with industry and foreign states. As the acquisition system evolves continually, the course will study some of the internally and externally driven changes affecting the current process.

**EL 6540 Air Mobility and the Defense
Transportation System****2 Semester Hours**

This elective provides students a better understanding of the current and evolving capabilities of mobility and the critical role it plays and will continue to play during peace, war, and operations other than war. During the course, class members will draw from historical references, student case study presentations, classroom discussion, and guest speakers to gain a better understanding of how mobility resources and capabilities evolved, future directions in air mobility, and the impact on our current and future national security and military strategies.

**EL 6541 Navy and Marine Corps
Expeditionary Forces****2 Semester Hours**

This course is designed to give students a comprehensive introduction into Naval Expeditionary Warfare. It covers current Navy and Marine Corps strategy and doctrine, emphasizing Navy/Marine Corps force planning, forces and capabilities, and military operations. Students will be given comprehensive briefings on US Navy and Marine Corps operations in support of joint strategy, will participate in panel discussions and case studies, and will travel on field trips for hands-on reinforcement of lessons.

**EL 6542 Command and Control of
the Air Environment****2 Semester Hours**

This course is designed as a base-level introduction of past, current, and future issues concerning the joint force air component commander (JFACC). It is specifically intended for operators who may be assigned to a JFACC or joint air operations center (JAOC) staff. This course addresses the roles, operations, command relationships, and responsibilities of the JFACC in support of a joint force commander. It is not intended for experienced JFACC or JAOC staff officers. A blue-ribbon panel of retired general officers whose expertise is in command and control and the application of air and space power will mentor students in this course.

EL 6543 America's Army**2 Semester Hours**

This course is specifically designed for non-Army students who want to gain greater understanding about the Army. The course thoroughly explores the Army, with a strong emphasis on how history and heritage influence current force and doctrine. Students will gain a comprehensive awareness of

Army culture and develop an appreciation for what the Army can provide to a regional combatant commander or joint task force commander. This course builds a solid foundation of knowledge about the Army, including the US Army's force structure and capabilities, doctrine, terminologies, and idiosyncrasies. Students analyze and evaluate Army doctrine relative to their own service and the joint community. The goal is to ensure that students understand what it looks, feels, and smells like to be a Soldier. The class culminates with a three-day practical/map exercise to validate classroom instruction.

**EL 6544 Intelligence, Surveillance, and
Reconnaissance Operations**
(Classified, US Personnel)

2 Semester Hours

The national intelligence community and the Department of Defense have embraced a transformation strategy that rests on a foundation of modern high-performance intelligence, surveillance, and reconnaissance (ISR) capabilities. With the continuing challenges of worldwide operations, it is imperative that senior leaders have a clear understanding of how to effectively leverage national and DOD intelligence capabilities. The course focuses on ISR capabilities at the operational and strategic levels by critically examining what to expect and what not to expect from intelligence. Against the backdrop of ISR transformation, this course enhances senior-level leaders' decision-making abilities to critically analyze and integrate ISR capabilities for maximum impact.

EL 6545 Special Operations 101
(Classified, US Personnel)

2 Semester Hours

This course provides an understanding of the organization, capabilities, and missions of US special operations forces (SOF) with particular focus on their support to the combatant commanders. It provides an awareness of the roles of the assistant secretary of defense for special operations and low-intensity conflict and the Joint Staff J-3 Special Operations Division. The course analyzes the integration of joint SOF capabilities with conventional forces; looks at SOF equipment, training, and support; and considers mission employment, civil affairs, and psychological operations.

EL 6546 Total Force

2 Semester Hours

From the initial vantage point of a historical review of the Air National Guard and Air Force Reserve, students engage in discussions surrounding the compelling issues affecting the total force today and through the next decade.

Some suggest that we will transition to a militia nation once again. What is the right force mix for the active and reserve components? The course will include a sprinkling of outside speakers, field visits, and teleconferences with the top leaders of the Air Reserve components. It will give students the opportunity to establish multidimensional views on the issues at hand.

EL 6547 Logistics of Waging War

2 Semester Hours

Forming the bridge between the nation's economic resources and its war fighting forces, Department of Defense logistics is "the process of planning and executing the projection, movement and sustainment, reconstitution, and redeployment of operating forces in the execution of national security policy." The purpose of logistics is to create, sustain, and deliver support for combat power. The challenge is to create the maximum combat effectiveness within the constraints imposed by our nation's resources. This elective examines lean thinking processes and logistics issues including acquisition, sustainment, and movement of forces that affect military, especially air, space, and cyberspace, combat power.

**EL 6548 Intelligence, Surveillance, and
Reconnaissance and Cyberspace
(Classified, US Personnel)**

2 Semester Hours

Access to cyberspace is increasingly critical to meet joint and allied requirements for freedom of maneuver in all domains. Evolving information systems technology has turned the cyber arena into a multidimensional attack space that extends the conventional landscape to a virtual domain where key economic and national security assets are exposed to significant threats. This course examines the role of ISR in cyberspace. It begins with an overview of ISR at the strategic level of war and an examination of the cyber threat dynamic: the environment, the threat, and the convergence of the effects of the cyberspace environment and the threat. It then discusses the legal issues associated with the cyber domain and concludes with an in-depth examination of the three pillars of cyber operations: exploitation, defense, and attack.

**EL 6551 Group Research:
Nuclear Issues (Classified, US Personnel)**

4 Semester Hours

This course examines the strategic, technical, and policy dynamics of nuclear weapons. Over two terms, we will explore four core issues: first, nuclear deterrence in concept and in application during the Cold War, post-Cold

War, and post-9/11 periods; second, the US nuclear enterprise (i.e., the components, organizations, and rules related to maintaining the competence and reliability of the US arsenal); third, the global nuclear landscape (i.e., competing explanations of proliferation, how proliferation affects international stability, and the threat posed by nuclear terrorism); fourth, the arms control and counterproliferation tools available to the United States. Students will engage these topics through classroom discussions of relevant academic material, a field study trip in which they directly interact with national experts and policy makers, and numerous roundtable reviews of individual PSP research on nuclear-related topics.

EL 6554 Space Operations

(Classified, US Personnel)

2 Semester Hours

This course is for students with a minimal knowledge of space operations. It will address space issues from the perspective of all services as well as an international view. We will discuss the capabilities, limitations, vulnerabilities, and dependencies of all space systems and then analyze the command and control of space forces. We will assess how space systems affect US freedom of action in joint war fighting, including the integration of space in the domains of land, sea, air, and cyber. Students will assess current and future space systems.

EL 6560 Homeland Security and Defense

(Classified, US Personnel)

2 Semester Hours

This course examines the threats to and vulnerabilities of the US homeland and the actors, organizational structures, plans, policies, programs, and resources required to secure and defend the country. During the Cold War era, only sovereign nations had the ability to create mass casualty and society-destroying events. Today, we are in an era when individuals and small groups can inflict this type of misery. Likewise, natural and technological disasters have become more devastating both in human casualties and property costs. Homeland security and defense is the nation's top priority to secure our homeland and protect the American people from terrorist attacks and natural/man-made disasters.

EL 6564 Combating Terrorism:

A Whole of Government Approach

2 Semester Hours

Easier access to and the use of more lethal forms of terrorism threaten the ability of nations to maintain the secure, stable environment essential to ensuring the

well-being of their citizens. This course, sponsored by the Combating Terrorism Fellowship Program and the Joint Special Operations University, uses visiting faculty who are leading global experts in the field of combating terrorism and is primarily targeted to the international officers attending Air War College. The course examines the causes and contributing factors of terrorism by individuals and groups and the impact governmental structure and methods of governance within a country have on the use of terrorism. It also provides a framework within which a whole-of-government approach can be developed to improve a country's capability to combat terrorism.

**EL 6582 Nonlethal Weapons:
Support to Twenty-First Century
Warfare and Homeland Defense**

4 Semester Hours

This course is a combination of integrated lectures, in-class exercises, and a range period that provides field commanders, staff planners and those who support the war fighter with information on the utility and limitations of non-lethal weapons (NLW). It covers all NLW technologies being assessed, developed, and fielded by the Department of Defense (DOD). Additionally, the medical, legal, ethical, political, and public perception issues are analyzed to provide students an appreciation for the planning factors that must be considered prior to employing NLWs.

**EL 6590 Joint Land, Aerospace, and Sea
Simulation (Classified, US Personnel)**

4 Semester Hours

Joint Land, Aerospace, and Sea Simulation (JLASS) focuses on the strategic and operational levels and is played by students from all senior-level colleges (SLC). JLASS follows the latest planning procedures using the full range of military operations set in the western Pacific, northern Africa, Southwest Asia, and the US homeland in the year 2021. In the distributed planning phase, students play from their own schools and develop options in response to multiple regional crises. They prepare campaign plans in coordination with other SLCs to support combatant commander objectives in the event of a major operation/campaign. JLASS culminates with a war-fighting exercise that brings SLC teams together at Maxwell AFB, AL.

**EL 6596 Group Research: Cyberspace
(Classified, US Personnel)****4 Semester Hours**

The purpose of this seminar is to focus on the integration of information operations (electronic warfare, network warfare, and especially influence operations) supporting a joint force commander. A variety of issues—technical, scientific, ethical, and legal—will be discussed. Students write their professional studies paper on an information operations topic related to research projects from Cyber Command, Eighth Air Force, and other organizations.

**EL 6741 The Asian Century:
What Do We Do about It?****2 Semester Hours**

This elective examines contemporary relations between the United States and the countries of East Asia (including Northeast and Southeast Asia but not South Asia). This course will cover the military and economic dimensions of US–East Asia relations, Sino–American relations, and nontraditional security issues as well as the connections between Northeast and Southeast Asia. International Fellow resident diploma students receive audit status for this course.

EL 6743 Globalization**2 Semester Hours**

This course will familiarize the student with the different trends that are under way in the globalization process and the ways they impact US grand strategy and national security interests. It examines globalization in several parts. First, it attempts to identify the scope of globalization. Second, it looks at specific trends in the globalization process—how the world is getting economically, technologically, and demographically integrated. Third, it examines the cultural impact of globalization. Lastly, it discusses the security implications of globalization for state actors.

EL 6747 Cultures of Violence**2 Semester Hours**

This course examines areas and activities around the world where chronic violence has created ungoverned spaces and anarchic behavior. The course examines weak states and the violence that can erupt in poorly governed spaces such as militia warfare, organized criminal groups, and traditional armed groups such as the pastoral warrior societies of East Africa. The seminar will also consider activities that flow from and to the cultures of violence, such as arms trafficking, resource theft, conduct of refugee communities, child soldiers, and trafficking in humans and drugs. The course will cover, among other topics, urban gangs in Latin America and Papua New Guinea;

militias in Africa; tribal and ethnic groups in Yemen, Somalia, and Pakistan; violence in Colombia; and organized crime in the Caribbean and Europe. This course is concerned with behavior, activities, and other areas that fall through the cracks when studying more formal state-on-state conflict. This seminar will investigate the messy and dangerous world where violence is endemic and has created its own environment of power politics, control structures, and aberrant economic activity.

**EL 6749 China's Use of Force:
Past, Present, and Future**

2 Semester Hours

This course examines the ways China might use force to advance or protect its interests. It analyzes the logic of Chinese threat perception in the light of calculation or miscalculation of consequences, with particular attention given to the Taiwan situation.

Additional Events and Programs

National Security Forum. The National Security Forum (NSF) is an event sponsored by the secretary of the Air Force and hosted by AWC during the week before graduation. It is the capstone event of AWC's academic year. The NSF brings together approximately 125 civilian leaders with diverse backgrounds from locations around the United States to join with the AWC class. The primary objective of the NSF is a frank and candid exchange of views on national security matters among our invited guests, AWC students, and senior military and civilian leaders. The week is devoted to exploring the many issues that affect the current and future security of our country, focusing heavily on the role of air and space power as an instrument of national security. The forum's distinguished speakers, seminars, and social functions serve to broaden and solidify the participants' understanding of air and space power and national security issues.

Commandant's Lecture Series. The Commandant's Lecture Series generally include two types of invited speakers: (1) senior governmental civilians (DOD, DOS, DHS, etc.) and general/flag officers from the US government and allied countries; and (2) respected and recognized individuals from across society to include such professions as industry, media, politics, entertainment, and sports. Senior governmental civilians and general/flag officers will engage students on some of the most challenging topics they will face as senior leaders, generally relating to their own current and previous govern-

mental positions and leadership experiences. These senior officers will also often include specific discussions about their expectations of new senior leaders. This second category of speakers is designed to broaden students' experiences, exposing them to diversity of thought and providing additional tools for tackling the complex challenges of their future leadership roles. Speakers may engage the students on topics ranging from motivational stories of inspiration and perseverance to civilian organizational leadership, business success/failure, and stories of innovation.

Executive Leadership Feedback Program. The Executive Leadership Feedback Program (ELFP) offers a unique state-of-the-art program that uses a 360-degree multirater assessment (self-ratings compared to ratings by superiors, subordinates, and peers) and allows a comparison of how individual ratings measure up to those of other senior service college students. The ELFP also combines a detailed assessment of personality attributes arrayed with relevance toward strategic leader competencies (e.g., personality attributes related to negotiation, interpersonal leadership), as well as an assessment of team roles, and offers raters the opportunity to provide text comments for developmental purposes. An individualized, 104-page leadership assessment portfolio report is generated for each student, and one-on-one feedback is provided by a member of the ELFP who is certified to provide the feedback. The results are presented with the intent of enhancing self-awareness to focus and accelerate leader development in our students.

Language Programs. English as a second language (ESL) is taught by the International Officer School for selected international officers only and provides intensive work in the English language. US and international students may participate in language courses taught by the Defense Language Institute (DLI). These noncredit, nongraded courses are Arabic, Chinese, Dari, French, German, Russian, Spanish, and Swahili. Because these language courses are optional and not graduate level, they do not count toward the master's degree or AWC graduation requirements.

Master of Military Operational Art and Science Degree

Resident Program

Air Command and Staff College

Internet Address

<http://www.au.af.mil/au/acsc/>

Program Description. The Air Command and Staff College (ACSC) curriculum is designed to develop higher-order thinking within the context of the war-fighting profession by challenging students to think critically and exercise a combination of analytical and practical tools required of field-grade officers serving in operational-level command headquarters staff positions. ACSC courses emphasize applying airpower in joint campaign planning and the operational art of war.

The primary form of instruction in the resident program is through seminars held in specially designed rooms featuring closed-circuit television, an array of multimedia equipment, and student access to a college-wide computer network and the Internet. Students receive more than 80 books to expand their professional knowledge and a personal laptop computer to keep track of the academic schedules, online reading assignments, examinations, research, and other writing requirements throughout the academic year.

Learning Outcomes. The ACSC Resident Program produces graduates who are able to

- lead and command in complex, dynamic, and ambiguous operational environments;
- apply military theory in general and airpower theory in particular to the development of operational-level strategies;
- plan for the integration and employment of joint forces at the operational level in whole-of-government operations across the spectrum of war and conflict;

- articulate capabilities and limitations of service and joint organizations in the conduct of war at the operational level;
- apply research methodologies and critical-thinking skills to analyze issues of concern to the war fighter and/or broader defense community; and
- forge professional relationships which facilitate efficient, effective, and collaborative accomplishment of assigned tasks.

Faculty. ACSC employs a blend of expert faculty members exceptionally qualified to accomplish its mission and goals. The college's unique mission requires a distinctive mix of faculty qualifications and credentials. Traditional civilian academics provide the depth and breadth of subject-matter expertise to guarantee the academic rigor of the college's offerings while simultaneously ensuring adherence to validated pedagogical theory and practice. Military officers contribute critical military and operational perspectives, as well as unparalleled currency and expertise, to the subject matters addressed.

Duration. The resident program consists of 10 months of graduate-level study. As the center for US Air Force intermediate developmental education (IDE) and as a joint-accredited institution for providing the first phase of joint professional military education (PME), ACSC annually educates approximately 500 students from all US military services, selected federal agencies, and international officers from over 60 different nations.

Eligibility. Air Force candidates who attend ACSC's resident program are selected in conjunction with their O-4 promotion boards. A central PME selection board, with major command input, selects the actual college class from these candidates based on their demonstrated potential for assignment to key field-grade command and staff positions. Sister-service O-4, O-4 select (or equivalent rank), and GS-12 and GS-13 government civilians are eligible to attend ACSC and are selected by their respective personnel systems.

Reference AFI 36-2301, *Professional Military Education*, and the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MACSC001).

Admission Requirements. To be admitted to the master of military operational art and science degree program, individuals must (1) present proof of academic capability either by holding a qualifying undergraduate degree from a regionally accredited college/university (US bachelor's degree or its equivalent) or by meeting academic credentials admission requirements

through the portfolio admission process and (2) provide an acceptable score on the Test of English as a Foreign Language (TOEFL), unless they are from an English-speaking country.

International students not meeting the admissions requirements for the master's degree program will be allowed to attend ACSC and will, upon completion of the resident program with a cumulative GPA of 2.7 or higher, receive the ACSC resident diploma but will not be awarded a master's degree.

Graduation Requirements. Students fully admitted must complete the following 33-semester-hour ACSC resident program. Students must achieve a grade of "C" or higher on each academic course with an overall GPA of 3.00 on a 4.00 scale and demonstrate fully satisfactory participation in other scheduled ACSC programs and activities to earn the master's degree.

Syllabus

| Course Number and Title | Semester Hours |
|--|----------------|
| OC 5510 Orientation Course | Noncredit |
| LW 5510 Leadership and Warfare | 3 |
| LC 5510 Practice of Command | 3 |
| NS 5510 International Security Studies | 3 |
| WS 5510 Warfare Studies | 3 |
| AP 5510 Airpower Studies | 3 |
| JF 5510 Joint Forces | 3 |
| JP 5510 Joint Planning | 3 |
| JA 5510 Joint Air Operations | 3 |
| CS 5510 Regional/Cultural Studies | 3 |
| RE 5612 Research/Electives I | 3 |
| RE 5613 Research/Electives II | 3 |
| GE 5510 Gathering of Eagles | Noncredit |
| Total | 33 |

Note. Courses in the nonmaster's distance learning program may not be used to satisfy course requirements of the resident master's degree program.

Course Descriptions

OC 5510 Orientation Course

Noncredit

The Orientation Course provides an overview of the ACSC program for joint education; US Air Force educational methodologies, policies, curriculum, and research requirements; and key principles and concepts that students encounter

throughout their academic experience. The program includes an introduction to small-group dynamics, communication and critical-thinking skills, the technology employed within the program, student responsibilities and requirements, and additional services that are available to enhance student success.

LW 5510 Leadership and Warfare**3 Semester Hours**

The Leadership and Warfare course analyzes factors that guide the action of military leaders in establishing and maintaining an effective leadership environment. The course educates and inspires students to reach their full leadership potential through the study of great commanders and their conduct of warfare and current problems of command in contemporary joint operations. Through these studies, students gain a unique understanding of the specific leadership challenges that leaders face in guiding people and organizations through crises and environments of change.

LC 5510 Practice of Command**3 Semester Hours**

The Practice of Command course allows students to reflect on their personal philosophy on the art and craft of command, honing that philosophy through interaction and the study of responsibilities and challenges unique to commanding an Air Force squadron. The course introduces students to the resources available to assist squadron commanders with their duties. It also stresses the importance of commanders melding their personal philosophies of command, the unique requirements of their situation, and the responsibilities to their service, mission, people, and themselves.

NS 5510 International Security Studies**3 Semester Hours**

The International Security Studies course provides a foundation for understanding the international security environment, its implication for the United States, and how the United States both shapes and responds to this environment. The course also examines the instruments of power (IOP) and how they are wielded by both state and nonstate actors to affect the international environment. In addition, the course examines the US national strategic decision-making process, examining how the actors and systems translate policy into action through the use of the IOPs.

WS 5510 Warfare Studies**3 Semester Hours**

The Warfare Studies course introduces students to the canon of military theory, focusing on issues such as the nature of war, the levels of war, the

range of military operations, military strategy, and operational art. It looks specifically at traditional forms of warfare but also examines alternative forms such as guerilla warfare, insurgency, counterinsurgency, and terrorism. Through this study, students apply the lessons of military theory and their understanding of warfare to operational challenges facing both today's and tomorrow's US military.

AP 5510 Airpower Studies

3 Semester Hours

The Airpower Studies course enhances students' understanding of military theory by introducing perspectives on war fighting with specific emphasis on airpower. It looks specifically at the development of airpower and examines the organizations and strategies that have been involved in their employment. In addition, the course analyzes the role these elements might play in future operations.

JF 5510 Joint Forces

3 Semester Hours

The Joint Forces course presents the joint and service doctrinal perspectives that guide joint force commanders and their staffs as they seek to achieve assigned theater security objectives successfully. The course provides an overview of joint force organizational structures, as well as the framework within which joint forces are created, employed, and sustained. It also examines each of the military services, exploring their capabilities and limitations. In addition, the course analyzes the ways in which joint force commanders integrate service and functional combatant command support to achieve success at the operational level of war.

JP 5510 Joint Planning

3 Semester Hours

The Joint Planning course introduces students to the complexities and requirements of joint planning. Throughout the course, students study pertinent doctrine, as well as the joint operation planning process, analyze the challenges joint force commanders face in attaining unified action, and examine ways in which operational art and design are applied to achieve theater objectives. Additionally, the students examine planning considerations as they apply across the range of military operations. The course culminates with students applying what they have learned to create key elements of a campaign plan.

JA 5510 Joint Air Operations

3 Semester Hours

The Joint Air Operations course introduces students to the people, processes, and products involved in planning, directing, and executing joint air

operations in support of joint force commanders' campaign plans. The course focuses specifically on the important role of the joint force air component commander (JFACC), looking at the doctrinal responsibilities of that position, as well as the actors, processes, and products that comprise the JFACC's air and space operations center (AOC). Equipped with this understanding, students will analyze the employment of air and space power across the full range of military operations.

CS 5510 Regional/Cultural Studies**3 Semester Hours**

The Regional/Cultural Studies course uses case studies from five different regions. The course introduces cultural contextual factors and provides a framework in which students will discuss how culture motivates behaviors within the international security environment. The course enables students to grasp the important role that cultural competence plays in determining operational success. Students discover the unique ways in which their own cultural perspectives influence both their outlook and interaction with other societies. Through this experience, students come to understand the unique security challenges and opportunities posed by culture and how best to respond to ensure success.

RE 5612 Research/Electives I**3 Semester Hours**

The Research/Electives I program complements ACSC's core curriculum, providing an opportunity for students to investigate topics of particular interest in a rigorous fashion under the direction and guidance of a subject-matter expert. Through this program, students develop their ability to define an issue succinctly; conduct thoughtful, logical, and critical research and analysis; and create well-supported conclusions and recommendations of potential benefit to today's war fighters.

RE 5613 Research/Electives II**3 Semester Hours**

The Research/Electives II program complements ACSC's core curriculum, providing an opportunity for students to investigate topics of particular interest in a rigorous fashion under the direction and guidance of a subject-matter expert. Through this program, students develop their ability to define an issue succinctly; conduct thoughtful, logical, and critical research and analysis; and create well-supported conclusions and recommendations of potential benefit to today's war fighters.

EI 5510 Embassy Immersion Program**6 Semester Hours**

The Embassy Immersion Program is a special course taken in lieu of two of the core courses. It is designed to increase officers' interagency coordination capabilities within the Expeditionary Air Force. Students will utilize the prerequisite ACSC language course and research paper as well as a one-week interagency trip to Washington, DC, to prepare for a five-week-long temporary duty in a US embassy abroad. During their time at the embassies, students will work host-nation issues within the political sections. Students will also attend country team meetings to see how an ambassador runs his or her interagency team to carry out US policies in that country. The program cultivates a fundamental understanding of the embassy functions, environment, actors, and issues that support our national security objectives. It also provides career-broadening education, equips students with a solid foundation of embassy affairs, and provides the knowledge to critically examine current and future political-military operations and their application at the strategic and operational levels. After returning from the embassy, each student is required to turn in a paper and give a presentation about his or her embassy immersion experience.

GE 5510 Gathering of Eagles**Noncredit**

The Gathering of Eagles (GOE) is a unique course that stimulates the study of air and space history. While at ACSC, the Eagles gather with students and participate in teaching interviews. These interviews allow students to understand their heritage and learn lessons about air and space leadership from those who shaped it. Research conducted by students in the GOE Research Seminar forms the basis for the content of this course.

Other Programs and Activities

The Air Command and Staff College conducts several activities that support the resident core curriculum and enrich the experience of its students and their families during the academic year. These programs are listed below.

Cross-Domain Operational Strategist Concentration. The Cross-Domain Operational Strategist Concentration is an advanced program open to a limited number of select students that introduces students to challenges associated with planning and executing operations across domains. The concentration explores the conceptual frameworks shaping campaigns and operations

across six domains (air, land, sea, space, electromagnetic spectrum, and human) at the operational level of war.

Commandant's Speaker Series. These special presentations enhance the resident curriculum by giving students and faculty the opportunity to interact with distinguished leaders and experts across political, economic, and military environments. Speakers, past and present, include members of Congress, ambassadors, and top civilian and military leaders in the DOD.

International Officer Program. International officers have attended ACSC annually since 1946. During its history, the college has graduated more than 2,600 international officers from approximately 100 nations. Before attending this college, international officers attend a six-week preparatory course conducted jointly by the International Officer School (IOS) and ACSC. This course increases the officers' ability to speak and understand the English language while familiarizing them with the US Air Force organization and mission. During their stay, international officers participate in field trips that supplement the curriculum objectives.

Embassy Immersion Program. Students enrolled in ACSC's Political-Military Affairs Strategist elective course may apply for the Chief of Staff of the Air Force (CSAF) Political Advisor (POLAD) Embassy Immersion Program. Selected students, currently seven to 10 from each class, are assigned by the CSAF/POLAD to work on the civilian side of US embassies and missions and in the Department of State for five weeks during the spring semester. The students are matched with countries by the SAF/POLAD. They are deployed in the spring of the academic year, and after their return, they submit a short paper and give a briefing about their experience.

Athletic Program. The ACSC athletic program is designed to improve the quality of life for students and faculty by creating and sustaining an environment that promotes personal health, fitness, and professional growth. The program helps personnel to pass the fitness test on their first attempt and to instill a program that combines social interaction and team building with healthy competition. The athletic program includes competitive seminar and intramural sports. It also includes mandatory participation in school-scheduled sports activities by all 40 flights. Students and faculty compete in base intramural activities as well. They are required to engage in personal fitness/aerobic activities at least three times each week. ACSC conducts annual fitness testing in accordance with AFI 10-248, *Air Force Fitness Program*.

Spouse Program. The Spouse Program helps to integrate resident student spouses into the ACSC experience. It offers many opportunities for spouses to learn, grow, and share this experience with students and faculty. In addition to various social events, this program acquaints spouses with the college's academic requirements, increases their awareness of current events and DOD issues, and provides opportunities for their personal growth and development. Participation is completely voluntary, and the spouses determine the program's scope and direction.

Master of Military Operational Art and Science Degree

Online Master's Program

Air Command and Staff College

Internet Address

<http://www.au.af.mil/au/dlmasters.asp>

Program Description. The curriculum is designed to produce more effective officers serving in operational-level command or staff positions. The program fosters the development of higher-order thinking by challenging students to think critically about applying airpower in joint campaign planning at the operational level of war.

All three concentrations are separate from ACSC's traditional distance learning program. They are not an addendum to it. The OLMP curriculum covers such topics as contemporary Air Force operations, national security, leadership, and joint warfare challenges and opportunities. Due to the level of work required, new students are allowed to take only one course each term; however, they may be approved to take two courses each term after they have successfully completed their first three courses. Each course requires 10 to 15 hours of work per week. Tuition is free, and there is no active-duty service commitment associated with the program; however, students incur the cost of required books, personal computer, and Internet connectivity.

Students who work steadily should complete their master's degree in two years; however, students have up to five years to meet degree requirements. Due to the inherent flexibility of the program, student deployments, unique duty schedules, and job or personal demands while enrolled can be easily managed. Students can manage their course schedules to coincide with personal/professional commitments.

The courses are hosted on the Blackboard learning management system and are facilitated by adjunct instructors who have been selected, trained, reviewed, and credentialed by ACSC. Assessments are submitted online, and confidential instructor feedback is returned to students to assist them in improving both their understanding of course materials and their communication skills.

Upon successful completion of the program, students earn an accredited master's degree in military operational art and science. The program was reviewed by the joint staff and received full JPME Phase I accreditation. More importantly, students can participate in a learning opportunity that is focused directly upon the needs of the modern war fighter—gaining knowledge and developing skills that will serve them in their current positions, throughout the remainder of their military careers, and once they leave the military.

Faculty. The college employs a blend of expert faculty members exceptionally qualified to accomplish its mission and goals. The college's unique mission requires a distinctive mix of faculty qualifications and credentials. Traditional civilian academics provide the depth and breadth of subject-matter expertise to guarantee the academic rigor of the college's offerings while simultaneously ensuring adherence to validated pedagogical theory and practice. Military officers contribute critical military and operational perspectives, as well as unparalleled currency and expertise, to the subject matters addressed.

Learning Outcomes. The ACSC Online Master's Program produces graduates who are able to

- lead and command in complex, dynamic, and ambiguous operational environments,
- apply military theory in general and airpower theory in particular to operational problems across the range of military operations,
- plan for the integration and employment of joint forces at the operational level in whole-of-government operations across the spectrum of war and conflict,

- articulate capabilities and limitations of service and joint organizations in the conduct of war at the operational level, and
- apply research methodologies and critical-thinking skills to analyze issues of concern to the war fighter and/or broader defense community.

Duration. The academic program consists of 11 eight-week courses (seven core courses and four concentration courses) for a total of 33 semester hours of credit. Students have up to five years from the start date of their first course to complete the program. Although the typical student can complete the program in about two years, the program's rigor requires a significant time commitment to meet that goal.

Joint Warfare Concentration. The Joint Warfare Concentration is specifically designed to prepare majors for the increased leadership and joint duty responsibilities they will face as they progress through their careers in the USAF. Graduates of this concentration will receive credit for IDE, JPME Phase I, and a master of military operational art and science degree.

Eligibility

- **Military:** Eligible personnel include O-4-selects and O-4s on active duty or in the AFR and ANG. Individuals who have a master's degree or who have completed IDE—to include ACSC—may apply. Individuals who have previously completed *both* a master's degree *and* IDE are ineligible.
- **Civilians:** Air Force civilians in grades GS-12 and GS-13 may be competitively selected to enroll in the program. Air Force civilians should contact their local civilian personnel office if interested in consideration.

Leadership Concentration. This concentration is specifically designed to prepare captains for the leadership responsibilities they will face as they progress through their careers in the USAF. The academic program consists of 11 courses (seven core and four concentration) for a total of 33 semester hours of credit. Students graduating from the leadership concentration will receive the master of military operational art and science degree and get a jump-start on their PME requirements.

Eligibility. Eligible personnel include only USAF active duty O-3s who

- have total active federal commissioned service of six or more years,

- have completed SOS (resident or nonresident), and
- do not have a master's degree.

Operational Warfare Concentration. The Operational Warfare Concentration is specifically designed to award 12 credit hours in operational warfare credit toward the OLMP program once students have completed the online application, are admitted to the program, and have completed the seven core courses. Students graduating from the operational warfare concentration will receive the master of military operational art and science degree and get a jump-start on their PME requirements.

Eligibility. Eligible personnel include only USAF active duty O-3s who

- have total active federal commissioned service of six or more years,
- have completed SOS (resident or nonresident),
- do not have a master's degree, and
- are post-Jan 2009 graduates of the Air Force Weapons Instructor Course (WIC).

Admission Requirements

- **Military:** Students can access enrollment information through the Air University Portal. Before applying, students must ensure military records accurately reflect current educational level. Refer to the Air Force Personnel Center website's education and training link to do so. Students must confirm that the education data accurately reflects all degrees earned. If it does not, contact AFIT/RRC (DSN 785-6234) to update this information.
- **Civilians:** Applicants must scan and e-mail a completed AF Form 4059, Air Force Civilian Competitive Development Nomination, to the AFPC/DPIF Leadership Development group box (can be found in the global). The AF 4059 form must be signed by the applicant's first-level supervisor, and the endorser signature should be the second-level supervisor, although the signature level should not exceed the GS-15/colonel level. If the second level is higher than a GS-15/colonel, the first-level supervisor should endorse it. If you have any questions, please contact AFPC/DPIFA at DSN 665-2524 (210-565-2524) or contact your functional career field team (CFT).

Graduation Requirements. To earn the master of military operational art and science degree, students must successfully complete student orientation and the 33-semester-hour program, earning a grade of “C” or higher on each academic course with an overall GPA of 3.00 on a 4.00 scale.

Note: Students failing to meet the graduation requirements above may, on a case-by-case basis, receive a program diploma but will not be awarded the master’s degree. To be eligible for diploma consideration, students must, at a minimum, complete the seven core curriculum courses (AP 5510, LC 5510, JA 5510, JF 5510, JP 5510, NS 5510, WS 5510).

OLMP Courses

| MAULDR010 Leadership Concentration Courses | Semester Hours |
|---|-----------------------|
| OC5510 Orientation Course | Noncredit |
| LW5510 Leadership and Warfare | 3 |
| AP5510 Airpower Studies | 3 |
| NS5510 International Security Studies | 3 |
| WS5510 Warfare Studies | 3 |
| CS5510 Regional/Cultural Studies | 3 |
| RE5610 Research/Electives I | 3 |
| RE5611 Research/Electives II | 3 |
| EL5301 Expeditionary Leadership in Intercultural Environments | 3 |
| FO5301 Foundations of Officership | 3 |
| OL5301 Organizational Leadership | 3 |
| TL5301 Team Building Leadership | 3 |
| Total | 33 |

| MAUWIC010 Operational Warfare Concentration | Semester Hours |
|--|-----------------------|
| OC5510 Orientation Course | Noncredit |
| LW5510 Leadership and Warfare | 3 |
| AP5510 Airpower Studies | 3 |
| NS5510 International Security Studies | 3 |
| WS5510 Warfare Studies | 3 |
| CS5510 Regional/Cultural Studies | 3 |
| RE5610 Research/Electives I | 3 |
| RE5611 Research/Electives II | 3 |
| OW5302 Operational Warfare Studies* | 12 |
| Total | 33 |

*Note: OW5302 will not be awarded until all other academic courses are completed.

Course Descriptions

| MACSC010 Joint Warfare Concentration Courses | Semester Hours |
|---|-----------------------|
| OC5510 Orientation Course | Noncredit |
| LW5510 Leadership and Warfare | 3 |
| AP5510 Airpower Studies | 3 |
| NS5510 International Security Studies | 3 |
| WS5510 Warfare Studies | 3 |
| CS5510 Regional/Cultural Studies | 3 |
| RE5610 Research/Electives I | 3 |
| RE5611 Research/Electives II | 3 |
| LC 5510 Practice of Command | 3 |
| JF5510 Joint Forces | 3 |
| JA5510 Joint Air Operations | 3 |
| JP5510 Joint Planning | 3 |
| Total | 33 |

OC 5510 Orientation Course

Noncredit

The Orientation Course provides an overview of the entire online master's degree program—including US Air Force educational methodologies, policies, curriculum, and research requirements—and key principles and concepts that students will encounter throughout their academic experience. The course includes an introduction to small-group dynamics, communication and critical-thinking skills, the technology employed within the program, student responsibilities and requirements, and additional services that are available to enhance student success.

LW 5510 Leadership and Warfare

3 Semester Hours

The Leadership and Warfare course analyzes factors that guide military leaders' actions in establishing and maintaining an effective leadership environment. The course also seeks to educate and inspire students to reach their full leadership potential by studying great commanders and their conduct of warfare and current problems of command in contemporary joint operations. Through these studies, students gain a unique understanding of the specific leadership challenges that leaders face in guiding people and organizations through crises and environments of change.

AP 5510 Airpower Studies

3 Semester Hours

The Airpower Studies course enhances students' understanding of military theory by introducing perspectives on war fighting with specific emphasis on

airpower. It looks specifically at the development of airpower and examines the organizations and strategies that have been involved in their employment. In addition, the course analyzes the role these elements might play in future operations.

NS 5510 International Security Studies **3 Semester Hours**

The International Security Studies course provides a foundation for understanding the international security environment, its implications for the United States, and how the United States both shapes and responds to this environment. The course examines the instruments of power (IOP) and how these are wielded by both state and nonstate actors to affect the international environment. In addition, the course examines the US national strategic decision-making process, examining how the actors and systems translate policy into action through use of the IOPs.

WS 5510 Warfare Studies **3 Semester Hours**

The Warfare Studies course introduces students to the canon of military theory, focusing on such issues as the nature of war, the levels of war, the range of military operations, military strategy, and operational art. It looks specifically at traditional forms of warfare but also examines such alternative forms as guerilla warfare, insurgency, counterinsurgency, and other forms of warfare. Through this study, students apply the lessons of military theory and their understanding of warfare to operational challenges facing both today's and tomorrow's US military.

CS 5510 Regional/Cultural Studies **3 Semester Hours**

The Regional/Cultural Studies course introduces students to regional and cultural factors and discusses how these factors motivate actors within the international security environment. Through this course, students grasp the important role of culture in determining operational success. Students are also exposed to the unique ways in which their own cultural perspectives influence both their outlook and interaction with other societies. Through this experience, students come to understand the unique security challenges and opportunities posed by culture and how best to respond to ensure success.

RE 5610 Research/Electives I **3 Semester Hours**

The Research/Electives I course complements ACSC's core curriculum, providing an opportunity for students to begin investigating topics of particular

interest in a rigorous fashion under the direction and guidance of a subject-matter expert. Through this program, students develop their ability to define an issue succinctly; conduct thoughtful, logical, and critical research and analysis; and create well-supported research proposals that will serve as the intellectual basis for the scholarly research papers produced in Research/Electives II.

RE 5611 Research/Electives II**3 Semester Hours**

The Research/Electives II course complements ACSC's core curriculum, providing an opportunity for students to complete investigating topics of particular interest in a rigorous fashion under the direction and guidance of a subject-matter expert. Through this program, students refine their ability to define an issue succinctly; complete thoughtful, logical, and critical research and analysis; and synthesize well-supported conclusions and recommendations that serve as the foundation for a scholarly research paper of potential benefit to today's war fighters. Research/Electives I (RE 5610) is a prerequisite for this course.

LC 5510 Practice of Command**3 Semester Hours**

The Practice of Command course provides an opportunity for students to reflect on their personal philosophy on the art and craft of command, honing that philosophy through interaction and the study of responsibilities and challenges unique to commanding an Air Force squadron. The course introduces students to the resources available to assist squadron commanders with their duties. It also stresses the importance of commanders melding their personal philosophies on command, the unique requirements of their situation, and their responsibilities to service, mission, people, and themselves.

JF 5510 Joint Forces**3 Semester Hours**

The Joint Forces course presents the joint and service doctrinal perspectives that guide joint force commanders and their staffs as they seek to achieve assigned theater security objectives. The course provides an overview of joint force organizational structures and the framework within which joint forces are created, employed, and sustained. It examines each of the military services, exploring their capabilities and limitations. In addition, the course analyzes the ways in which joint force commanders integrate service and functional component command support to achieve success at the operational level of war.

JA 5510 Joint Air Operations**3 Semester Hours**

The Joint Air Operations course introduces students to the people, processes, and products involved in planning, directing, and executing joint air operations in support of joint force commanders' campaign plans. The course focuses specifically on the importance of the JFACC, looking at the doctrinal responsibilities of that position and the actors, processes, and products that comprise the JFACC's air operations center. Equipped with this understanding, students analyze the employment of air and space power across the full range of military operations. Joint Planning (JP 5510) is a prerequisite for this course.

JP 5510 Joint Planning**3 Semester Hours**

The Joint Planning course introduces students to the complexities and requirements of joint planning. Through the course, students study pertinent doctrine and the joint operation planning process, analyze the challenges joint force commanders face in attaining unified action, and examine ways in which operational art and design are applied to achieve objectives. Additionally, students examine planning considerations across the range of military operations. The course culminates with students synthesizing what they have learned to create key elements of a campaign plan. This course is a prerequisite to the Joint Air Operations (JA 5510) course.

EL 5301 Expeditionary Leadership in Intercultural Environments**3 Semester Hours**

The Expeditionary Leadership in Intercultural Environments course provides an understanding of regional factors that affect national foreign policy and explores global, regional, and cultural issues associated with participating in joint and coalition operations. It stresses the importance of cultural awareness and intercultural competence when dealing with the peoples of regions likely to require US military assistance. The course also examines deployment-specific leadership issues focusing on the warrior ethos, including mental and physical preparation, military bearing, and self-discipline.

FO 5301 Foundations of Officership**3 Semester Hours**

The Foundations of Officership course addresses followership, regarded as a critical element of leadership and officership, followed by an examination of skills related to effective spoken and written communication in the context of the twenty-first-century Air Force. Through this course, students develop broad perspectives of current issues and associated tools aimed at enhancing

professional competence beyond individual specialties; increase their value to their units by understanding and being able to apply interoperability; develop skills necessary to lead, follow, and manage; and become better wingmen who care for peers and subordinates alike.

OL 5301 Organizational Leadership

3 Semester Hours

The Organizational Leadership course is designed to develop officer organizational and management skills to better support and lead change in complex institutional structures. The course focuses on basic organizational theory and communications, change management, strategies for continuous improvement, and resource stewardship. It enhances officers' ability to deal with the financial, informational, technological, and human resource issues that may affect mission capabilities, while utilizing appropriate methods to identify opportunities, implement viable solutions, and measure the impact of outcomes. Further, this course advocates a commitment to continuous improvement—necessary to ameliorate processes, products, and people—while meeting the needs of internal and external stakeholders to accomplish Air Force mission requirements efficiently.

TL 5301 Team Building Leadership

3 Semester Hours

The Team Building Leadership course examines command from the perspective of officers in formal leadership billets. The course explores building leaders, motivation, force development, mentoring, organizational design and decision making, power and authority, morality and ethics, leading change, organizational culture, and communication. It examines the composition, function, and purpose of the flight in the context of the roles, responsibilities, knowledge, skills, and attitudes expected of officers in leadership positions. Academic content and practical examples are integrated with activities from operational fields to leverage officers' education, training, and experience to equip them with new or enhanced skill sets, including the ability to inspire, develop, and take care of diverse groups of individuals while leading them to mission success.

OW 5302 Operational Warfare Studies

12 Semester Hours

The Operational Warfare Studies concentration provides students credit for academic and practical instruction accomplished during completion of the Air Force's Weapons Instructor Course. OW 5302 credit will not be awarded until all other OLMP academic courses are completed.

Master of Science in Flight Test Engineering

USAF Test Pilot School

Internet Address

<http://www.edwards.af.mil/library/factsheets/factsheet.asp?id=6467>

Program Description. A typical day at the Test Pilot School (TPS) includes a combination of flying and academics. For the academics portion, there are four main subdisciplines taught by the USAF TPS Education Division: performance, flying qualities, systems, and test management. To assist in their studies at TPS, students are issued 18 bound and stamped textbooks for their use. Students also receive a notebook computer and accessories for use during the course. The USAF TPS portal is the online access point for students and staff for the entire curriculum taught at TPS. Housed on the portal are the most current slides for lectures, flight cards, virtual drop boxes for reports, and many other resources. The USAF TPS offers two classes each year.

Learning Outcomes. Graduates of TPS should have a thorough grounding in the following core competencies:

- Diverse aerospace vehicle exposure. The graduate will have flown different types of aerospace vehicles and flown/monitored various operational tasks to ensure a solid fundamental understanding of a broad range of military missions using rapid adaptability or unfamiliar aerospace vehicles and systems.
- Flight test engineering. The graduate will have sufficient math, science, and engineering skills to evaluate aerospace vehicle, system, and munitions design and apply academic theory, flight-test techniques, and modeling and simulation to successfully determine the specification compliance and military utility of the system under test.
- Flight test techniques (FTT). The graduate will be able to select, develop, understand, and execute the appropriate FTT to achieve a test objective.
- Flight test planning. The graduate will be able to comprehend and apply the test-management process to effectively plan and execute a flight test to include how to access and efficiently allocate test resources.

- Safety planning and risk management. The graduate will be able to consistently apply a test-safety process for identifying test-unique hazards and developing procedures to mitigate risk.
- Flight test execution. The graduate will be able to safely, effectively, and efficiently conduct a mission as part of a test team either on board the aircraft or in the control room.
- Data management. The graduate will be able to collect and analyze the data required to determine if an airplane or system meets mission requirements and/or specifications and the type, quantity, accuracy, and precision of the data required; how the data is to be collected and used; and the type of data analysis to be used.
- Flight test evaluation. The graduate will be able to apply knowledge and skills gained through critical thinking by analyzing, synthesizing, and evaluating test results to reach substantiated conclusions and recommendations.
- Flight test reporting. The graduate will be able to effectively communicate in written, oral, and graphical form to clearly document test and safety planning and test accomplishments and deficiencies and to assess their mission impact.
- Integrated test teaming. The graduate will have an understanding of the acquisition life cycle and know where test and evaluation (T&E) fit into the process; know how to apply governing regulations, directives, and requirement processes for developing a test program; and know how to build an integrated, multidisciplinary test team of development and operational personnel from the military, government, and contractors.

Faculty. TPS faculty members hold a master's, a doctoral, or an equivalent degree in their fields of academic expertise. The breadth, depth, and diversity of their expertise are enhanced by the fact that the faculty includes terminally credentialed field-grade or senior officers and civilian scholars.

Duration. 48 weeks.

Eligibility. The following are the current requirements enrollees must meet to be eligible for a slot at the USAF TPS.

Table 1. Eligibility Requirements for Curricula.

| Curricula | Time in Service (at class entry) | Education | Experience (at class entry) | Physical Qualification | Clearance |
|--|---|--|--|-------------------------|-----------|
| Experimental test pilot | Active: TAFCS (Guard and Reserve: TFCS) Fewer than 9 years and 6 months (10 years and 3 months for helo pilots) | BS in engineering, mathematics, or physics (see paragraph F for other acceptable degrees and required remediation). Minimum GPA of 3.0 on a 4.0 scale. | Pilots on extended active duty (EAD) and not in suspended flying status. Minimum of 12 months as an aircraft commander in a manned major weapon system (MWS). Pilots must also be either qualified IPs in their manned MWS or 1. Single pilot MWS—at least 750 hrs total time 2. Dual pilot MWS—at least 1000 hrs total time Note: 250 hrs of manned non-MWS time may be included in total time. | Annual flying class II | Secret |
| Experimental test combat systems officer | Fewer than 9 years and 6 months | Same as above | Combat systems officers must be qualified instructor CSOs in an MWS or have at least 500 hours total time in their MWS. Total time excludes student time. | Annual flying class II | Secret |
| Experimental test RPA pilot | Fewer than 9 years and 6 months | Same as above | RPA pilots must be qualified instructor in their RPA MWS or have at least 750 hours total time. Note: 250 hours in a manned MWS may be included in the total time. | Annual flying class II | Secret |
| Experimental flight test engineer | Active: TAFCS (Guard and Reserve: TFCS) Fewer than 8 years | Degree requirements same as above. Technical master's degree is highly desired. | On EAD with a minimum of 2 years experience in one of the following AFSCs: 13XX, 14NX, 21AX, 21CX, 21LX, 21MX, 33SX, 61SX, 62EX, or 63AX (Civilians: minimum 2 years experience in T&E). FAA flying certifications or military flying is highly desired. | Annual flying class III | Secret |
| Short Courses | <i>(Eligibility is determined independently for each short course.)</i> | | | | |

Note: The term *combat systems officer* includes rated navigators, electronic warfare officers, and weapon system operators.

Admission Requirements. Admission to the USAF TPS is extremely competitive. In addition to Air Force personnel, civilian, Navy, Marine Corps, and allied nation personnel are encouraged to apply for these programs. Refer to AFI 99-107, *Test Pilot School*, for application details.

Graduation Requirements. The USAF TPS curriculum is designed to grant a master of science degree in flight test engineering at the end of a 48-week course. Students are required to take the 13 offered courses to graduate. This is a total of 50 credit hours for the 48-week course. Each of the four phases consists of three or four main lecture courses. Along with these courses, there are allocated laboratories or simulator work and flights. A student must be in good standing and satisfactorily complete all academic tests, oral and written reports, and curriculum flying missions and complete the comprehensive written and oral evaluations. Students must achieve a grade of “C” or higher on each academic course with an overall GPA equal to 3.0.

Syllabus

| Course Number and Title | Semester Hours |
|---|----------------|
| PF 6000 Fixed-Wing Aerodynamics | 3 |
| PF 7000 Performance Data | 3 |
| PF 8000 Performance Optimization | 3 |
| FQ 6000 Aircraft Flight Mechanics | 4 |
| FQ 7000 Flight Control Systems | 4 |
| FQ 8000 Handling Qualities | 4 |
| FQ 9000 Envelope Expansion | 4 |
| SY 6000 Human Factors and Avionics | 3 |
| SY 7000 Airborne Sensors | 3 |
| SY 8000 Systems Evaluation | 3 |
| TM 6000 Test Planning and Reporting | 4 |
| TM 9000 Test Management Project and Comprehensive Exams | 9 |
| QE 5100 Qualitative Evaluation Program | 3 |
| Total | 50 |

Course Descriptions

PF 6000 Fixed-Wing Aerodynamics **3 Semester Hours**

This course contains academic theory lectures for introduction to aerodynamics, compressible aerodynamics, and cruise performance. This theory is the basis of flight and aerodynamics for fixed-wing aircraft. The flight-test techniques included in this course are mission director, aerodynamic modeling, cruise data, fighter performance check ride, and high and low lift-over-drag ratio.

PF 7000 Performance Data **3 Semester Hours**

This course consists of pilot statistics, modeling and simulation, and propulsion. These courses form the basis for atmosphere-measuring devices on aircraft and different thrust-generating devices for aircraft. The flight-test techniques for this course consist of tower fly-by, pacer/survey/global positioning system (GPS), and the propulsion demonstration.

PF 8000 Performance Optimization **3 Semester Hours**

This course consists of takeoff, landing, and energy. These areas demonstrate the equations needed for normal flight and departure from flight. The flight-test techniques for this course consist of takeoff and landing, C-12 level accelerated/turn, level accelerated/saw tooth climb, turn performance, and multiengine performance final check ride.

FQ 6000 Aircraft Flight Mechanics **4 Semester Hours**

This course consists of unaugmented equations of motion, trim, and stability. It provides a basic overview of the flying qualities of flight testing. The flight-test techniques for this course include C-12 longitudinal static stability/maneuvering flight demonstration, LJ-24 variable stability system (VSS) introduction and longitudinal demonstration, C-12 lateral-directional stability, LJ-24 VSS lateral-directional demonstration, and T-38 dynamics demonstration.

FQ 7000 Flight Control Systems **4 Semester Hours**

This course consists of an introduction to flight control systems, parameter estimation, analog flight control systems, aero/servo/elasticity, criteria for flight control system design, frequency content, aliasing and filters, frequency response estimation, digital flight control systems, redundancy management systems, flight control systems ground testing, and flight test

simulators. This course demonstrates the origins and history of flight control systems. The flight-test techniques include a variable-stability in-flight simulator test aircraft (VISTA) handling-qualities demonstration. The lab-test techniques for this course include the flight control system project and the flying qualities simulator.

FQ 8000 Handling Qualities**4 Semester Hours**

This course consists of stall, departure, and spin failure state (engine out) tests. It demonstrates the qualities and testing of an aircraft departing from normal, straight, and level flight. The flight-test techniques for this course consist of glider spin demonstration, T-38 stall demonstration, T-38 handling qualities demonstration, C-12 engine out demonstration/data, KC135 engine out demonstration/data, F-16 departure demonstration, F-16 departure data, and T-38 departure chase.

FQ 9000 Envelope Expansion**4 Semester Hours**

This course consists of an overview of flying qualities testing, configurations for flying qualities testing, taxi testing, first flight flying qualities testing, flying qualities envelope expansion testing, handling qualities evaluation, one-flight evaluations of flying qualities, stores certifications, and structures. It previews the types of flying accomplished during a typical test program. The flight-test techniques consist of F-16 limit cycle oscillation, multiengine flying qualities demonstration, KC-135 ground school, glider flying qualities demonstration, C-12 first flight check ride, F-16 handling qualities demonstration, F-15 check flight phase (CFP)/asymmetric stores demonstration, AT-38B CFP check ride, and F-16 structures check ride.

SY 6000 Human Factors and Avionics**3 Semester Hours**

This course consists of the systems phase introduction, human factors, integrated navigation systems, communications and data link systems, avionics systems integrations (ASI), and remotely piloted aircraft (RPA) lectures. It demonstrates different systems within the cockpit and how their design is tested. The flight-test techniques for this course include the F-15E systems demonstration. The lab-test techniques in this course consist of the avionics systems integration lab and the integration facility for avionics system testing (IFAST) lab. Also, within this course is the F-15E systems ground school.

SY 7000 Airborne Sensors**3 Semester Hours**

This course consists of the electro-optics lecture and the radar lecture. It demonstrates different sensor systems used in modern-day warfare. The flight-test techniques for this course consist of F-16C/D electro-optics and the F-16D (or VISTA) air-to-air systems evaluation. The lab-test techniques in this course consist of the electro-optics lab and the IFAST Radar. Also, within this course is the F-16C/D electro-optics systems academics/ground school.

SY 8000 Systems Evaluations**3 Semester Hours**

This course consists of the electronic warfare lecture, the weapons delivery testing lecture, the F-16C/D air-to-ground lecture, the smart weapons air-to-air lecture, the smart weapons air-to-ground lecture, and the weapons and tactics overview lecture. This course demonstrates different weapons systems and the test of their delivery for modern warfare. The flight-test techniques for this course consist of electronic combat testing, F-16 weapons delivery demonstration, and the F-16D systems evaluations check ride.

TM 6000 Test Planning and Reporting**4 Semester Hours**

This course consists of the test management phase introduction, probability and statistics, test conduct, intermediate test and evaluation, test management, unit safety officer training, test article modification planning, design of experiments (DOE), all-weather testing, deficiency reports, and executive test and evaluation. These courses demonstrate the proper planning and execution procedures for flight testing. Also, this course contains the USAF TPS reports program, initial flight reports, technical report formatting, and the DOE project.

TM 9000 Test Management Project and Comprehensive Exams**9 Semester Hours**

The test management projects are customer-funded flight-test projects performed by teams of four to six students with guidance from the USAF TPS staff. The customer provides the research concept or the part that is to be flight-tested and funds specialized support of major aircraft modifications. The USAF TPS provides the test aircraft, which are normally Air Force flight test center assets. The USAF TPS also funds minor aircraft modifications and the cost for flight hours of testing and evaluations. Using flight-test data, USAF TPS students reduce the data, conduct data analysis, and provide a

defense technical information center-ready technical report for the customer at the end of the process.

The comprehensive written test is a closed-book four-hour exam. Each subdivision is allocated an hour of the exam, in which the master instructors can ask about all related material the students have seen over their time at the USAF TPS.

The comprehensive oral test is a panel examination of the individual students to ensure their comprehension of test principles and concepts. A panel of four to five USAF TPS faculty presents the students with a possible test scenario. The students must then develop a test concept and defend it to the panel.

QE 5100 Qualitative Evaluation Program

3 Semester Hours

As future flight testers, USAF TPS students must graduate with a broad range of knowledge of flying and testing aircraft. An important part of the USAF TPS curriculum is the qualitative evaluation program. Throughout the USAF TPS course, students are given the opportunity to fly and test several types of aircraft. They learn to apply basic flight test and data collection techniques to investigate unique aircraft attributes in unfamiliar aircraft. The “final exam” for the qualitative evaluation program is the capstone qualitative evaluation. Students use their experience from previous qualitative evaluations for a more detailed investigation over one or two flights in an unfamiliar aircraft. Students select their own flight test techniques based on what they have learned at the USAF TPS to properly evaluate qualitative and quantitative flight test data with respect to aircraft type and mission.

Additional Programs

Field Trip. Students visit other bases to perform qualitative evaluations on the F-15D Eagle, F-15E Strike Eagle, SH-60 Seahawk, F/A-18 Hornet, U-2, A-10, and other aircraft not available at Edwards AFB, CA. Students also may visit a foreign test center to perform qualitative evaluations on their available aircraft. Foreign test centers visited in the past include those located at Empire Test Pilot School (Boscombe Down, United Kingdom) and Ecole du Personnel Navigant d'Essai et de Reception/School (France), and in Italy, Brazil, India, Germany, Spain, and Sweden.

AIR UNIVERSITY

UNDERGRADUATE PROGRAMS

Air University undergraduate degree programs are provided by the Community College of the Air Force (CCAF) located at Maxwell AFB-Gunter Annex, AL. The CCAF serves the educational needs of the Air Force enlisted community by offering associate in applied science degrees and other credentialing programs that enhance mission readiness, contribute to recruiting, assist in retention, and support the career transitions of Air Force enlisted members. It is the only federally chartered institution in the United States that awards college degrees solely to enlisted personnel. CCAF awards undergraduate credit for Air Force technical training and enlisted professional military education (PME) courses that may be applied toward an associate in applied science degree program.

The college received degree-granting authority in July 1976 and awarded its first associate in applied science degrees in April 1977. From 1980 to 2004, the college was separately accredited by the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC) (1866 Southern Lane, Decatur, GA 30033-4097, telephone number: [404] 679-4501) to award the associate's degree. The college is now accredited through Air University by the SACSCOC.

The college functions as a single institution with respect to credit documentation, records, and educational program management. The detailed listing and description of each CCAF degree program is available in the separate CCAF *General Catalog*, published every three years and available online at <http://www.au.af.mil/au/ccaf/>.

Transcripts reflecting course completions and awarded credit are provided by CCAF and can be ordered online free of charge through the CCAF website at <http://www.au.af.mil/au/ccaf/transcripts.asp>. To ensure compliance with the Privacy Act of 1974 to protect the confidentiality and integrity of student records, students may order only their own transcripts.

Enlisted Professional Military Education Instructor Course

Internet Address

<http://www.au.af.mil/au/barnes/>

Program Description. The Enlisted Professional Military Education Instructor Course (EPMEIC) is CCAF affiliated and consists of 158 hours of in-residence classes. Each student earns 10 hours of undergraduate credit upon completion of the course.

This course prepares graduates to instruct in EPME schools and academies. It is a rigorous, comprehensive, and fast-paced experiential course that requires extensive reading and writing and moderate research. Major curricular areas include learning theory, communication skills, instructional design, teaching methods, and evaluation. The course provides maximum participation in learning. The majority of class time is devoted to small-group activity. Students write level-of-learning objectives, develop rating scales, and create test items. They must write well and create test items using interactive methods and master-selected academic content areas. The instructional methods include an informal lecture, guided discussion, a case study, and experiential instruction. Students develop the critical-thinking skills involved in teaching interactive lessons as well as an understanding of the dynamics of learning styles and classroom management.

Learning Outcome. Develop unrivaled EPME instructors who are skilled in interactive teaching methodologies and who have a broad understanding of educational activities as described in the Air Force instructional systems development (ISD) process.

Faculty. EPMEIC faculty must have an associate's degree (or be within one year of completion) and complete the EPMEIC before assignment to EPME instructor positions. EPMEIC faculty must be 1750-series civilians or military, preferably with EPME instructor experience.

Duration. The EPMEIC is delivered in 20 academic days.

Eligibility. Air Force personnel must be selected through an application process to teach EPME schools. Reference AFI 36-2301, *Professional Military Education*, and the Education and Training Course Announcements (ETCA)

website at <https://etca.randolph.af.mil> for additional information. ETCA course number: MESC003.

CURRICULUM SUMMARY

| Instructional Area Titles | Contact Hours |
|---------------------------|---------------|
| Administrative | 6 |
| Educational Foundations | 28 |
| Communication Skills | 4 |
| Methods | 68 |
| Evaluation | 18 |
| Instructional Design | 15 |
| EPME Specific | 19 |
| Total | 158 |

Instructional Area Descriptions

Administrative

6 Contact Hours

The administrative block introduces students to the faculty with whom they will interact. They are informed of the local conditions and safety and security concerns. The staff gathers information for registrar and survey purposes. Structured activity creates a focus on developing teaching skills with emphasis on affective aspects of teaching. This block provides time to conduct graduation and facilitate return of supplies and equipment.

Educational Foundations

28 Contact Hours

Students learn the principles of teaching adults. Since adult learners exhibit a wide range of learning styles, this course explores learning styles, personality types, and cognitive processes. The faculty emphasizes and demonstrates use of preventive techniques that can anticipate numerous problems in the classroom.

Communication Skills

4 Contact Hours

The communication skills block provides the delivery principles necessary to effectively convey educational information and to promote student learning. This block focuses on the structure, organization, and support needed to prepare and to teach lessons efficaciously. Emphasis is placed on proper questioning techniques that are critical for interactive, experiential methods of instruction.

Methods**68 Contact Hours**

Students learn several interactive, experiential methodologies and must teach the lessons they create. The practice teaching (PT) portion of this block permits students to experience real-world classroom dynamics in a safe laboratory environment. Students receive feedback on all PT and lesson plans. They also experience the impact that well-developed lesson plans have on teaching and the criticality of effective questioning in interactive classrooms.

Evaluation**18 Contact Hours**

The evaluation block offers a broad overview of the evaluation process common in education. Students are shown the relationship of feedback to improving student performance and to gauging the effectiveness of the courses. In their seminars, students create rating instruments and use them to evaluate and critique their peers. They construct and analyze multiple-choice test items. The EPMEIC faculty models techniques appropriate for classroom feedback, critiquing, and testing.

Instructional Design**15 Contact Hours**

The instructional design block covers the instructional systems design (ISD) model that is the centerpiece of Air Force education. Other blocks in the EPMEIC reflect the phases and functions found in the ISD model. Such activities as lesson planning and practice teaching illustrate the dynamics of this systems model. Students must learn the ISD process and practice it through various interactive, experiential activities.

EPME Specific**19 Contact Hours**

The EPME-specific block provides the students the opportunity to network with key members of the Barnes Center for Enlisted Education community and representatives of agencies unique to the Barnes Center for Enlisted Education. The information provided by the professionals in this block adds to the commitment of the students to EPME programs and enables the professionals to articulate to their EPME students the importance of their chosen profession and its value to them and their country.

Airman Leadership School

Resident Program

Internet Address

<http://www.au.af.mil/au/barnes/>

Program Description. The Airman Leadership School (ALS) CCAF-affiliated course consists of 192 hours of in-residence classes accredited through SACSCOC. Each student earns 10 hours of undergraduate credit upon completion of the course.

ALS is the critical foundation for EPME and sets the tone for present and future professional development. The program focuses on leadership skills required of supervisors and reporting officials throughout the Air Force. ALS enhances the development of senior Airmen by strengthening their ability to lead, follow, and manage while they gain a broader understanding of the military profession. The student-centered, guided-discussion methodology allows students to share ideas and experiences and work together to achieve various educational objectives in a cohort-designed classroom setting. Formative exercises are an integral part of the ALS curriculum and serve as feedback tools for the student and instructor. Summative objective and performance evaluations are used to determine whether the educational requirements outlined in the program are met. Students must accomplish lesson objectives, including those pertaining to fitness, uniform inspections, and drill and ceremonies using the criteria outlined in the program curriculum.

ALS is conducted at 68 active-duty Air Force bases worldwide and one ANG base located in the United States. More than 350 ALS faculty members facilitate the thorough and rigorous standardized curriculum. The program is student centered, and the curriculum is written in plain language; both are focused on developing students' critical-thinking skills. The prominent instructional methodologies are the guided discussion and the case study. Successful completion of the ALS resident program results in college credit from the CCAF.

Learning Outcomes

- Prepares senior Airmen to supervise and lead work teams
- Prepares senior Airmen to effectively communicate rank-appropriate tasks
- Prepares senior Airmen to exhibit several professional military attributes

Faculty. The ALS faculty is required to have an associate's degree (or fall within one year of completion) and must complete the Enlisted Professional Military Education Instructor Course (EPMEIC) before assignment to an EPME school or academy. Within the first year of teaching, the faculty must complete a 180-hour internship at their respective schools.

Duration. The ALS program is delivered in 24 academic days. Most schools conduct eight classes each year.

Eligibility. As a general rule, students are senior Airmen with 48 months' time in service or a staff sergeant selectee. Students must have a minimum of six months of retainability in the Air Force from the class graduation date. The local military personnel flight works directly with the ALS commandant to ensure only eligible students are selected.

Students are selected based on the eligibility criteria outlined in AFI 36-2301, *Professional Military Education*, and the Education and Training Course Announcements (ETCA) website at <https://etca.randolph.af.mil>. ETCA course number: ZZ41007.

CURRICULUM SUMMARY

| Instructional Area Titles | Contact Hours |
|---------------------------------|---------------|
| Profession of Arms | 32.00 |
| Warfare Studies | 5.00 |
| Leadership Studies | 48.00 |
| International Security Studies | 3.00 |
| Communication Studies | 73.00 |
| Course Capstone Case Study | 4.00 |
| Objective Exercises/Evaluations | 14.00 |
| Collateral Curriculum | 13.00 |
| Total | 192.00 |

Instructional Area Descriptions

Profession of Arms

32 Contact Hours

This course offers a study of the military as a profession and the characteristics of the culture that separate the uniformed service from the society it serves. It focuses on distinctive knowledge, exclusive group coherence, career

structure, and the Airman's role in society. The course also addresses core values, discipline, ethical leadership, dress and appearance, oath of enlistment, drill and ceremonies, emergent leadership issues (substance abuse, sexual assault prevention, wingman concept, etc.), accountability, and the warrior ethos.

Warfare Studies**5 Contact Hours**

This course provides a study of the military instrument of national power. This core area develops an understanding of the nature of war and the art of employing military power across the spectrum of operations. War fighting includes people, roles and missions, doctrine, strategy, force structures, and joint operations, along with the domains of land, sea, air, space, and cyberspace supporting national security objectives.

Leadership Studies**48 Contact Hours**

This course develops and inspires the human dimension from an individual to an organizational level. Broad categories in this area include leadership concepts, supervision skills, evaluation systems, functions of management such as resource stewardship, continuous process improvement, diversity, and group dynamics. In addition, change management, problem solving, followership, team and coalition building, safety, and time management have been included throughout the course.

International Security Studies**3 Contact Hours**

This course develops an understanding of the nature and functioning of the international system and the strategic environment. Broad categories in this core area include contemporary problems and issues and global vigilance. Emphasis is placed on nonmilitary instruments of power and how they affect global, regional, and national security conditions. Global, regional, and cultural awareness is integrated.

Communication Studies**73 Contact Hours**

This course helps students develop an understanding and ability to apply principles of effective communication (speaking, listening, writing, researching, communicating nonverbally, negotiating, and thinking critically). Broad categories in this core area include interpersonal communications, group dynamics, cross-cultural communications, and the attendant processes and networks for communication.

Course Capstone Case Study**4 Contact Hours**

The Capstone Case Study gives students plenty of opportunities to see how concepts and principles they have studied throughout the course apply to simulated situations. In theory, students who demonstrate mastery of course concepts and principles are able to transfer their knowledge to the work center and, thus, with practice become more effective managers and leaders.

Objective Exercises/Evaluations**14 Contact Hours**

A pretest is used as a tool to assess the student's knowledge on lesson principles prior to instruction. Academic Affairs uses the results from this pretest as an indicator of how much learning occurred. The formative exercise presents a series of new problem scenarios to the student. They will make decisions and apply the lesson principles they have learned to these situations. Following the two-hour exercise, the instructor will spend the remaining three hours conducting remediation with the students. The summative evaluation presents a series of new situations designed to evaluate student mastery of principles taught. Following the two-hour evaluation, the instructor will spend the remaining three hours conducting remediation with the students. The summative course retest is for students who failed the summative evaluation. Students who fail to meet the minimum passing score on the retest will have two hours of test remediation prior to the commandant convening an academic review board (ARB) for students who fail the summative course retest. Following the ARB, the students may be given a final chance to meet the academic requirement by taking a two-hour post-ARB retest.

Collateral Curriculum**13 Contact Hours**

The collateral curriculum is time given for the course introduction, student surveys, administration, and commandant time.

Airman Leadership School

Distance Learning Course

Course 00003

Program Description. This CCAF-affiliated course consists of 168 hours accredited through the SACSCOC. Each student earns eight hours of undergraduate credit upon completion of the course.

The program focuses on leadership skills required of supervisors and reporting officials throughout the Air Force. The Airman Leadership Distance Learning Course (ALDLC) program enhances the development of senior Airmen by strengthening their knowledge about leadership, followership, and management while they gain a broader understanding of the military profession. The ALDLC program is a voluntary, paper-based, self-study course administered by AU. The program consists of two sets: set one contains three volumes, and set two contains two volumes. This program is designed to provide professional development to enlisted military members at a specific and critical point in their career. Students must review the AU catalog frequently during their enrollment to ensure compliance with any changes in administrative policies. Two closed-book, end-of-course examinations (one per set) in the ALDLC program are administered at a designated/authorized test control facility located on almost every military base. Successful completion of the ALDLC program results in college credit from the CCAF.

Learning Outcomes

- Provides senior Airmen foundational knowledge of the leadership and management concepts necessary to supervise and lead work teams
- Provides senior Airmen foundational knowledge of the communication skills concepts necessary to effectively communicate rank-appropriate tasks
- Provides senior Airmen foundational knowledge of the profession of arms and military studies concepts necessary to exhibit professional military attributes

Duration. The course consists of a single academic term of 12 months. This enrollment period begins on the date the student enrolls in the course. The

12-month enrollment period includes time required to receive materials, schedule/complete tests, and submit results for scoring/posting. Students may extend their course by 120 days at any time before the end of their 12-month enrollment using options available through their Air University Student Information System (AUSIS) account.

Eligibility

- Active duty personnel are not eligible for enrollment
- Air Force Reserve personnel:
 - E-4 with 48 months of time in service without a 5-level in PAFSC
 - E-4 with 42 months of time in service and a 5-level in PAFSC
- Air National Guard personnel:
 - E-4 with 48 months of time in service without a 5-level in PAFSC
 - E-4 with 42 months of time in service with a 5-level in PAFSC
 - E-5 promoted under deferment policy
- Other US military personnel:
 - E-4 with 42 months of time in service
- Nonmilitary technician civil service personnel:
 - GS-4 or equivalent and above

CURRICULUM SUMMARY

| 0003 Instructional Areas | Contact Hours |
|-----------------------------------|---------------|
| Set One: | |
| Volume 1 Course Introduction | 12 |
| Volume 2 Military Professional | 48 |
| Volume 3 Expeditionary Airman | 27 |
| Set Two: | |
| Volume 1 Supervisory Communicator | 33 |
| Volume 2 Supervisor of Airmen | 48 |
| Total | 168 |

Instructional Area Descriptions

Course Introduction

12 Contact Hours

The Course Introduction is collateral curriculum time given for student orientation and administrative information. The purpose of the course introduction is to establish the foundation for learning the body of theory and specialized knowledge needed to successfully complete the ALDLC. Topics such as successful learning and the course foundation will be covered.

Military Professional

48 Contact Hours

The Military Professional curriculum is a combination of profession of arms and leadership lessons. The purpose of the Military Professional curriculum is to facilitate the development of a cultural mind-set driven by the role of Air Force staff sergeants as military professionals in an expeditionary Air Force. Topics such as Air Force heritage, enlisted force structure, professional conduct, global diversity, and human relations will be covered.

Expeditionary Airman

27 Contact Hours

The Expeditionary Airman curriculum is also a combination of profession of arms and leadership lessons. The purpose of the Expeditionary Airman curriculum is to further the development of a cultural and warrior-ethos mind-set driven by the role of Air Force staff sergeants as expeditionary Airmen in an expeditionary Air Force. It will focus on strategy and doctrine, force readiness, foreign terrorism, integrated operations, warrior-centered conduct, and the Air Force nuclear enterprise.

Supervisory Communicator

33 Contact Hours

The Supervisory Communicator curriculum focuses on providing students with the knowledge to be more effective communicators in supervisory writing and speaking situations. This volume consists of six chapters: “Foundations for Effective Communication,” “Interpersonal Communication,” “Narrative Writing,” “Bullet Statement Writing,” “Public Speaking,” and “Communicating in the 21st Century: Air Force Culture of Engagement.”

Supervisor of Airmen

48 Contact Hours

The purpose of the Supervisor of Airmen curriculum is to provide skills necessary to fulfill supervisory and reporting official responsibilities and to prepare students for future responsibilities as NCOs. Specific attention is

given to areas such as group dynamics, team development, contemporary military leadership (an approach to leadership, problem solving, standards and discipline, change management, conflict management, and the performance evaluation process).

Noncommissioned Officer Academy

Resident Program

Internet Address

<http://www.au.af.mil/au/barnes/>

Program Description. The Noncommissioned Officer Academy (NCOA) CCAF-affiliated course consists of 223 hours of in-residence classes accredited through the SACSCOC. Each student earns 11 hours of undergraduate credit upon completion of the course.

This PME course prepares NCOs to be professional, war-fighting Airmen who can lead and manage Air Force units in the employment of air, space, and cyberspace power. The NCOA's 223-hour curriculum consists of five academic areas—profession of arms, warfare studies, international security studies, communication studies, and leadership studies. The principal methods of instruction are guided discussion, experiential exercises, and case studies. Formative exercises are integral to the NCOA curriculum and serve as feedback tools for the student and instructor. Summative objective and performance evaluations determine whether established educational requirements outlined in the course are met.

Learning Outcomes

- Prepares NCOs to lead and manage units
- Prepares NCOs to effectively communicate rank-appropriate tasks
- Prepares NCOs to model professional military attributes

Faculty. NCOA faculty members are required to have an associate's degree (or fall within one year of completion) and must complete the EPME Instructor Course before assignment to an EPME school or academy. Within the first

year of teaching, the faculty must complete a 120-hour internship at their respective schools.

Duration. The NCOA program is delivered in 28 academic days and is conducted at 11 locations worldwide, with most NCOAs operating seven classes each year.

Eligibility. Students are technical sergeants and technical sergeants–select with six months of retainability upon completion of the NCOA. Students must complete the NCOA before they assume the grade of master sergeant. Local military personnel flights manage this process for each base. Quotas are distributed by AETC and managed by each MAJCOM annually.

Students are selected based on the eligibility criteria outlined in AFI 36-2301, *Professional Military Education*, and the Education and Training Course Announcements (ETCA) website at <https://etca.randolph.af.mil>. ETCA course number: YNCOA XXX (e.g., YNCOA100).

CURRICULUM SUMMARY

| Instructional Area Titles | Contact Hours |
|---------------------------------|---------------|
| Profession of Arms | 48 |
| Warfare Studies | 4 |
| Leadership Studies | 51 |
| International Security Studies | 4 |
| Communication Studies | 65 |
| Course Capstone Case Study | 4 |
| Objective Exercises/Evaluations | 16 |
| Collateral Curriculum | 31 |
| Total | 223 |

Instructional Area Descriptions

Profession of Arms

48 Contact Hours

The Profession of Arms is a study of the military as a profession. It focuses on distinctive knowledge, wellness, core values, professional ethics, the oath of office, dress and appearance, and drill and ceremonies.

Warfare Studies**4 Contact Hours**

Warfare Studies examines the nature of war and the art of employing military power across the spectrum of operations. War fighting includes roles, relationships, and functions across the spectrum of conflict.

Leadership Studies**51 Contact Hours**

Leadership Studies explores a wide range of leadership topics from the individual to the organization, including diversity, four lenses, team building, full-range leadership development, leader influence, negotiating, resource stewardship, discipline, emergent leadership issues, change management, and continuous improvement.

International Security Studies**4 Contact Hours**

International Security Studies consists of the national security strategy, instruments of national power, security issues, and global, regional, and cultural awareness.

Communication Studies**65 Contact Hours**

Communication Studies develops an understanding, appreciation, and ability to apply principles of effective communication relevant to an NCO (speaking, listening, writing, editing, counseling, and communicating nonverbally). This core area also involves relations with the media and social media.

Course Capstone Case Study**4 Contact Hours**

The Capstone Case Study gives students plenty of opportunities to see how concepts and principles they have studied throughout the course apply to simulated situations. In theory, students who demonstrate mastery of course concepts and principles are able to transfer their knowledge to the work center and, thus, with practice become more effective managers and leaders.

Objective Exercises/Evaluations**16 Contact Hours**

A pretest is used as a tool to assess the student's knowledge on lesson principles prior to instruction. The results from this pretest are used by Academic Affairs as an indicator of how much learning occurred. The formative exercise presents a series of new problem scenarios to the student. They will make decisions and apply the lesson principles they have learned to these situations. Following the two-hour exercise, the instructor will spend the remaining

three hours conducting remediation with the students. The summative evaluation presents a series of new situations designed to evaluate student mastery of principles taught. Following the two-hour evaluation, the instructor will spend the remaining three hours conducting remediation with the students. The course retest is for students who failed the summative evaluation. Following the two-hour evaluation, the instructor will spend the remaining two hours conducting remediation with the students.

Collateral Curriculum

31 Contact Hours

Collateral curriculum is time given for the course introduction, course foundation (successful learning and critical thinking), course evaluation (lesson and end-of-course surveys), administration, and commandant's time.

Noncommissioned Officer Academy

Distance Learning Course

Course 00015

Program Description. The Noncommissioned Officer Academy Distance Learning Course (NCODLC) is a CCAF-affiliated course consisting of 134 hours accredited through the SACSCOC. Each student earns eight hours of undergraduate credit upon completion of the course.

NCODLC is a voluntary five-volume, paper-based self-study course delivered through AUSIS. The five volumes are broken into two sets. Set A consists of three volumes, and Set B consists of two volumes. Each set has a closed-book test. Tests are administered at the designated/authorized test control facility located on almost every military base. Successful completion of the course results in college credit from the CCAF.

This course prepares NCOs to be professional, war-fighting Airmen who can lead and manage Air Force units in the employment of air, space, and cyberspace power. The course presents similar material to the resident program.

Learning Outcomes

- Provides NCOs foundational knowledge of the leadership and management concepts necessary to lead and manage units

- Provides NCOs foundational knowledge of the communication skills necessary to effectively communicate rank-appropriate tasks
- Provides NCOs foundational knowledge of the profession of arms and military studies concepts necessary to model professional military attributes

Duration. The enrollment period is 12 months. Students may elect an automatic one-time extension of four months. The enrollment period includes the time necessary for material shipment (if applicable), examinations, and posting of scores within AUSIS.

Eligibility

- Active-duty personnel are not eligible for enrollment.
- Air Force Reserve personnel:
 - E-5 with 72 months of time in service and a 7-level in PAFSC
 - E-6 with 7-level in PAFSC
- Air National Guard personnel:
 - E-5 with 96 months of time in service and a 7-level in PAFSC
 - E-6 with 7-level in PAFSC
- Other US military personnel:
 - E-6 and above
- Nonmilitary technician civil service personnel:
 - GS-5 or equivalent and above

CURRICULUM SUMMARY

| Instructional Area Titles | Contact Hours |
|--------------------------------|---------------|
| Profession of Arms | 18 |
| Warfare Studies | 10 |
| Leadership Studies | 56 |
| International Security Studies | 8 |
| Communication Skills | 24 |
| Capstone Case Studies | 4 |
| Objective Evaluations | 2 |
| Collateral Curriculum | 12 |
| Total | 134 |

Instructional Area Descriptions

Profession of Arms **18 Contact Hours**

The Profession of Arms is a study of the military as a profession. It focuses on distinctive knowledge, wellness, core values, professional ethics, the oath of enlistment, dress and appearance, and drill and ceremonies.

Warfare Studies **10 Contact Hours**

Warfare Studies examines the nature of war and the art of employing military power across the spectrum of operations. War fighting includes roles, relationships, and functions across the spectrum of conflict.

Leadership Studies **56 Contact Hours**

Leadership Studies explores a wide range of leadership topics from the individual to the organization, including diversity, team building, leader influence, negotiating, resource stewardship, discipline, emergent leadership issues, change management, and continuous improvement.

International Security Studies **8 Contact Hours**

International Security Studies consists of the national security strategy, instruments of national power, security issues, and global, regional, and cultural awareness.

Communication Skills**24 Contact Hours**

This curriculum develops students' understanding, appreciation, and ability to apply principles of effective communication relevant to an NCO (speaking, listening, writing, counseling, and communicating nonverbally). It also involves relations with the media and social media guidelines.

Capstone Case Studies**4 Contact Hours**

Capstone Case Studies gives students plenty of opportunities to see how concepts and principles they have studied throughout Set A and Set B apply to simulated situations. In theory, students who demonstrate mastery of course concepts and principles are able to transfer their knowledge to the work center and, thus, with practice become more effective managers and leaders.

Objective Evaluations**2 Contact Hours**

A summative evaluation presents a series of new situations designed to evaluate student mastery of principles taught. To successfully pass the course, students must pass both the Set A and Set B evaluations.

Collateral Curriculum**12 Contact Hours**

Collateral curriculum is time given for student orientation and the course foundation (successful learning and critical thinking).

Senior Noncommissioned Officer Academy

Resident Program

Program Description. The Air Force Senior Noncommissioned Officer Academy (AFSNCOA) Resident CCAF-affiliated course consists of 269 hours of in-residence classes that are accredited through the SACSCOC. Each student earns 13 hours of undergraduate credit with CCAF upon completion of the course. This course provides an advanced PME program for selected senior NCOs to better prepare them for leadership responsibilities by expanding their leadership and managerial capabilities and their perspective of the military profession. The curriculum, designed to meet senior NCO needs, consists of lectures and small-group work seminars. The primary instruc-

tional methodology is the 12- to 16-member guided discussions. In this forum, students share ideas and experiences and work collectively to achieve various educational objectives. Members of the academy's faculty and speakers from Headquarters AF, AU, other commands, and civilian agencies lecture at the academy. The academy's curriculum advances the belief that the senior NCOs attending the course bring with them some understanding and competence in all areas of the curriculum.

Learning Outcomes

- Prepares senior NCOs to lead the enlisted force
- Prepares senior NCOs to effectively communicate rank-appropriate tasks
- Models and develops professional military attributes

Faculty. The AFSNCOA faculty is required to have an associate's degree (or fall within one year of completion) and to complete the EPME instructor course before assignment to the academy. Within the first year of teaching, faculty must complete a 120-hour internship at the school.

Duration. The AFSNCOA program is delivered in 33 academic days. There are five classes each year with 300 to 450 students in each class.

Eligibility. Air Force, selected Air Force Reserve (AFRES), and Air National Guard (ANG) senior NCOs attend the resident AFSNCOA. Selected Army, Navy, Coast Guard, and international military personnel also attend on a limited basis. Active-duty Air Force personnel must have at least one year of retainability following graduation and must complete this course before being promoted to senior master sergeant. The Air Force Military Personnel Center identifies and notifies active-duty students for attendance. Air Force students must meet Air Force standards. Students from other services must meet their service's standards.

Reference AFI 36-2301, *Professional Military Education*, and the Education and Training Course Announcements (ETCA) website at <https://etca.randolph.af.mil> for additional information. ETCA course number: MAFSNCOA100.

CURRICULUM SUMMARY

| Instructional Area Titles | Contact Hours |
|---------------------------------|---------------|
| Course Foundation | 20 |
| Military Professional | 57 |
| Joint War Fighter | 30 |
| Leadership Manager | 47 |
| Senior Communicator | 55 |
| Combined Operations | 17 |
| Objective Exercises/Evaluations | 21 |
| Collateral Curriculum | 22 |
| Total | 269 |

Instructional Area Descriptions

Course Foundation

20 Contact Hours

This lesson familiarizes students with the educational processes used to achieve desired levels of learning at the AFSNCOA. The majority of this lesson is self-directed—that is, students take charge of their own learning by reading the student guide, completing the Adult Learning Style Profile, completing the homework, and then applying the information to gain as much as possible from the course. Note: The main points in the student guide are different from the main points in this lesson plan. The class covers the homework, which encompasses most of the main points in the student guide, and then focuses on adult learning styles and the IDDP (identify, differentiate, determine, and predict) process.

Military Professional

57 Contact Hours

This course offers a study of the military as a profession and the characteristics of the culture that separate the uniformed services from the society they serve. It focuses on distinctive knowledge, exclusive group coherence, career structure, and the Airman's role in society. It also addresses core values, discipline, professional ethics, fitness, dress and appearance, oath of office, professional relationships, drill and ceremonies, customs and courtesies, accountability, the warrior ethos, and security awareness.

Joint War Fighter**30 Contact Hours**

This study promotes the notion that the responsibilities for protecting our nation, preventing future conflicts, and prevailing against adversaries require senior NCOs to fully understand the joint environment. Senior NCOs must be prepared to deploy, employ, fight, and survive across the spectrum of conflict in joint, combined, and multinational environments. Joint war fighters are well versed in joint operations, possess an in-depth understanding of the culture and capabilities of all involved forces, and are able to convey and incorporate the strengths that each force brings to the fight. They understand elements of the planning processes and recognize the strategic implications of emerging war-fighting concepts and capabilities. Joint war fighters help leadership make informed decisions by assessing the best ways to plan, present, and control military resources as they serve the unique requirements of the combatant commander.

Leadership Manager**47 Contact Hours**

This study enables students to focus on the organizational and personnel management functions that all senior NCOs face at their home stations as well as in deployed and joint environments. Operational managers drive change and execute missions through the efficient and effective use of resources; produce excellence through a wide range of career-broadening experiences, education, and training; attract, retain, and develop Airmen and prepare them to operate in all environments; inspire a willingness to do what is right; ensure that professional duties take precedence over personal desires; and master processes that ensure the Air Force remains the world's premier air and space force.

Senior Communicator**55 Contact Hours**

This study develops an understanding of and an ability to apply principles of effective communication (speaking, listening, writing, researching, communicating nonverbally, negotiating, and critical thinking). Broad categories in this core area include interpersonal communications, group dynamics, cross-cultural communications, and the attendant processes and networks for communication.

Combined Operations**17 Contact Hours**

This three-day portion of the course allows senior NCOs to share perspectives with company grade officers (CGO) attending the Air and Space Basic

Course. The senior NCOs and CGOs participate in lessons and exercises designed to establish a foundational framework for a senior NCO mentor relationship with CGOs. This Air Force chief of staff initiative expects CGOs, when supervising and commanding, to team up with senior enlisted personnel to ensure a united front in matters involving personnel and operations.

Objective Exercises/Evaluations

21 Contact Hours

These hours allow time for administering and reviewing tests and a case study.

Collateral Curriculum

22 Contact Hours

Collateral curriculum is time given for the course introduction, course wrap-up, student surveys, administration, and remove/replace temporary lessons inserted by a higher authority such as the CSAF, the learning council, or the commandant.

Senior Noncommissioned Officer Academy

Distance Learning Course

Course 00014

Program Description. The SNCOA Distance Learning (DL) Course is a CCAF-affiliated course delivered via the World Wide Web. The course consists of 61 hours accredited through the SACSCOC. Students earn four hours of undergraduate credit upon completion of the course.

The course focuses on preparing SNCOs for positions of greater responsibility and enhances their development by strengthening their knowledge about leadership and management. The course also broadens their understanding of the military profession. There is no single end-of-course examination for the SNCO PME DL program. Students are evaluated following each subcourse through summative examinations at a designated/authorized test control facility located on almost every military base.

Learning Outcomes

- Prepares senior NCOs to lead the enlisted force

- Prepares senior NCOs to effectively communicate rank-appropriate tasks
- Models and develops professional military attributes

Duration. The SNCO PME DL program consists of a single academic term of 72 months for students to complete the program.

Eligibility

- Active duty personnel:
 - o E-6 with two years of time in grade and NCOA
 - o E-7 or above with NCOA
- Air Force Reserve personnel:
 - o E-6 with two years of time in grade and NCOA (or DL)
 - o E-7 or above with NCOA (or DL)
- Air National Guard personnel:
 - o E-6 with two years of time in grade and NCOA (or DL)
 - o E-7 or above with NCOA (or DL)
- Other US military personnel:
 - o E-7 or above
- Nonmilitary technician civil service personnel:
 - o GS-6 or equivalent and above with verification from the supervisor or commander that the person is occupying a management position

CURRICULUM SUMMARY

| Instructional Areas | Contact Hours |
|----------------------------|---------------|
| Profession of Arms | 13 |
| Communication Skills | 15 |
| Behavior Analysis | 9 |
| Human Resource Development | 9 |
| Organizational Management | 15 |
| Total | 61 |

Instructional Area Descriptions

Profession of Arms

13 Contact Hours

Students must understand and communicate to subordinates how unit-level duties fit into the larger context of joint operations that support national policy. They also gain knowledge of the heritage and history of the enlisted corps. The profession-of-arms topics expand student knowledge of the role of the Air National Guard and the Air Force Reserve. Such subjects as strategy and foreign policy are discussed. Students also hear perspectives of a former AF chief of staff, a former prisoner of war, and other influential people.

Communication Skills

15 Contact Hours

Students are exposed to developmental lessons designed to help them understand how effective communication skills enhance their leadership ability. They receive instruction in preparing and organizing both written and spoken communications, developing effective paragraphs, supporting assertions, and editing written communication.

Behavior Analysis

9 Contact Hours

This area enables leaders to know and understand why people act and react as they do. With lessons examining behavior from many angles, students gain a broader perspective of the diverse patterns of behavior displayed by subordinates.

Human Resource Development

9 Contact Hours

This series of lessons provides students with leadership tools and methods used to improve subordinates' overall job performance and to adjust leadership and supervisory style to subordinates' experience and needs. These lessons allow students to explore the different theories of motivation and learn how to motivate workers to do their best.

Organizational Management

15 Contact Hours

The lessons in this area provide students with a broad view of organizational design and structure. Students learn how to be proactive in a leadership role as they face organizational restructuring and constant change.

USAF First Sergeant Academy

Internet Address

<http://www.au.af.mil/au/barnes/fsa/>

Program Description. The USAF First Sergeant Academy CCAF-affiliated course consists of 122 hours in residence with the additional duty seminars consisting of 40 hours. All programs are accredited through the SACSCOC with student credit earned as follows: USAF First Sergeant Academy, five credits; USAF First Sergeant Additional (Add) Duty, two credits; USAF First Sergeant Academy ANG Add Duty, two credits; and USAF AFRC First Sergeant Academy Add Duty, one credit. In 2006 the in-residence curriculum was revised to reflect the background of its students and to produce first sergeants capable of meeting the needs of the Air Force as well as their assigned components. The academy's curriculum is divided into five major areas: unit administration, human resources preventive intervention, quality force management, military justice, and deployment issues.

The USAF First Sergeant Academy constantly puts forth initiatives and course updates to increase the efficiency and effectiveness of the academy and improve the quality of instruction. Based on surveys from field-experienced first sergeants, graduates, commanders, command chiefs, and utilization and training workshops, the academic curriculum is continually being revised. These revisions allow the academy to adjust the curriculum to meet current needs of Air Force first sergeants. The school's web page provides a one-stop service for first sergeants to access critical reference material used daily and information for continuity purposes. Scenario-based learning and role-playing exercises continue to propel each student to higher levels of learning.

Learning Outcomes. The First Sergeant Academy graduate possesses skills to:

- Advise and assist commanders with all matters affecting health, morale, discipline, and welfare
- Identify and react to quality force indicators in the enlisted force to support the USAF mission
- Lead, advise, and mentor the enlisted force
- Support his or her unit during drills and ceremonies
- Be effective in the deployed environment

- Advise commanders on legal issues (*UCMJ*, NJP, federal and state)
- Epitomize the Air Force core values
- Communicate effectively orally and in writing

Faculty. All personnel selected as FSA faculty must carry the first sergeant special duty identifier. The FSA faculty is required to have an associate's degree and must complete the Enlisted Professional Military Education Instructor Course (EPMEIC) after arrival. Within the first year of teaching, the faculty must complete a 180-hour internship at the FSA.

Duration. The USAF FSA course is 15 academic days long and enrolls up to 44 active duty, 25 ANG, and 10 AFRES students per class. There are eight classes each fiscal year.

Eligibility. The USAF FSA course enrolls master sergeants from active duty, ANG, and AFRES personnel. Refer to AFI 36-2113, *The First Sergeant*, for the application, training, and selection process for first sergeant duty in each of the three components.

Reference AFI 36-2301, *Professional Military Education*, and the Education and Training Course Announcements (ETCA) website at <https://etca.randolph.af.mil> for additional information. ETCA course number: MFSA8F000.

CURRICULUM SUMMARY

| Instructional Area Titles | Contact Hours |
|-----------------------------------|---------------|
| Administration | 9 |
| Physical Training | 9 |
| Exam Testing | 3 |
| Block 1—Human Resource Management | 48 |
| Block 2—Maintenance of Discipline | 33 |
| Block 3—Readiness | 26 |
| Total | 128 |

Instructional Area Descriptions

Administration **9 Contact Hours**

Accomplish the administrative details incidental to the USAF First Sergeant Academy, conduct in-processing, and review course curriculum.

Physical Training **9 Contact Hours**

Students participate in physical training programs.

Exam Testing **3 Contact Hours**

Evaluate level of understanding with end-of-course test; instructors conduct test review.

Block 1–Human Resource Management **48 Contact Hours**

Comprehend and value how preventive intervention impacts the unit.

Block 2–Maintenance of Discipline **33 Contact Hours**

Comprehend quality force management policies, practices, and procedures as a tool for corrective actions.

Block 3–Readiness **26 Contact Hours**

Know contents of *Manual for Courts-Martial* and comprehend the applications of its principles. Comprehend the first sergeant's role and responsibilities in a deployment process and apply the information in a deployment scenario.

Air Force Career Development Academy

Internet Address

<http://www.au.af.mil/au/barnes/>

The Air Force Career Development Academy (AFCDA) is responsible for the instructional development, management, delivery, and evaluation of Air Force Career Development Courses (CDC), specialized courses, and select professional military education (PME) courses. AFCDA also produces and

distributes study materials for the Air Force Weighted Airman Promotion System (WAPS).

Each year AFCDA manages the development and administration of approximately 225 active courses, 72,000 WAPS packages, and 188,500 examinations, while serving more than 135,000 students. The traditional paper-based CDCs are developed using state-of-the-art publishing software. The majority of examinations are given electronically and print-on-demand is provided for those locations that require paper-based testing.

A growing number of courses incorporate a blend of text and multimedia via CD-ROM. Airmen in select career fields are provided the option to complete their CDCs through Air University's website (a derivative website of AETC's Advanced Distributed Learning System) that provides course access from work or home computers. Electronic exams, developed by AFCDA instructional system specialists, are available at remote test control facilities, enabling students to have instant access to feedback and test scores. Student support is accomplished via the electronic AU e-Campus Support Center, providing technical, course, and student-support services through electronic incident submissions and frequently asked questions. AFCDA personnel also facilitate printing the CDCs and maintaining a database of registered students (shared with the AU Registrar/Student Services); track student progress; administer surveys; and provide analytical reports on student performance and satisfaction to the schools, functional communities, and preparing agencies.

AFCDA presents a one-week practicum in the use of instructional systems design to write and revise CDCs. The course is designed to equip new writers with quality methods for producing effective distance education course materials. Students work under the tutelage of our educators and gain hands-on experience in every phase of course development planning; writing objectives, tests, and text; and processing and evaluating a course. AFCDA's instructional systems specialists and advisors are also available to teach subject-matter experts and support organizations in the field, utilizing various media to develop sound instructional strategies. AFCDA produces handbooks and guides for course authors, preparing agencies, base education offices, test-control facilities, and field units.

Program Descriptions. A description of AFCDA's 225 distance learning courses is available in the AFCDA catalog at <http://www.au.af.mil/au/afiadl/>. The website also provides information about enrollment, counseling, testing procedures, test-control facilities, methods for obtaining assistance with student inquiries, statistical analysis, and aggregate survey data.

AIR UNIVERSITY

NONDEGREE PROGRAMS

Professional Military Education (PME). The Carl A. Spaatz Center for Officer Education is the Air Force's unifying organization for officer professional military education. Air University's (AU) PME schools prepare junior, mid-career, and senior commissioned officers, selected civilians, and select international officers for progressively more responsible positions through the Air Force and the Department of Defense (DOD). All colleges, schools, and programs operate within the framework of the Air Force continuum of education, a coordinated and integrated educational system that links curricula across AU so that each college, school, and program builds on the education provided at the previous level. This continuum includes five core areas: the profession of arms, warfare studies, international security studies, communication studies, and leadership studies. AU PME courses are available for officers through Air War College (AWC), Air Command and Staff College (ACSC), Squadron Officer College (SOC), and the International Officer School (IOS).

Professional Continuing Education (PCE). The Ira C. Eaker Center for Professional Development provides professional continuing education to Air Force and other DOD personnel as well as international students. The center is composed of five schools: the Commanders' Professional Development School, the USAF Chaplain Corps College, the National Security and Space Institute, the Defense Financial Management and Comptroller School, and the Air Force Human Resource Management School.

Officer Accessions and Citizen Development. The Jeanne M. Holm Center for Officer Accessions and Citizen Development provides coordinated leadership and policy direction for the Air Force's officer recruiting, training, and commissioning programs at Officer Training School and at Air Force Reserve Officer Training Corps (ROTC) detachments at colleges and universities. The Holm Center also directs the Air Force's high school citizenship training program—Air Force Junior ROTC—which oversees Air Force Junior ROTC units on high school campuses around the world. The aim of this program is to build better citizens for America.

Air War College Distance Learning

Internet Address

http://www.au.af.mil/au/awc/dl_main.aspx

Program Description. The AWC Distance Learning (DL) program is a senior developmental education program. The curriculum consists of an orientation course, one elective, and four core courses. The orientation course is completed first, followed by the elective. The core courses should be completed in the following order: Foundations of Strategy (FS), International Security Studies (ISS), Warfighting (WAR), and Joint Strategic Leadership (JSL). All elective and core course requirements must be completed within 72 months of initial enrollment. Extensions may be granted with an e-mail from the student's rater.

In addition to the orientation course, elective, and core courses, we also have an "Alpha" course. This course was created to provide learning, navigating, and test-taking tips to assist students as they proceed through the Air War College Distance Learning program. It is not a graded course and is available in our "keys to success" tab.

Learning Outcomes. The AWC DL Program produces graduates who are able to:

- Illustrate the skills required to lead successfully at the strategic level in a joint and coalition environment and distinguish the requirements for the proper strategic employment of airpower within that environment.
- Identify the elements of successful military strategies which, in concert with other instruments of national power, achieve the goals of national security strategy.
- Critically analyze complex political-military situations and clearly articulate strategic thought from a joint perspective.

Faculty. DL military faculty members are experienced career officers who have served in various specialties. DL civilian faculty members provide continuity and typically serve beyond the tenure of the military faculty. All faculty members have at least a master's degree and are graduates of a senior developmental education program.

Duration. Students are enrolled in the DL program for 72 months. All course material must be successfully completed in this time period. The time a DL

student takes to complete the program depends on such factors as official duties, deployments, and other time commitments. Students are encouraged to set realistic goals to proceed through the AWC distance learning program at a reasonable pace. Completing one lesson each week allows the student to graduate in about 20 months.

Eligibility.

- **Military.** The list includes O5 selects and above. Persons may be active duty, Air Force Reserve (AFRES), or Air National Guard (ANG); sister-service active duty, Guard, or Reserve; or Civil Air Patrol. Refer to AFI 36-2301, *Developmental Education*, 16 July 2010, for guidance.
- **Civilian.** Civilians may be federal civil service employees in the grades of GS14/15 or comparable grade, or lab/demo employees in grades DRIII/IV.
- **International.** International applicants must be an O5 select or higher. International officers must request enrollment via the Air Force Security Assistance Training (AFSAT) program office. Refer to AFI 36-2301, *Developmental Education*, 16 July 2010, for guidance.

Enrollment. Military personnel should enroll in AWC DL via the Air University Student Information System (AUSIS) at <https://ausis.maxwell.af.mil>. Eligible civilian personnel must contact AWC/DL to enroll. International students will be enrolled by AWC/DL once approved by AFSAT and acknowledged by AU/CFRR.

Completion Requirements. Students must complete each course, with a final test score of 70 or better for each course, to graduate and receive program credit.

Curriculum Summary

| Course Number and Title | Lessons | Contact Hours |
|---|------------|---------------|
| FS 42A Foundations of Strategy | 12 | 57 |
| ISS 42G International Security Studies | 25 | 96 |
| WAR 42E Warfighting | 15 | 57 |
| JSL 42F Joint Strategic Leadership | 13 | 48 |
| EL 42D Electives Program (one required) | 51 | 45 |
| Total | 116 | 303 |

Note: Courses taken in the DL program may not be used to satisfy course requirements for the resident program.

Course Descriptions

The DL program includes the core curriculum and an elective. The core curriculum consists of four courses: Foundations of Strategy (FS), International Security Studies (ISS), Warfighting (WAR), and Joint Strategic Leadership (JSL). Additionally, students must complete one elective before beginning their first core course.

FS 42A Foundations of Strategy

57 Contact Hours

The Foundations of Strategy (FS) course develops senior leaders who can ethically develop and evaluate strategy in the pursuit of national interests. This foundation is laid by examining various theorists' concepts and how they have been applied to conflicts throughout history and to today's military operations. The course pays special attention to strategy development for the venues of air, space, and cyberspace and to the impact of airpower on national and military strategy. Foundations of Strategy will serve as the foundation for further study in other courses examining the national security decision-making process and the application of military power as a means to attain national objectives.

ISS 42G International Security Studies

96 Contact Hours

The International Security Studies (ISS) course assesses the role and impact of civil-military relations, the interagency process, Congress, and public opinion in policy development and execution. It also discusses leadership as it pertains to organizational changes facing the national security decision-making community, as well as bureaucratic politics and organizational culture and the impact of individuals on national security decision making. The course examines a range of global security issues and regions of strategic importance.

WAR 42E Warfighting

57 Contact Hours

The Warfighting (WAR) course prepares senior leaders to deploy, employ, and control joint forces across the spectrum of conflict. The course emphasizes the employment of air, space, and cyberspace forces as they contribute to the joint, combined, or coalition environment in support of the National Military Strategy. The course assesses the best ways to present, plan, and control military forces as they serve the needs of combatant commanders. It presents the strategic implications of America's past experience with (and current expectations of) emerging asymmetric war-fighting concepts. Finally, the course

describes the friction between joint and service operational concepts as applied to the employment and control of air, space, and cyberspace power.

JSL 42F Joint Strategic Leadership

48 Contact Hours

The Joint Strategic Leadership (JSL) course prepares the student with competencies and awareness needed to move from tactical and operational leadership levels to strategic leadership. The course examines senior leadership competencies required to be successful in today's complex, multicultural expeditionary war-fighting environment. The course is based on two key assumptions: first, the student is already a successful leader, but the challenges the student will face in the future will be significantly different from those faced in the past; second, the student can significantly improve his or her competence in areas vital to success. The course challenges students to develop a vision, expand their critical analysis and creative thinking skills, improve their communication skills, expand their capacity for executive decision making, and refine their capability for leading change. In addition, the course focuses on acceptance of responsibility, accountability, command, moral values, and awareness of the strategic environment in order to meet strategic and senior leader challenges involved in leading large, complex organizations.

EL 42D Electives Program

45 Contact Hours

All students must complete one elective before enrolling in the first core course. The Electives Program's major objective is to enhance and complement the core curriculum by providing opportunities to achieve greater depth and breadth of understanding in issues of special interest.

Coercive Airpower

Should the United States bomb a country to coerce it to give up its nuclear program? What would such a strategy look like? How likely would it be to work? How would you know? This course gives the student the tools to answer such questions and understand and evaluate airpower strategies—and the opportunity to produce one for this purpose. The course addresses the intellectual foundations of airpower strategy, focusing upon how the threat or use of airpower can achieve political objectives. The course will discuss theoretical concepts surrounding coercion, the intellectual history of coercive airpower strategies, and ways these strategies can be used in anticipated and actual conflicts. Students will also evaluate the strengths, weaknesses, triumphs, and disappointments of these strategies in theory and practice.

Counterinsurgency (COIN) and Military Support to Security, Stability, Transition, and Reconstruction (SSTR)

This course examines the challenges posed by irregular warfare in today's environment with an emphasis on insurgencies and reconstruction. America has historically preferred to conduct conventional large-scale operations against foes structured similarly to itself. It has been much less enthusiastic about conflict at the lower end of the spectrum, although, ironically, such operations have occupied much more of its time and attention than conventional operations.

Cross-Cultural Communications

Today's warfare is defined by culture, and an intimate understanding of culture's effects on human behavior is crucial to mission success. Everyone who performs a job in a cross-cultural environment (which we see now is almost any environment) needs to understand not only the mission but also the potential effects of cross-cultural interaction. Appropriate cross-cultural communication training and education will reduce the negative effects of culture shock, stereotypes, and ethnocentrism, all of which impact mission effectiveness. In our daily lives, we don't interact with cultures; we interact with people. The field of cross-cultural communication (CCC) exists in order to improve such interactions and to predict the cultural dynamics that impact them. Thus, CCC teaching and research clarifies certain cultural complexities by offering a variety of concepts and skills designed to assist in the process of building and maintaining relationships across cultures.

Negotiations in the Military Environment

This course is designed to better equip military leaders with the ability to apply negotiation skills to the military and US government operational and work-place environment. Even in a hierarchical and well-defined military organization, negotiation is a normal and daily process. Furthermore, today our political and military leaders demand that we operate successfully in more nontraditional and cross-cultural environments. This course enhances senior leader negotiation skills and improves their mission effectiveness across many environments. As a distance learning program, it follows a logical path to expose students to the negotiation process. Students will learn about conflict resolution and its impact on the modern military. They will also study how military leaders practically apply negotiation skills.

Several lessons will cover the basics of negotiation theory and the impact of trust, power, and information on the negotiation process. This will be enhanced by a look at basic skills for negotiation, the most important of which is communications. Students will also examine other aspects of dispute resolution within the military environment. One critical area for review will be the ethics of negotiation. Finally, the course explores negotiations in a cross-cultural environment—providing a short exposure to a very complex process. This course is an interesting survey of the military negotiation process and hopefully will encourage senior leaders to learn even more as they face the daily challenges of military leadership.

Space/Cyber Operations

This course focuses on military applications of space and cyberspace systems, to include capabilities, limitations, dependencies, and vulnerabilities. Space and cyber policies, law, and doctrine establish the guidelines for using space and cyberspace; each has a unique environment that places limits on its use. The course provides an understanding of current space and cyberspace systems and how they support the war fighter, as well as an understanding of the issues facing senior leaders in applying space and cyber power. The readings will include background information on their characteristics, limitations, organizations, missions, functions, and contributions to war fighting. This elective will not make you a space and cyberspace expert and is particularly designed for personnel who are neither space and missile operations specialists nor cyber personnel. However, it will give you keen insight into the fundamental issues impacting contemporary military space and cyberspace operations.

Language Elective

A language familiarization program is offered via Defense Language Institute online products. Primary languages available are Arabic (Iraqi), Chinese, Dari, Farsi, French, Indonesian, Pashto, Russian, Spanish, Swahili, and Urdu. Other languages may be available upon approval by AWC/DEN.

Air Command and Staff College Nonresident IDE–Online Distance Learning Program

Internet Address

http://www.au.af.mil/au/acsc/DistanceLearning/distance-learning_pg1.asp

Program Description. The college’s curriculum is designed to produce a more effective field-grade officer serving in operational-level command or staff positions. The courses emphasize applying airpower in joint campaign planning and the operational art of war. Students explore national security issues, strategy and war theory, airpower history and theory, expeditionary Air Force force-employment concepts, and the capabilities and limitations that the US Air Force and its sister services contribute to joint force commanders.

All curriculum is web based and accessed through the Blackboard learning management system. In addition to readings, the program includes a variety of computer-based interactive learning activities and exercises and leverages social media tools to enable peer-to-peer interaction and learning. Self-paced study is enhanced by a national security paper and three multiweek, collaborative, online facilitated seminars.

The program’s student-centered approach for learning is focused on measuring a student’s ability to think critically, analyze, and apply knowledge, often to real-world situations. During the facilitated online seminars, students have the opportunity to engage with peers and instructors and discuss and debate the ideas presented in the curriculum, contributing to overall mastery of the course and higher-order thinking.

Specifically, the learning environment within each self-paced course block includes lesson narratives, reading materials, videos, lesson progress checks, computer-based interactive learning activities, and/or “game-like” exercises designed to enhance the students’ leadership and command skills and educate the students on planning, generating, and employing air and space forces in support of a joint force commander’s mission. An orientation course introduces students to the online learning environment and familiarizes them with the web tools available for engaging peer-to-peer interaction. Completion of each previous self-paced course block is a prerequisite for students to register for the associated facilitated online seminar.

Learning Outcomes. ACSC Distance Learning 6.0 Program produces graduates who are able to:

- Critically analyze leadership and command skills required to lead in complex, dynamic, and ambiguous operational environments.
- Apply military theory in general and airpower theory in particular to operational problems across the range of military operations.
- Plan for the integration and employment of joint forces at the operational level in whole-of-government operations across the spectrum of war and conflict.
- Articulate capabilities and limitations of service and joint organizations in the conduct of war at the operational level.

Coursework Requirements. Courses taken in this distance learning program may not be used to satisfy course requirements of the ACSC Resident Program or the ACSC Online Master's Program (OLMP).

Faculty. The college employs a blend of expert faculty exceptionally qualified to accomplish its mission and goals. Its unique mission requires a distinctive mix of faculty qualifications and credentials. Traditional civilian academics provide the depth and breadth of subject-matter expertise to guarantee the academic rigor of the college's offerings while simultaneously ensuring adherence to validated pedagogical theory and practice. Military officers contribute critical military and operational perspectives, as well as unparalleled currency and expertise, to the subject matters addressed.

Duration. Students have four months to complete each of the seven core self-paced courses and the orientation course in addition to the facilitated courses offered once a month. The program should take students approximately seven to 12 months to complete. Students have a maximum of five years to complete the program. If a student does not complete the program in five years, he or she must obtain an ACSC program extension request signed by his/her commander for re-enrollment consideration.

Eligibility. The program is offered to US active duty, Reserve, and National Guard majors, majors-select, and their equivalents from all services. DOD civilian employees in the grade of GS-12, GS-13, or NAF 4/5 with a bachelor's degree may also enroll. Civil Air Patrol officers serving in the grade of major or above may also enroll in the DL program. International applicants for the

programs must be majors-select or higher or equivalent-grade civilian employees of the military department of a country or international organization assigned to a DOD billet. International officers may enroll through the Foreign Military Sales training sponsorship program.

Reference AFI 36-2301, *Professional Military Education*, the ACSC public website, http://www.au.af.mil/au/acsc/DistanceLearning/distance-learning_pg1.asp, and the Education and Training Course Announcements website at <https://etca.randolph.af.mil> for further information. (ETCA course number: MACSC003.)

Enrollment. Students will be enrolled in ACSC upon verification of identity in the AUSIS at <https://ausis.maxwell.af.mil>. They remain enrolled through completion, provided they stay in good standing.

Graduation Requirement. Students must pass all graded assessments for each course.

Curriculum Summary Version 6.0

| Curriculum Areas | Contact Hours |
|---------------------------------------|---------------|
| 00030O Orientation and Introduction | 6 |
| 00030A Leadership and Command | 24 |
| 00030B Applied Leadership and Command | 15 |
| 00030C National Security Simulation | 21 |
| 00030D Applied National Security | 9 |
| 00030E Warfare Studies | 24 |
| 00030F Airpower Studies | 24 |
| 00030G Applied Warfare | 15 |
| 00030H Joint Forces | 30 |
| 00030I Joint Planning | 30 |
| 00030J Joint Air Operations | 30 |
| 00030K Applied Joint Warfare | 21 |
| Total | 249 |

Course Descriptions for Version 6.0

00030O Orientation and Introduction

6 Contact Hours

The Orientation and Introduction course prepares students for success in the distance-learning program. The course highlights program policies, procedures, and expectations and orients students to the program structure and

curriculum delivery methods. It also provides the opportunity for students to experience the look and feel of the program by exploring three areas that are essential to both academic and professional success: critical thinking, cross-cultural competence, and writing. By participating in this course, students will develop the requisite knowledge, skills, problem-solving ability, and study habits to successfully navigate and complete ACSC's online program.

00030A Leadership and Command**24 Contact Hours**

The Leadership and Command course equips students with the knowledge and tools necessary to help them lead in today's dynamic environment. The course is centered on the concept that leadership and command abilities can be improved through self-assessment/reflection, dedicated study, and adaptability. Phase I of the course focuses on Air Force organizational leadership competencies and subcompetencies across the personal, people/team, and organizational levels of leadership. Phase II explores the unique experience and responsibilities of command by introducing practical applications of leadership competencies, advice, and supporting resources that will aid future commanders in the performance of their duties. The course concludes with a written assignment that requires personal reflection, interaction with a senior mentor, and an analysis of a significant leadership and/or command challenge.

00030B Applied Leadership and Command**15 Contact Hours**

The two-week Applied Leadership and Command course provides the opportunity to apply leadership concepts, competencies, and command principles presented during the self-paced Leadership and Command course. This course requires students to reflect upon their personal leadership/command philosophy, to learn from the experience of senior mentors and peers, and to apply what they have learned to a variety of leadership challenges. Throughout the course, students will analyze multiple complex, dynamic, and ambiguous situations and discuss the leadership and command skills required to address them.

00030C National Security Simulation**21 Contact Hours**

The National Security Simulation course provides the opportunity to explore today's complex and dynamic national and international security environment. The course emphasizes international relations theories, national security strategies, actors, and processes, as well as the effective use of national instruments of power (IOP). During the course, students will partici-

pate in a virtual National Security Council environment and accomplish four missions that require a comprehensive analysis of the international environment and the development of recommendations based on US policy, strategic/operational limitations, and optimum integration of IOPs. Completion of the course will provide students insight into how US policy makers develop ends, ways, and means to respond to evolving security environments and will prepare students for the follow-on Applied National Security assignment.

00030D Applied National Security**9 Contact Hours**

The one-week Applied National Security course is a nonfacilitated course in which students demonstrate mastery of the concepts presented in the National Security self-paced course. Students will write an essay in which they analyze factors surrounding the development and implementation of national security strategies in a complex, dynamic international environment. Upon completion of their assignment, students will submit their final product for grading.

00030E Warfare Studies**24 Contact Hours**

The Warfare Studies (WS) course introduces students to the canon of military theory, focusing on the fundamental concepts of war such as the nature and levels of war, military strategy, operational art, civil-military relations, and just war theory. Beyond the traditional study of warfare in its conventional form, this course examines alternative forms of warfare such as guerilla warfare, insurgency, counterinsurgency, and terrorism. Through this study, students will be prepared to apply the lessons of military theory and their understanding of warfare to the operational challenges facing the US military in the present and the future.

00030F Airpower Studies**24 Contact Hours**

The Airpower Studies (AP) course enhances students' understanding of military theory by introducing perspectives on war fighting with specific emphasis on airpower. According to Air Force Doctrine Document (AFDD) 1, *Air Force Basic Doctrine*, airpower is defined as "the ability to project military power or influence through the control and exploitation of air, space, and cyberspace to achieve strategic, operational, or tactical objectives." This course looks specifically at the history and development of airpower and examines the organizations and strategies that have been involved in their employment.

In addition, the course analyzes the role these elements might play in future operations.

00030G Applied Warfare**15 Contact Hours**

The two-week Applied Warfare course is a capstone course that requires the application of concepts learned in the WS and AP courses in a collaborative, instructor-facilitated online environment. The course requires students to be familiar with the concepts previously presented in WS and AP in order to intelligently discuss current issues and historical cases with their classmates and instructor. Additionally, students must be able to synthesize these concepts in order to develop a critical analysis of a proposed future conflict scenario.

00030H Joint Forces**30 Contact Hours**

The Joint Forces (JF) course provides a foundation for understanding the nature, purpose, and capabilities of joint forces. It accomplishes this by broadly examining “the services”—how they fit into the joint organizational structure and what they believe about themselves through their doctrine. The course then explores concepts central to bringing service forces together in the conduct of joint operations, including organizing principles, command relationships, joint force hierarchy, and support and interaction from external agencies. The course concludes with a joint-task-force-building exercise designed to incorporate many of the core elements of the course.

00030I Joint Planning**30 Contact Hours**

The Joint Planning (JP) course introduces students to the complexities and requirements of joint planning. Throughout the course, students will study pertinent doctrine and the joint operation planning process, analyze the challenges joint force commanders face in attaining unified action, and examine ways in which operational art and design are applied to achieve objectives. Additionally, students will examine planning considerations across the range of military operations. The course culminates with students synthesizing what they have learned to create and analyze key elements of a joint campaign plan.

00030J Joint Air Operations**30 Contact Hours**

The Joint Air Operations (JA) course introduces students to the people, processes, and products involved in planning, directing, and executing joint air operations in support of joint force commanders’ campaign plans. Areas

of emphasis also include such pivotal topics as targeting, air-to-ground operations, space and nuclear operations, and information and cyberspace operations. Equipped with this understanding, students will analyze the employment of airpower across the full range of military operations.

00030K Applied Joint Warfare

21 Contact Hours

The three-week Applied Joint Warfare course is a capstone course that requires the application of concepts learned in the Joint Forces, Joint Planning, and Joint Air Operations courses in a collaborative, instructor-facilitated on-line environment. The course requires students to conduct research and to analyze compelling issues, challenges, and opportunities associated with the current and future employment of joint forces at the operational level of war. Additionally, students will conduct an analysis of a previous joint operation to synthesize lessons learned and their potential impact on future operations.

Squadron Officer College Faculty Development

Program Description. The faculty development program uses a curriculum mixed with readings, lectures, guided discussions, case studies, and experiential lessons to achieve its ends. Readings come from standard USAF educational doctrine, like AF Handbook 36-2236, *Guidebook for Air Force Instructors*, as well as cutting-edge work like Dr. Ken Bain's *What the Best College Teachers Do* and Dr. Peter Filene's *The Joy of Teaching*. For instructional design, we look at AF Manual 36-2235, Volume 10, *ISD Application to Education*, while also paying attention to the lessons of Drs. Grant Wiggins and Jay McTighe's *Understanding by Design*. Our end is to produce teachers who can educate company grade officers as well as curriculum developers who can produce a quality curriculum.

Learning Outcomes. SOC faculty development consists of two courses. Each course has specific learning outcomes.

MSOC001 Theories and Principles of Adult Education (TPAE)

After this course, students will be able to:

- Apply effective techniques to accomplish learning objectives (alignment of course objectives, teaching, and assessment methods).
- Apply effective communication and management skills inherent in a classroom environment.
- Demonstrate various instructional delivery methods.
- Differentiate between productive and nonproductive student behavior.
- Assess student comprehension and application.
- Apply appropriate motivational measures.
- Analyze student learning and development.
- Identify impromptu learning opportunities.
- Master integrated technology applications.

MSOC002 Advanced Principles of Instructional Design (APID)

After this course, students will be able to:

- Apply effective techniques to employ various methods to achieve learning objectives.
- Demonstrate ability to identify learning objectives and student outcomes.
- Apply different assessment methods for designed curriculum.
- Analyze assessment results for modification opportunities for curriculum.
- Apply UbD and other instructional design tools to lesson plan development.
- Analyze domains of learning to maximize student learning process.
- Master integrated technology applications.
- Develop comprehensive assessment tools/questions.

Faculty. The SOC Faculty Development Department consists of three full-time personnel but also has access to adjunct professors and instructors in the SOC faculty. The department chair holds a terminal degree in education, and the other personnel have expertise in instructional design and are experienced classroom instructors.

Duration. Each course is 10 academic days.

Eligibility. TPAE is open to newly assigned SOC faculty. To attend APID, candidates must have completed an SOS flight commander tour. Reference AFI 36-2301, *Professional Military Education*, and the Education and Training Course Announcements (ETCA) website at <https://etca.randolph.af.mil> for additional information (ETCA course numbers: MSOC001 and MSOC002).

Completion Requirement. Students must maintain a grade of “B” or better to graduate from TPAE or APID.

Course Descriptions

MSOC001 Theories and Principles of Adult Education (TPAE)

80 Contact Hours

This 10-day course prepares SOC faculty members to teach curriculum while creating active learning environments focused on higher levels of learning through the use of various teaching methodologies. A brief overview of learning theory, the instructional systems development (ISD) process, and development of lesson plans is provided. The course focuses on effective teaching techniques to include classroom management, feedback/assessment, and the use of technology. The instructional methods taught in the course include lectures, guided discussions, case studies, and experiential learning. The course relies heavily on practicum experiences in the classroom, as well as mentoring relationships between the new faculty member(s) and current faculty.

MSOC002 Advanced Principles of Instructional Design (APID)

80 Contact Hours

This 10-day course equips newly assigned SOC curriculum developers with information and experience necessary to design and develop curriculum for the USAF’s only CGO professional military education (PME) institution. This course examines and identifies the concepts, principles, and models of curriculum and the interrelationships of these elements in developing courses and evaluating them. This class is designed for teachers writing or revising curriculum. The primary focus of the course will be on the study and use of understanding by design (UBD). Students will develop or revise a lesson within the curriculum using the UBD framework.

Squadron Officer School

Resident Program

Internet Address

<http://www.au.af.mil/au/soc/>

Program Description. SOS builds upon knowledge and skills imparted through precommissioning and professional experience to deliver to the Air Force CGOs who comprehend and embrace the service's core values and the ethics and principles of officership that are so distinct to the profession of arms.

SOS emphasizes personal, team, and organizational leadership, equipping its students with theory, doctrine, and practical experiences that empower them to seek and capitalize on leadership opportunities through which they spur themselves, their subordinates, their peers, and their units to mission success and organizational excellence. Instruction is illustrated and reinforced through the measured use of military history examples as well as joint and service doctrine.

In support of the school's leadership emphasis, SOS students learn to comprehend and value the capabilities and limitations of the US armed forces and the manner in which joint forces are organized and led to achieve joint force commanders' mission objectives. SOS students are also alerted to the unique challenges inherent in today's international security environment and constantly seek opportunities to achieve success given the myriad constraints and threats that environment encompasses. SOS students can communicate effectively both formally and informally through both the spoken and written word, conveying their ideas and instructions logically in a manner that informs, motivates, and inspires subordinates and peers alike.

The 196-hour, graduate-level curriculum accomplishes the SOS mission by testing and evaluating students on the entire spectrum of the full-range leadership model, as well as profession of arms, warfare studies, effective communication, and international security studies. During the course, students are presented lessons in a building-block approach of six phases: individual reflection; team-building and leadership; flight and squadron leadership; leadership at the group and wing level; leadership in the joint environment; and USAF at the strategic leadership level. Students thus learn about their personal leadership skills and demonstrate not only how they fit into the Air Force but also how their service supports joint, national, and international operations.

Learning Outcomes. The SOS Resident Program produces graduates who are able to:

- Lead at the tactical level, employing the full range of leadership behaviors necessary to achieve success.
- Exercise leadership that reflects the AF core values and employs concepts of accountability, diversity, and coaching/mentoring to facilitate effective mission execution.
- Employ problem-solving, decision-making, and process improvement tools to meet mission challenges at the tactical level.
- Explain the broad capabilities and roles airpower plays in joint and coalition operations to achieve national objectives.
- Forge professional relationships to facilitate teamwork at the tactical level.

Duration. The SOS program is delivered in 40 academic days.

Eligibility. The program targets USAF active duty captains with four but less than seven years TAFCS; USAFR and ANG captains with less than 11 years total years of commissioned service (TYCS); select GS 9–12 (and equivalent) civilians with two years AF civil service; and a limited number of allied international officers. Reference AFI 36-2301, *Developmental Education*, and the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MSOS001).

Completion Requirements. Complete all requirements as outlined in the course syllabus.

Curriculum Summary

| MSOS001 Program Areas | Contact Hours |
|--------------------------------|---------------|
| Profession of Arms Studies | 19 |
| Warfare Studies | 35 |
| Leadership Studies | 44 |
| International Security Studies | 19 |
| Communication Studies | 31 |
| Administration and Electives | 48 |
| Total | 196 |

Program Area Descriptions for Version 1.0

Profession of Arms Studies

19 Contact Hours

At the primary level of PME, officers build upon their understanding of moral and ethical development by applying key concepts of accountability and professionalism to the challenges and opportunities inherent in leadership. Officers will analyze case studies to grasp the unique but vital relationship that binds the US military in obedience to its civilian leadership and in defense of the civilian public. They will also integrate personal and professional values into a warrior ethos consistent with the highest standards of conduct expected of military officers.

Warfare Studies

35 Contact Hours

Emphasis at the primary level is placed on the application of the military as a national instrument of power. Officers should understand their service's roles, missions, distinctive capabilities, core competencies, and structures both in the context of history and the joint operations that they may be called on to support. Officers should also have a working knowledge of the capabilities of sister services to better support the joint war-fighting team.

Leadership Studies

44 Contact Hours

The primary leadership team for the Air Force is the flight; therefore, the focus of Leadership Studies at the primary level of PME is the flight level. The primary focus is on the tactical level to provide tools officers need to build and lead small teams and serve as dynamic followers. The focus at the primary level is on the dynamics of the interaction between individual leadership skills and group interaction in building successful teams. Instruction is based on concepts and philosophies that officers can use to improve leadership skills, adjust leadership styles to the situation, accomplish assigned tasks, and employ followers' abilities effectively. There are opportunities for officers to apply the leadership skills and techniques they have learned.

International Security Studies

19 Contact Hours

The primary level of PME emphasizes those aspects of national and international security affairs that provide the broad context within which junior officers and their superiors must operate. Special attention is paid to those national and international security topics that most affect an officer's ability to

lead and follow, to communicate, and to understand what it really means to be an Airman in today's globalized environment.

Communication Studies

31 Contact Hours

The Communication Studies course amplifies instruction received at the precommissioning and basic level and provides opportunities to apply the principles of effective communication and to receive feedback. Special attention is given to those listening, speaking, writing, and interpersonal communication skills instrumental in team building. Interpersonal communications emphasize maximizing the potential of the individual as a part of a team. Officers learn to create and deliver organized, well-reasoned, and well-supported arguments via the spoken and written word.

Administration and Electives

48 Contact Hours

Administration focuses on the dissemination of critical and administrative information, feedback sessions with the faculty, and evaluations of students' understanding of the curriculum. A student elective presentations program allows the student to pursue topics of personal interest, thus enhancing both student satisfaction and learning.

Squadron Officer School Distance Learning Program

Internet Address

<http://www.au.af.mil/au/soc/msos003.asp>

Program Description. The SOS DL course provides students with the intellectual fuel to enhance their leadership skills through the study of five core areas organized into four online courses: three self-paced courses and one instructor-facilitated course. The content is parallel to material presented in the SOS resident program, which is specifically developed for CGOs as they prepare to assume increased leadership responsibilities. These courses are based on Air Force and joint developmental education requirements from Air Force Policy Directive (AFPD) 36-26, *Total Force Development*, and the *Officer Professional Military Education Policy (OPMEP)*, respectively, for program content and learning outcomes.

Learning Outcomes. The SOS DL Program produces graduates who are able to:

- Describe the challenges of leading Airmen in a dynamic, resource-constrained environment.
- Understand the application of introspection and theoretical leadership constructs as leadership tools.
- Identify the responsibilities of an Air Force officer leading Airmen at the flight/team level.
- Describe systematic approaches to decision-making and continuous process improvement.
- Summarize the broad capabilities and roles airpower plays in joint and coalition operations to achieve national objectives.

Faculty. The SOS DL program is developed, maintained, and supervised by doctoral-qualified faculty members in association with Air Force officer curriculum developers and professional instructional systems designers. All assignments and online discussions are facilitated and scored by experienced flight commanders who also teach in the SOS resident program.

Duration. Students must complete the entire program within 12 months of their initial enrollment date. During this 12-month period, students must study all course materials; schedule and pass proctored exams; complete, submit, and pass any required assignments; and participate in online discussions. While there is no requirement to complete given exams or assignments within a specified time frame, all course activities must be completed in sequence and then scored and recorded in AU databases within the 12-month period. The first three courses, 00022A, 00022B, and 00022C, are self-study and conclude with proctored exams at test control facilities. Because students may not always be afforded their first choice for the scheduled four-week, instructor-facilitated term (course 00022D), they should plan to complete the first three courses while allowing adequate time to schedule and complete the fourth course within 12 months of enrollment.

Extensions are considered only on a case-by-case basis. When circumstances during enrollment prevent students from passing the work for all four courses before their expiration dates, they may request one 90-day extension provided that they have passed at least the first two exams. A rationale must be submitted with extension requests. Students who are not finished before the three-month extension expires must reenroll and begin the program again.

Eligibility. AFI 36-2301, *Developmental Education*, para. 9, Nonresident/DL Programs, states that the purpose of DL programs “is to provide DE [developmental education] opportunities to those individuals who cannot complete the resident program appropriate to their rank/grade or to supplement the available DE opportunities.” As such, all eligible Air Force officers are permitted to enroll in the SOS DL program. AFI 36-2301 presents further eligibility information in table 3, Active duty officer non-resident/DL PME eligibility criteria, and table 6, DOD Civilian non-resident/DL PME eligibility criteria.

Completion Requirements. Students must complete the self-study course requirements (courses 00022A, 00022B, and 00022C) with scores of at least 70 percent. The minimum score for completion of course 00022D is 80 percent.

Curriculum Summary

| MSOS003 Courses | Contact Hours |
|---|---------------|
| 00022A Communication and International Security Studies | 68 |
| 00022B Leadership | 36 |
| 00022C Warfare and Profession of Arms | 66 |
| 00022D Integration and Application | 23 |
| Total | 193 |

Course Descriptions for Version 1.0

Communication and International Security Studies

68 Contact Hours

This course combines communication studies and international security studies in a process-purpose pairing. The process-purpose construct as presented in this course is applicable to the individual, team, organizational, and national levels of interaction. For this course, we consider the purposes that deal with the security of the nation in the international security environment, for which good communications skills are critical.

Leadership

36 Contact Hours

This course develops the foundational pillars for successful Air Force leadership. Introspection, followership, full-range leadership styles, and associated behaviors are presented as tools to hone professionalism, humility, self-control, and personal discipline that lead to successful mission accomplishment. Further, problem-solving, decision-making, and process skills improvement

are recommended additional tools that contribute to reliable data analyses, informed decision-making success, and anticipation of second- and third-order effects. The study of social leadership acumen is provided in order to develop advanced skills in accountability, diversity, team building, coaching/mentoring, and leadership/counseling. Lessons at the strategic level provide a macro view for developing leaders. Finally, resource management, strategic tools, strategic thinking, and leading change in organizations are addressed as key areas for organizational success and, ultimately, mission accomplishment.

Warfare and Profession of Arms**66 Contact Hours**

The Warfare and Profession of Arms course deals with how company-grade officers conduct themselves and lead others as warriors and Airmen in the conduct of air operations. Students learn how their unique profession stresses the importance of keeping themselves and their people physically, mentally, and spiritually well in order to accomplish the mission. Additionally, course materials explain how Air Force core values and airmanship form the basis of ethical conduct, which is manifest in part through the military justice system. Students also learn the tools of their trade, to include how Air Force doctrine guides the application of airpower through the service's roles, functions, and mission. Because the Air Force is just one part of the joint fight, students learn how sister services operate by themselves and with the Air Force, as well as how joint planning concepts synergistically employ all services in accomplishing mission objectives.

Integration and Application**23 Contact Hours**

In this course, students work independently and in groups on a variety of projects designed to demonstrate their content mastery of the preceding three courses. These projects include developing personal biographies and development plans as well as analyzing journal articles. Students provide feedback to their peers prior to the submission of projects to instructors at Air University for review and scoring. Online forums with discussion questions are available for student response and comment. For this course, students must select their four-week, instructor-led, DL term.

Squadron Officer College

Leadership Development Program

Professional Continuing Education

Internet Address

<http://www.au.af.mil/au/soc/ldp.asp>

Program Description. The four courses in the Leadership Development Program (LDP) each focus on selected officer competencies defined by the Air Force Institutional Competency List (ICL; AFDD 1-1, *Leadership and Force Development*, and AFPD 36-26, *Total Force Development*). LDP courses are self-paced, optional courses that are offered through Squadron Officer College's distance learning program (SOC-DL). These courses are applicable across the force and include such topics as foundations of officership, expeditionary leadership, organizational leadership, and small-unit (flight) leadership. The courses are designed to promote leadership skill development across the force by presenting the processes and skills necessary for practical military leadership in a variety of environments and, when appropriate, for leading change.

USAF active duty, AFRES, ANG officers, and Air Force civilians may enroll in LDP courses via a self-enrollment DL process. Enrollees will have six months in which to complete a course, or they will be disenrolled.

Course completion appears in students' professional education records via their development plan on the AF Portal at the following link: <https://w20.afpc.randolph.af.mil/MYXDP>. Course completion will also appear on the member's AU transcript. Students do not receive any PME credits for completion, and LDP courses cannot be transferred into AU degree programs.

Learning Outcomes

- Officer Development
 - o Comprehend the essential role that followership plays in mission accomplishment.
 - o Comprehend fundamental principles of self-assessment and self-development as they apply to leadership growth.

- o Comprehend the need for clear, concise, and convincing verbal and written communication in the leadership development process.
- o Comprehend basic roles and norms of interpersonal communication: active listening, powerful conversations/discussion, feedback, and impact on others.
- Expeditionary Leadership
 - o Comprehend the concept of warrior ethos.
 - o Comprehend the concept of cross-cultural competency.
 - o Analyze how expeditionary leadership employs the concepts of hardiness of spirit, honing skills, and military bearing for mission accomplishment.
 - o Analyze the role of cross-cultural competence (3C) in expeditionary leadership.
- Flight Commander
 - o Apply methods to develop and inspire others.
 - o Apply methods to take care of others.
 - o Comprehend the unique contributions that each individual brings to the unit to accomplish the mission.
- Organizational Leadership
 - o Comprehend the evolution of organizational theory and application in the Air Force.
 - o Analyze the concepts of organizational behavior and organizational communication within organizations.
 - o Comprehend the impact of resource stewardship on mission accomplishment.
 - o Analyze leadership skills and techniques for the continuous improvement of Air Force organizations.
 - o Apply organizational change initiatives to leading change.

Faculty Credentials. The courses are developed and maintained by doctorally qualified faculty members in association with Air Force officer curriculum developers and professional instructional system designers (ISD).

Duration. Self-paced with allowed time of no less than 15 days and no greater than six months per course.

Eligibility. Reference AFI 36-2301, *Developmental Education*. USAF active duty, AFRES, ANG officers, and civilian equivalents. There is no active-duty service commitment.

Enrollment Requirements. Enroll online at <http://www.au.af.mil/au/soc/curriculum.html>.

Completion Requirements. Students must complete two or three proctored examinations (depending on the course) at base education offices/test control facilities.

Course Descriptions

MLDP001 Officer Development

117 Contact Hours

The Officer Development (OD) course develops officer skills in three leadership-related units aligned with the Air Force Institutional Competency List (ICL): followership; develops self, speaking, and writing; and active listening. This course addresses followership, regarded as a critical element of leadership and officership. This is followed by an examination of skills related to effective spoken and written communication in the context of the twenty-first-century Air Force, where advanced technology and ubiquitous access to information present unforeseeable opportunities, challenges, and risks. Through this course, students develop broad perspectives of current issues and associated tools aimed at enhancing professional competence beyond individual specialties. Further, Airmen increase their value to their units by understanding and being able to apply interoperability; develop skills necessary to lead, follow, and manage; and become better “Wingmen,” caring for peers and subordinates alike. (PDS Code L09)[Lima-Zero-Nine]

MLDP002 Expeditionary Leadership

99 Contact Hours

The Expeditionary Leadership (EL) course develops officer skills in two leadership-related units aligned with the Air Force ICL: global, regional, and cultural awareness and the warrior ethos. This course provides an understanding of regional factors that affect national foreign policy and explores global, regional, and cultural issues associated with participating in joint and coalition operations. It stresses the importance of cultural awareness and

intercultural competence when dealing with the peoples of regions likely to require US military assistance. The course also examines deployment-specific leadership issues focusing on the warrior ethos, including mental and physical preparation, military bearing, and self-discipline. (PDS Code LI9)[Lima-India-Nine]

MLDP003 Flight Commander

102 Contact Hours

The Flight Commander (FC) course develops officer skills in three leadership-related units aligned with the Air Force ICL: develops and inspires others, takes care of people, and diversity. In addition, other ICL competencies are referenced throughout the course to support a holistic approach to students' development of ICL skills. This course examines command from the perspective of officers in formal leadership billets. The course also explores building leaders, motivation, force development, mentoring, organizational design and decision making, power and authority, morality and ethics, leading change, organizational culture, and communication. It examines the roles, responsibilities, knowledge, skills, and attitudes expected of officers in leadership positions. Academic content and practical examples are integrated to leverage officers' education, training, and experience to equip them with new or enhanced skill sets. These include the ability to inspire, develop, and take care of diverse groups of individuals while leading them to mission success. (PDS Code L10)[Lima-One-Oscar]

MLDP004 Organizational Leadership

96 Contact Hours

The Organizational Leadership (OL) course develops officers' skills in three leadership-related units aligned with the Air Force ICL: resource stewardship, change management, and continuous improvement. The course addresses organizational and management skills necessary for an officer to support and lead change in complex institutional structures. The focus is on basic organizational theory and communications, organizational behavior, resource stewardship, strategies for continuous improvement, and change management/leading change. It enhances officers' ability to deal with complex communication patterns as well as human resource issues that may affect mission capabilities, while using appropriate methods to identify opportunities, implement viable solutions, and measure the impact of outcomes. Further, the lessons examine, inform, and analyze the academic models of leadership. (PDS Code L21)[Lima-Two-India]

International Officer School

Internet Address

<http://www.au.af.mil/au/spaatz/ios>

Program Description. The International Officer School's (IOS) curriculum consists of three preparatory courses for Air War College, Air Command and Staff College, and Squadron Officer School that have three basic functions. First, they provide an academic orientation to follow-on PME school curriculum and methodologies. Second, they serve to facilitate cross-cultural adjustment for the international military students (IMS) and their dependents. Third, they accomplish the administrative requirements and Field Studies Program objectives outlined in international military training management directives. Attendance at IOS is a prerequisite for IMSs enrolling at SOS, ACSC, and AWC.

Learning Outcomes. IOS produces graduates who are able to:

- Understand and appreciate American society, institutions, and ideals.
- Understand the United States military missions, organizations, and terminology necessary to participate in resident PME programs.
- Effectively communicate, integrate, and perform, both academically and socially, in the PME environment.

Faculty. Qualifications for IOS faculty are determined by relevant academic credentials, professional functional experience, teaching experience, and teaching abilities. Academic credentials normally include appropriate degrees. Professional experience normally includes depth and breadth of experience in the functional area assigned.

Duration. Each IOS preparatory course is delivered in seven weeks.

Eligibility. The deputy under secretary of the Air Force for international affairs (SAF/IA) invites countries to attend AU PME courses by means of the Air Force Security Assistance Training Squadron (AFSAT) in coordination with regional combatant commanders. Global security cooperation offices must ensure each IMS is properly vetted in accordance with Defense Security Cooperation Agency (DSCA) and military department guidance. IMSs must

also meet minimum English competency levels for their respective course of attendance.

All three preparatory courses require an English comprehension-level test score of 80. Students attending Squadron Officer School must meet certain physical standards outlined in the Air Force Education and Training Course Announcements (ETCA).

Refer to the ETCA website at <https://etca.randolph.af.mil> for additional information. ETCA course numbers: MIOS001 for the SOS Preparatory Course, MIOS002 for the ACSC Preparatory Course, and MIOS003 for the AWC Preparatory Course.

Completion Requirements. Students must meet all academic requirements to graduate.

Curriculum Summaries

| MIOS001 SOS Preparatory Course | Contact Hours |
|---------------------------------------|----------------------|
| Administration | 17 |
| Field Studies Program | 76 |
| Communications | 81 |
| Military Studies | 13 |
| Leadership | 37 |
| Total | 224 |

| MIOS002 ACSC Preparatory Course | Contact Hours |
|--|----------------------|
| Administration | 33 |
| Field Studies Program | 81.5 |
| Communications | 98.5 |
| Military Studies | 15.5 |
| Leadership | 6 |
| Total | 234.5 |

| MIOS003 AWC Preparatory Course | Contact Hours |
|---------------------------------------|----------------------|
| Administration | 27 |
| Field Studies Program | 121 |
| Communications | 80 |
| Military Studies | 39 |
| Total | 267 |

Course Descriptions

SOS Preparatory Course

224 Contact Hours

This course prepares international officers in the ranks of first lieutenant and captain to participate in SOS. Instruction curriculum focuses on transformational leadership and followership skills, as well as developing communication skills required to engage with peers in creative, analytical thought and a better understanding of application of airpower to foster teamwork and team building. Instruction also includes the traditions and ideals of US society, US defense organization, leadership topics, physical fitness, and language and communication skills specific to SOS.

ACSC Preparatory Course

234 Contact Hours

This course prepares international officers in the ranks of major and lieutenant colonel to participate in ACSC. Instruction curriculum focuses on developing creative, analytical thought and a better understanding of command and the application of airpower to foster teamwork and team building. Instruction also includes the traditions and ideals of US society through the Field Studies Program, the US defense organization, leadership and ethical decision making, and language and communication skills specific to ACSC.

AWC Preparatory Course

267 Contact Hours

This course prepares international officers in the ranks of lieutenant colonel and colonel to participate in AWC. The course's core curriculum focuses on development of critical thinking, professional writing and communication skills, and an introduction to regional security issues, US history, and a survey of US defense capabilities and national security agencies and issues. Additionally, the course immerses the students in US culture and institutions through the extensive Field Studies Program.

SYLLABI

(Each course includes the following instructional areas.)

Administration. During this course phase, IMSs in-process and receive tours and briefings about Maxwell AFB and the city of Montgomery. They receive orientation in various aspects of the individual IOS preparatory courses and programs. This includes welcome and graduation ceremonies, curriculum, and schedule briefings and a tour of the Muir S. Fairchild Research Informa-

tion Center. Students participate in formal and informal feedback sessions with instructors throughout the courses as needed.

Field Studies Program. The Field Studies Program is the largest curriculum area and allows students to gain a better understanding of US institutions, ideals, and culture. Topics include the American way of life, US government institutions, the election process, education, and US news media. A significant portion of this program is devoted to democratic ideals, the rule of law, human rights, diversity, and related training to support Departments of State and Defense objectives for security assistance training. Field trips and tours are conducted in the Montgomery area, southeast region of the United States, Washington, DC, and New York City.

Communications. Communication skills development constitutes a significant part of the instruction at IOS. This area includes English language instruction designed to increase the student's ability to write, speak, and understand American English and communicate ideas both orally and in writing according to USAF standard. In addition, writing and briefing instruction, with application exercises and assignments, is provided based on the follow-on PME school's communication requirements. This area also includes computer instruction with hands-on training in applications relevant to the specific follow-on PME school.

Military Studies. The Military Studies area introduces students to the mission, organization, policies, concepts, and terminology of the US military.

Leadership. Students are introduced to various leadership theories, concepts, and models; instruction is geared at a level appropriate to the follow-on PME school. This area also introduces the physical fitness requirements (for students attending SOS), with emphasis on leadership, followership, problem solving, and team building.

Other Programs

IOS conducts several nonacademic programs to enhance the cultural experience and academic education of international military students and their dependents.

Alabama Goodwill Ambassadors (AGA). AGA is the official AU sponsorship program for IMSs and their families. It welcomes and acquaints them

with aspects of American culture to which they may not otherwise gain exposure through their formal AU courses and activities.

International Family Loan Program. This program lends IMSs and their families (for a nominal fee) such essential household items as dishes and utensils. This service eliminates the need for students to purchase items they would discard before leaving AU.

International Family Orientation Program. This two-week family orientation program is conducted each summer for the dependents of the IMSs attending ACSC and AWC. It orientates students to American culture and local community services, activities, and institutions. Recreational activities are also conducted for the children.

Air University International Honor Roll. This honor roll recognizes international graduates of AU PME courses who have become heads of service, ministers of defense, heads of state, or other high-level officials within their own countries.

International Dependents English Course. This six-week course, conducted each fall, provides conversational English skills that adult IMS dependents need daily. While managed by IOS, the course is taught entirely by volunteers from Maxwell and the local community.

Advanced Nuclear Concepts Course

Internet Address

<http://cpc.au.af.mil/>

Program Description. The course provides an in-depth look at key aspects of the Air Force nuclear enterprise to enable better understanding of nuclear deterrence history, theory, and application; nuclear operations policy and strategy; nuclear incident/accident response; and nuclear surety and effects.

Learning Outcome. Provide an in-depth study of the US nuclear enterprise that will allow core nuclear Airmen to assume leadership/higher headquarter positions dealing with the implementation of nuclear policy, management of the nuclear enterprise, and execution of strategic deterrence operations.

Faculty. The qualifications for faculty include extensive backgrounds in the Air Force nuclear enterprise (nuclear operations [e.g., ICBM/bomber operations], nuclear security forces, missile and nuclear weapons maintenance, arms control, weapons systems acquisition, and/or policy development) to provide the professional functional expertise. The course uses adjunct professors, visiting instructors, and subject-matter experts from AU, National Nuclear Security Administration (NNSA), National Nuclear Laboratories (e.g., Sandia National Lab [SNL], Lawrence Livermore National Lab [LLNL], and Los Alamos National Lab [LANL]), Air Force Nuclear Weapons Center (AFNWC), Headquarters Air Staff, Defense Threat Reduction Agency (DTRA), Air Force Global Strike Command (AFGSC), and United States Strategic Command (USSTRATCOM) to provide specific academic focus on nuclear topics. In addition, a retired Air Force general officer with extensive experience in the Air Force nuclear enterprise serves as an in-resident senior mentor for each class.

Duration. This course is delivered in five days.

Eligibility. E8–E9, O4–O6, civilian equivalent core nuclear Airmen assigned to squadron/group leadership positions or occupying Headquarters Air Force, major commands, combatant commands, numbered air forces, and joint staff billets at the action officer/branch chief level with nuclear operations, maintenance, logistics, support, or acquisition responsibilities within the nuclear enterprise. DOD secret security clearance with restricted data and critical nuclear weapons design information access is required for the course.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MNUC300).

Completion Requirement. Students must complete the following 40-hour in-resident program and demonstrate satisfactory understanding of the Air Force nuclear enterprise by successfully finishing the end-of-course exercise to graduate.

Course Description

MNUC300 Advanced Nuclear

Concepts Course

40 Contact Hours

The major areas of instruction cover nuclear history and lifecycle, nuclear effects, nuclear surety, nuclear command and control, nuclear policy/strategy/

deterrence theory, the US nuclear enterprise, nuclear accident/incident response, and stockpile maintenance and sustainment. These subjects are essential for individuals who have reached at least the nine-year point working in the Air Force nuclear enterprise. The course is designed to enhance awareness of the USAF's nuclear mission among core nuclear Airmen occupying or moving into wing/squadron leadership and/or HHQ staff positions who deal with the implementation of nuclear policy, management of the nuclear enterprise, and execution of nuclear deterrence operations. Facilitated discussions and exercises are designed to enhance student critical thinking on twenty-first century nuclear deterrence operations issues. Attendees receive updates on current Air Staff/DOD/Department of Energy nuclear policy and procedures. This course is taught four times per year at Kirtland AFB, NM. This education is a primary component of the CSAF's vision to strengthen the Air Force nuclear enterprise.

Senior Leader Nuclear Management Course

Internet Address
<http://cpc.au.af.mil/>

Program Description. The purpose of the Senior Leader Nuclear Management course is to provide a forum for senior leaders to discuss deterrence theory, nuclear policy, arms control, and other nuclear issues.

Learning Outcome. Facilitate discussions on nuclear issues and implications for the nuclear enterprise.

Faculty. The qualifications for faculty include extensive backgrounds in the Air Force nuclear enterprise (nuclear operations [e.g., ICBM/bomber operations], nuclear security forces, missile and nuclear weapons maintenance, arms control, weapons systems acquisition, and/or policy development) to provide professional functional expertise. The course uses adjunct professors, visiting instructors, and subject-matter experts from AU, NNSA, National Nuclear Laboratories (e.g., SNL, LLNL, and LANL), AFNWC, Headquarters Air Staff, DTRA, AFGSC, and USSTRATCOM to provide specific academic focus on nuclear topics. In addition, a retired Air Force general

officer with extensive experience in the Air Force nuclear enterprise serves as an in-resident senior mentor for each class.

Duration. This course is delivered in two days.

Eligibility. Senior leaders with the following experience and/or background are eligible to attend this course: (1) working internal to the nuclear enterprise in an O-6/civilian-equivalent level HAF/MAJCOM three-letter or wing/group command billet, (2) E-9 in similar functional expert billets, and (3) flag officers and senior executive service (SES) personnel that have nuclear responsibilities anywhere in their portfolio of responsibilities. A DOD top secret security clearance is required for the course.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MNUC400).

Completion Requirement. Students must complete the following 16-hour resident program and participate in case-study development to graduate.

Course Description

MNUC400 Senior Leader Nuclear Management Course

16 Contact Hours

This course prepares senior Air Force leaders (O-6 commanders, flag officers, and SES personnel) with the leadership tools and understanding of command challenges, resources, and operational concepts that are the basis of the US government's nuclear weapons posture. Facilitated small-group discussions and focused case studies examining US nuclear policy, doctrine, and deterrence strategy and theory enhance participants' understanding, articulation, and advocacy of USAF nuclear policy positions. A retired Air Force general officer with extensive experience in the Air Force nuclear enterprise serves as an in-resident senior mentor and facilitator for each class. This education is a primary component of the CSAF's vision to strengthen the Air Force nuclear enterprise.

Officer Training School Academic Instructor Course

Internet Address

<http://www.au.af.mil/au/holmcenter/OTS/index.asp>

Program Description. The Officer Training School Academic Instructor Course (OTS AIC) curriculum identifies and measures variables related to such educational processes as content, alternative methods of instruction, instructional resources, and the degree to which stated objectives are achieved at the appropriate instructional level. The curriculum also develops the student's ability to effectively and efficiently address the organization's personnel requirements, unit support, and cadet support processes.

Learning Outcomes. As a graduate of the OTS AIC, the student will be able to conduct the following:

- Plan instruction. The graduate must comprehend the domains of learning related to instructional design, the process of designing level-of-learning lessons, and the various methods of teaching. The graduate must also know the components of the Air Force instructional system design (ISD) model.
- Deliver instruction. The graduate must comprehend how to prepare an effective presentation, use questions effectively to promote learning, employ proxemics to enhance the learning environment, and incorporate reflective teaching techniques to improve teaching ability.
- Evaluate instruction. The graduate must comprehend the concept of educational evaluation; the principles and techniques of writing student-centered, multiple-choice, and essay test items as part of the ISD design phase; and the systematic construction and use of performance evaluation rating instruments.
- Demonstrate instructional competency. The graduate must apply instructional competency through teaching exercises.

Faculty. The Holm Center employs faculty in both teaching and nonteaching capacities. The faculty combines several years of teaching experience and advanced degrees. Faculty members are selected upon the basis of performance record, experience base, academic achievement, and teaching ability. In addition to numerous teaching responsibilities, the faculty presents at various workshops and is actively involved with professional academic associations throughout the education profession. Therefore, the courses establish a viable development and enrichment program for all faculties.

Duration. The OTS AIC is delivered in eight academic days.

Eligibility. The course is primarily intended for military and civilian individuals who have been selected to teach at the Officer Training School's Basic Officer Training (BOT), Commissioned Officer Training (COT), Reserve Commissioned Officer Training (RCOT), or Academy of Military Science (AMS) courses.

Completion Requirement. Students must maintain a "satisfactory performance" evaluation or better to graduate.

Course Description

MOTS004 OTS Academic

Instructor Course

64 Contact Hours

This course prepares instructors to teach at OTS. This is a structured, comprehensive, and fast-paced course that requires extensive reading and writing by students to prepare personalized lesson plans. Major curricular areas focus on communication skills, teaching methodologies, lesson planning, and evaluation methodology. This course is designed to maximize opportunities for learning and practicing basic instructor skills. The majority of the course is devoted to small-group activities. Students must plan and present teaching lessons that meet their individual schools' needs. They are encouraged to use their core lesson plans and subject matter to prepare the required lessons.

Officer Training School

Internet Address

<http://www.au.af.mil/au/holmcenter/OTS/index.asp>

Program Description. The Officer Training School's major areas of instruction include leadership studies, military training and application, the profession of arms, warfare studies/international security studies, and communication skills. OTS teaching methods include auditorium lectures, readings, flight-room classes (informal lecture, guided discussion, and case studies), and practical exercises.

Learning Outcomes. As graduates of the Holm Center's commissioning education program, students will be able to do the following:

- Comprehend the roles and responsibilities of an Air Force officer.
- Comprehend the Air Force human relations programs such as equal opportunity and treatment.
- Effectively apply leadership skills.
- Effectively apply followership skills.
- Comprehend the importance of adherence to Air Force core values.
- Effectively express ideas verbally in a military setting.
- Effectively express ideas in writing using military writing formats.
- Know the role of air and space power in maintaining national security.
- Know the role of joint operations in US national security.
- Comprehend the principles of cross-cultural communications.

Faculty. Before assuming leadership of a flight, each flight commander must attend and be certified through the OTS AIC, Initial Qualification Training, and Mission Qualification Training.

Duration. OTS currently conducts eight BOT classes, six COT classes, two RCOT classes, and four AMS classes each year. The BOT program is 47 training days; the COT program is four-and-one-half weeks long (23 training days); the RCOT program is two weeks long (13 training days), plus the cor-

respondence portion; and the AMS program is six weeks long (40 training days). In fiscal year (FY) 2012, BOT graduated 641 students, COT/RCOT graduated 1,436 students, and AMS graduated 433 officers. These numbers are expected to change to nearly 2,800 in FY 2013.

Eligibility. Students attending BOT must have a bachelor's degree, be less than 30 years of age for rated personnel or 35 years of age for all others, and meet minimum physical requirements for becoming an officer. Competition for entry into this program is rigorous. The following tables summarize BOT, COT, RCOT, and AMS curricula.

Completion Requirement. Students must maintain a "satisfactory performance" evaluation or better to graduate.

Basic Officer Training Curriculum Summary

| MOTS001 Instructional Areas | Contact Hours |
|---|---------------|
| Leadership Studies/Field Leadership | 163.50 |
| Communication Skills | 17.00 |
| Profession of Arms | 23.00 |
| Warfare Studies/International Studies | 43.00 |
| Military Training/Field Training | 22.00 |
| Admin/Processing/Testing/Orientation/Counseling | 133.50 |
| Physical Training/Air Force Combatives Program | 53.00 |
| Air Force Culture/Drill and Ceremonies | 84.25 |
| Total | 639.25 |

Course Description

MOTS001 Basic Officer Training (24th Training Squadron)

639.25 Contact Hours

This course provides precommissioning training for selected applicants to meet Air Force requirements by career area. It includes communication skills, leadership studies, professional knowledge, warfare studies, and military application and training (practical field leadership, physical fitness, and drill and ceremonies). These basic military subjects are essential in developing selected college graduates to take their places as second lieutenants in the Air Force.

BOT is a challenging 47-training-day program that imparts to its active duty and AFRES graduates the importance of leadership, discipline, attention to detail, and dedication to service. It stresses commitment to the profession of arms and motivates graduates to adhere to the highest standards of integrity, service before self, and excellence in all they do. This challenging environment provides numerous tests for leadership skills through classroom and field-training exercises and operation of the officer trainee and student wing. The capstone event is a three-day, two-night AEF exercise.

Commissioned Officer Training Curriculum Summary

| MOTS002 Instructional Areas | Contact Hours |
|--|----------------------|
| Leadership Studies | 35.00 |
| Communication Skills | 9.00 |
| Profession of Arms | 18.00 |
| Warfare Studies/International Security Studies | 15.00 |
| Drill and Ceremonies | 16.50 |
| Flight Commander Time | 28.00 |
| Physical Training | 23.00 |
| Air Force Culture | 18.50 |
| Assessments/Preparation | 9.00 |
| AEF/Combat Skills | 47.00 |
| Administration/In-Processing | 47.50 |
| Total | 266.50 |

Course Description

MOTS002 Commissioned Officer Training (23rd Training Squadron)

266.50 Contact Hours

COT is an intense 23-day program. It provides the fundamentals of officer-ship and the initial leadership training required for newly commissioned medical, chaplain, and judge advocate Air Force officers (active duty, ANG, and AFRES). It stresses commitment to the profession of arms and motivates graduates to live up to Air Force core values. The ranks of COT students range from second lieutenant to lieutenant colonel depending on the newly commissioned officers' professional qualifications. A three-day, two-night AEF exercise is the capstone event for COT. Additionally, the Medical Readiness Indoctrination Course is incorporated into the AEF exercise for medical service officers.

This course provides training in basic military subjects essential in developing directly commissioned officers to serve in the US Air Force. It provides postcommissioning training for officers in the US Air Force medical services (Medical Corps, Dental Corps, Nurse Corps, Medical Service Corps, and Bio-medical Science Corps), Judge Advocate General Corps (legal), and Chaplain Corps; AFRES officers selected to participate in the Air Force Health Professions Scholarship Program (HPSP); and those enrolled in the Uniformed Services University of the Health Sciences (USUHS). This training is also provided for those officers selected to serve in the AFRES and ANG. Training includes, but is not limited to, instruction in four major areas: profession of arms, warfare and international security studies, leadership studies, and communication skills. The profession of arms area includes dress and grooming; professional appearance; customs and courtesies; pay, leave, and allowances; and base services. Warfare and international security studies classes include Air Force heritage, terrorism/force protection, and US policy. Leadership studies classes include leadership and management theory and officership. Leadership instruction is reinforced with practical field-leadership exercises. Communication skills include basic military speaking principles and writing formats. Drill and ceremonies and physical fitness training are also included.

Reserve Commissioned Officer Training (In Residence)

Curriculum Summary

| MOTS003 Instructional Areas | Contact Hours |
|------------------------------------|----------------------|
| Leadership Studies | 31.00 |
| Communication Skills | 6.00 |
| Profession of Arms | 16.00 |
| Warfare Studies | 7.00 |
| Drill and Ceremonies | 3.50 |
| Flight Commander Time | 5.00 |
| Physical Training | 8.50 |
| Air Force Culture | 3.50 |
| Assessments | 2.00 |
| AEF/Combat Skills | 30.00 |
| Administration/In-Processing | 25.00 |
| Total | 137.50 |

Course Description

MOTS003 Reserve Commissioned Officer Training (In Residence)

137.50 Contact Hours

The Reserve Commissioned Officer Training (RCOT) course is an abbreviated course designed to train hard-to-recruit ANG and AFRES medical professionals. It combines distance learning correspondence work and a web-based pretest with a demanding 13-day in-residence course.

This course provides training in basic military subjects essential to developing medical officers in the US AFRES and ANG. Training includes, but is not limited to, instruction in four major areas: profession of arms, warfare and international security studies, leadership studies, and communication skills. The profession of arms area includes dress and grooming; professional appearance; customs and courtesies; pay, leave, and allowances; and base services. Warfare and international security studies classes include Air Force heritage, terrorism/force protection, and US policy. Leadership studies classes include leadership and management theory and officership. Leadership instruction is reinforced with practical field leadership exercises. Communication skills include basic military speaking principles and writing formats.

Academy of Military Science

Curriculum Summary

| YAMS000 Instructional Areas | Contact Hours |
|---|----------------------|
| Leadership Studies | 47.00 |
| Communication Skills | 18.00 |
| Profession of Arms | 20.00 |
| Warfare Studies/International Security Studies | 21.00 |
| Military Training and Application/Drill/Culture | 147.00 |
| Admin/Processing/Testing/Orientation/Counseling | 29.50 |
| Physical Training | 19.00 |
| Total | 301.50 |

Course Description

YAMS000 Academy of Military Science (ANG Readiness Center Detachment 12)

301.50 Contact Hours

The Academy of Military Science (AMS) provides precommissioning training for selected applicants to meet ANG requirements by career area. It provides instruction in basic military subjects essential in developing selected college graduates to take their places as second lieutenants in the Air Force with both state and federal responsibilities. The course includes communication skills, leadership studies, professional knowledge, warfare studies, and military application and training (practical field leadership, physical fitness, and drill and ceremonies). Although operationally assigned to OTS, AMS is not an AU course; assignment to classes is managed by the ANG.

AMS is a challenging 40-training-day program that imparts to its ANG graduates the importance of leadership, discipline, attention to detail, and dedication to service. It stresses commitment to the profession of arms and motivates graduates to adhere to the highest standards of integrity, service before self, and excellence in all they do. Students are also provided education in ANG heritage and their role as “citizen Airmen,” as the majority of AMS students are traditional Guard members who also have civilian careers. This challenging environment provides numerous tests for leadership skills through classroom and field-training exercises and operation of the officer trainee and student wing. The capstone event is a three-day, two-night AEF exercise.

Civilian Acculturation and Leadership Training

Internet Address

<http://www.au.af.mil/au/holmcenter/CALT/index.asp>

Program Description. The major areas of instruction in Civilian Acculturation and Leadership Training (CALT) include leadership studies, the profession of arms, warfare studies, and communication skills. The CALT teaching methods include auditorium lectures, readings, flight-room classes (informal lecture, guided discussion, and case studies), and practical exercises to include numerous problem-solving activities and war gaming.

Learning Outcomes. The Holm Center's CALT program graduates will:

- Comprehend the roles and responsibilities of an Air Force leader.
- Comprehend the Air Force human relations programs such as equal opportunity and treatment.
- Comprehend leadership skills.
- Comprehend followership skills.
- Comprehend the importance of adherence to Air Force core values.
- Effectively express ideas verbally in a military setting.
- Effectively express ideas in writing using military writing formats.
- Know the role of air and space power in maintaining national security.
- Know the role of joint operations in US national security.

Faculty. The CALT faculty consists of military and civilian instructors. Civilian faculty members are carefully selected career employees serving in career-broadening assignments. All CALT faculty members attend instructor training before assuming classroom responsibilities and must complete an extensive faculty certification program where they must satisfactorily demonstrate their teaching skills and content mastery.

Duration. The CALT program is delivered in 10 academic days.

Eligibility. The CALT program accepts applications from Air Force civilians who have from two to five years of continuous federal service, have no prior military service, and hold a bachelor's degree. There are six to eight classes per year with 26 students in each class.

Completion Requirements. Students must successfully complete the entire course.

Curriculum Summary

| MOTS009 Instruction Areas | Contact Hours |
|--------------------------------------|---------------|
| Leadership Studies | 48 |
| Communication Skills | 7 |
| Profession of Arms | 5 |
| Warfare Studies | 10 |
| Processing/Admin/Orientation/Testing | 8 |
| Total | 78 |

Course Descriptions

Leadership Studies

48 Contact Hours

These lessons examine the principles of leadership, the leadership competencies of the Air Force, and how the Air Force core values tie into leadership; consider the complex and challenging area of change management; and allow students to discuss a series of case studies designed to give them an opportunity to apply corrective supervision and counseling techniques in role-play situations. They also examine the nature of effective followership, highlight the value of individuals bringing dissimilar backgrounds and experiences together and how it enhances overall team performance, give a basic introduction for ethics training, and cover the five functions of management. Additionally, lessons introduce students to the concept of power and how it affects the leadership process, explore the Air Force's eight-step problem-solving process, present an introduction to stress management, lay the foundation for team building, and provide basic guidelines for workplace professionalism.

Communication Skills

7 Contact Hours

These lessons give students an introduction to military writing, specifically writing accomplishment-impact bullet statements, and a game plan for preparing a military briefing, emphasizing the basics of delivery, appearance, voice, eye contact, gestures, and movement. Students are required to turn in a talking paper and deliver a professional military briefing.

Profession of Arms

5 Contact Hours

These lessons provide insight into air expeditionary concepts and Air Force core values and explain the Air Force policy on professional and unprofessional relationships.

Warfare Studies**10 Contact Hours**

These lessons discuss the levels of air and space doctrine, each Air Force core function, the means and methods by which the Air Force accomplishes assigned missions, and the resources used to execute missions.

Processing/Admin/Orientation/Testing**8 Contact Hours**

These instruction areas include in-processing, course overview, assignments, testing, graduation, and out-processing.

Air Force Reserve Officer Training Corps Instructor and Orientation Courses

Internet Address

<http://www.afrotc.com>

Program Description. The Air Force Reserve Officer Training Corps Instructor and Orientation Courses consist of three separate courses: a detachment commander course, a classroom instructor course, and an NCO orientation course. The curricula for the detachment commander and classroom instructor courses identify and measure variables related to the educational process such as content, alternative methods of instruction, instructional resources, and the degree to which stated objectives are achieved at the appropriate instructional level. The curriculum also develops the student's ability to effectively and efficiently address the organization's personnel requirements, unit support, and cadet-support processes. The NCO orientation course focuses on the administrative and personnel functions of an AFROTC detachment.

Learning Outcomes. As a graduate of the Holm Center's detachment commander and classroom instructor courses, the student must be able to do the following:

- Plan instruction. The graduate must comprehend the domains of learning related to instructional design, the process of designing level-of-learning lessons, and the various methods of teaching and must know the components of the Air Force ISD model.

- **Deliver instruction.** The graduate must prepare effective presentations, use questions effectively to promote learning, employ proxemics to enhance the learning environment, and incorporate reflective teaching techniques to improve teaching ability.
- **Evaluate instruction.** The graduate must comprehend the concept of educational evaluation and principles and techniques of writing student-centered multiple-choice and essay test items as part of the ISD design phase and the systematic construction and use of performance evaluation rating instruments.
- **Demonstrate instructional competency.** The graduate must apply instructional competency through teaching exercises.
- **Address unit requirements.** The graduate must comprehend the organization's personnel requirements, unit support, and cadet or student-support processes.

Faculty. The Holm Center employs faculty in both teaching and nonteaching capacities. The faculty combines several years of teaching experience and advanced degrees. They are selected upon the basis of performance record, experience base, academic achievement, and teaching ability. In addition to resident instructors, some faculty are augmentees from various AFROTC units.

Duration. The detachment commander and classroom instructor courses are delivered in eight academic days; the enlisted orientation course is delivered in nine academic days.

Eligibility. Detachment commanders, classroom instructors, and detachment NCOs are selected through the Air Force assignment system. Detachment commanders and some classroom instructors must be approved by the university with which they will serve.

Completion Requirement. Students must maintain a grade of “satisfactory performance” or better to graduate.

Curriculum Summary

| Course Number and Title | Contact Hours |
|--|---------------|
| MAFROTC005 AFROTC Detachment Commander Instructor and Orientation Course | 64 |
| MAFROTC002 AFROTC Assistant Professor of Aerospace Studies Instructor and Orientation Course | 64 |
| MAFROTC001 AFROTC NCO Orientation Course | 72 |

Course Descriptions

MAFROTC 005 AFROTC Detachment Commander Instructor and Orientation Course

64 Contact Hours

An eight-day, mission-essential course hosted and managed by the Holm Center Curriculum Directorate, this course provides newly assigned AFROTC detachment commanders with the skills to teach within the AFROTC academic environment and orients and prepares them for the myriad of AFROTC detachment duties at geographically separated units (GSU). Major areas of study include learning theory, teaching methods, critiquing of student writing, and speaking and evaluation. Students also receive AFROTC instruction in curriculum, professional relations, leadership, counseling, and legal issues and meet with subject-matter experts concerning several administrative and instructional issues.

Similarly, AFROTC instructors of aerospace studies complete the following courses.

MAFROTC 002 AFROTC Assistant Professor of Aerospace Studies Instructor and Orientation Course

64 Contact Hours

An eight-day, mission-essential course hosted by the Holm Center Curriculum Directorate, this course prepares newly assigned AFROTC instructors to teach and supervise within the AFROTC academic environment and orients and prepares them for AFROTC detachment duties at GSUs. Major areas are learning theory, teaching methods, critiquing of student writing, and speaking and evaluation. Methods usually taught include the informal lecture, guided discussion, experiential method, demonstration-performance, and case study. The course provides for maximum participation in learning. The majority of class time is devoted to small-group activity. Each student must plan and present teaching lessons. Students are urged to use AFROTC lesson material to prepare the required teaching lessons and test items. They

also receive ROTC instruction in curriculum, professional relations, leadership, counseling, and legal issues and meet with subject-matter experts concerning instructional development.

Each AFROTC detachment has enlisted personnel assigned to assist with daily operations. These individuals are required to complete the following course.

**MAFROTC 001 AFROTC
NCO Orientation Course**

72 Contact Hours

A nine-day, mission-essential course hosted by the Holm Center Curriculum Directorate, the course seeks to improve performance, increase productivity, and enhance mission accomplishment of new AFROTC cadre members. The detachment enlisted staff is composed of enlisted personnel currently assigned to AFROTC detachments. Newly assigned NCOs are taught the critical aspects of personnel and information management as they relate to the day-to-day operations at AFROTC detachments and the interface between detachments and HQ AFROTC. This course covers the basic skills and knowledge associated with the AFROTC mission and structure, unit support, logistics support, cadet personnel and financial management programs, and various computer functions. The course also addresses various documentation processes, regulatory guidance and procedures, and other topics related to the AFROTC environment.

Air Force Reserve Officer Training Corps

Internet Address

<http://www.AFROTC.com>

Program Description. The primary curriculum areas taught in AFROTC include leadership studies, field leadership, profession of arms, warfare studies, international security studies, and communication skills. Teaching methods include informal lecture, guided discussion, case studies, readings, and practical exercises (athletics, group leadership problems, and the leadership reaction course).

AFROTC offers two primary routes to an Air Force commission for college students: the four-year program and the two-year program. Students attend

AFROTC classes along with other college courses. The four-year program is divided into two phases: the General Military Course (GMC) and the Professional Officer Course (POC). The GMC, which encompasses the freshman and sophomore years, consists of one hour of classroom work and from one to two hours of leadership laboratory each week. Upon completion of GMC requirements, cadets who wish to compete for entry into the last two years of the program, the POC, must do so under the requirements of the POC selection system. After POC selection, students must complete a four-week summer field-training unit at Maxwell AFB to assess their potential as officers. POC cadets attend class three times a week and participate in a weekly leadership laboratory lasting two to three hours. Once enrolled in the POC, cadets are enlisted in the Air Force Reserve and assigned to the Obligated Reserve Section. This entitles them to a monthly nontaxable subsistence allowance.

Cadets not enrolled in AFROTC as freshmen or sophomores complete an academic training program at their host detachment, equivalent to the GMC academic curricula, prior to attending field training. Two-year applicants are not committed to the Air Force until they return to school in the fall and decide to enlist through AFROTC.

Learning Outcomes. As a graduate of the Holm Center's commissioning education program, a new officer must be able to embrace the following:

- Comprehend the roles and responsibilities of an Air Force officer.
- Comprehend the Air Force human relations programs such as equal opportunity and treatment.
- Effectively apply leadership skills.
- Effectively apply followership skills.
- Comprehend the importance of adherence to Air Force core values.
- Effectively express ideas verbally in a military setting.
- Effectively express ideas in writing using military writing formats.
- Know the role of air and space power in maintaining national security.
- Know the role of joint operations in US national security.
- Comprehend the principles of cross-cultural communications.

Faculty. The teaching staff of AFROTC units includes experienced Air Force officers. Selection is determined by professional experience, academic back-

ground, and qualifications as instructors. Detachment commanders and AF-ROTC instructors are required to complete faculty development training at Maxwell AFB, AL, to enhance their teaching skills and learn more about their jobs before reporting for their teaching assignments.

Eligibility. The first two years of the AFROTC college program, the GMC, are open to all students who are at least 14 years old. Second-year scholarship cadets and all cadets entering the last two years of the college program, the POC, must be at least age 17. These contract cadets must meet AFROTC and DOD eligibility standards ranging from physical fitness to US citizenship.

Commissioning Requirements. Students must maintain a “C-” or better grade in Aerospace Education (AS) and the Leadership Laboratory (LLAB) and must have a cumulative grade point average of 2.0 from the university to commission in the US Air Force.

AFROTC Detachment Curriculum Summary

| Course Number and Title | Contact Hours |
|-------------------------|---------------|
| Leadership Studies | 65 |
| Communication Skills | 43 |
| Profession of Arms | 50 |
| Warfare Studies | 67 |
| Admin/Testing | 31 |
| Leadership Laboratory | 240 |
| Field Training* | 380 |
| Total | 876 |

*Standard Field Training 380 Hours

Course Descriptions

For more information regarding AFROTC courses, go to www.afrotc.com/overview/programs.php.

Note that the Air University Registrar’s Office does not provide a transcript for this AFROTC program.

Air Force Junior Reserve Officer Training Corps Academic Instructor Course

Internet Address

<http://www.au.af.mil/au/holmcenter/AFJROTC/>

Program Description. The Air Force Junior Reserve Officer Training Corps (AFJROTC) Academic Instructor Course (AIC) curriculum provides student-centered learning experiences that focus on applying basic principles of learning to specific learning situations, planning meaningful instruction, using sound teaching methods, communicating effectively, and evaluating the achievement of learning objectives.

The AFJROTC Instructor Recertification course curriculum is designed to provide in-service training and faculty development to AFJROTC instructors who have been teaching in private, public, and DOD dependent high schools for at least five years to maintain their teaching credentials and to receive updates on Air Force policy.

These courses are required as determined by AFJROTCI 36-2001, *Air Force Junior ROTC Operations*.

Learning Outcomes. Graduates of AIC must be able to do the following:

- Plan instruction. Graduates must comprehend the domains of learning and the process of planning and preparing coherent instructional activities and exercises targeted to the appropriate learning outcome as prescribed by the Air Force ISD model.
- Deliver instruction. Graduates must prepare effective presentations and employ effective questioning techniques to adapt instructional materials to diverse learning audiences.
- Evaluate instruction. Graduates must comprehend the professional responsibility of receptivity of feedback from colleagues as it relates to their professional development.
- Demonstrate instructional competency. Graduates must apply instructional competency using twenty-first-century learning methodologies through practical teaching exercises.

- Address unit requirements. Graduates must comprehend the professional responsibilities of the organization's personnel requirements, unit support, and cadet- or student-support processes.

Faculty. The Holm Center employs faculty in both teaching and nonteaching capacities. The faculty combines several years of teaching experience and advanced degrees. They are selected because of their performance record, experience base, academic achievement, and teaching ability. In addition to in-residence instruction, some faculty members are role models/mentors from the GSU.

Duration. The AIC is delivered in 10 academic days; the Instructor Recertification course is delivered in 4.5 academic days.

Eligibility. This course is open to retired USAF officers and noncommissioned officers who occupy or have been selected as aerospace science instructors and assistant aerospace science instructors for the AFJROTC program. Student selection is conducted by HQ AFJROTC.

Graduation Requirement. Students must successfully complete the courses in residence.

Course Description

MAFJROTC003 AFJROTC Academic

Instructor Course

80 Contact Hours

This course prepares newly assigned AFJROTC faculty to teach in private, public, and DOD dependent high schools worldwide. It is a rigorous, comprehensive, and fast-paced course that requires extensive reading and preparation and moderate research. Major curricular areas include learning theory, learner-centered instructional activities, setting instructional outcomes through lesson planning, and preparation. Teaching methodologies include formal and informal lecture, guided discussion, teaching interview, group activities, and demonstration performance. The course is organized for maximum participation in learning. A majority of class time is devoted to seminar activities. Students plan and present teaching lessons, develop test items, and participate in specialized labs to meet AFJROTC requirements. Students must effectively plan and present teaching lessons. They are urged to use AFJROTC lesson plans to prepare the required teaching lessons. Students also receive

AFJROTC instruction in curriculum, professional relations, leadership, counseling, twenty-first-century learning standards, classroom performance systems, creative teaching strategies, and diverse learning styles. They are introduced to secondary school challenges and concerns. This required course is directed by AFJROTC Instruction (AFJROTCI) 36-2001, *Air Force Junior ROTC Operations*.

**MAFJROTC008 AFJROTC
Instructor Recertification**

32 Contact Hours

This course provides in-service training to AFJROTC instructors who have been teaching in private, public, and DOD dependent high schools for at least five years to maintain their teaching credentials and to receive updates on Air Force policy. Major curricular areas include teaching skills and effectiveness and secondary education challenges and concerns. Students also receive AFJROTC instruction and guidance on curriculum, a classroom performance system, professional development, operations, instructor management, financial management, individual concerns, wings, and the Cadet Inventory Management System. The course provides for maximum participation in learning and sharing of best practices through presentations, computer lab time, and small group cross-feed sessions. This required course is directed by AFJROTCI 36-2001, *Air Force Junior ROTC Operations*.

Air Force Junior Reserve Officer Training Corps

Internet Address

<http://www.au.af.mil/au/holmcenter/AFJROTC/>

Program Description. AFJROTC is a secondary school program designed to develop citizens of character dedicated to serving their nation and community. To support this mission, the Jeanne M. Holm Center for Officer Accessions and Citizen Development (Holm Center) produces “world-class” twenty-first-century learner-centered academic materials for AFJROTC high school cadets located at 887 secondary schools worldwide. Currently there are over 121,000 cadets in the program.

Each AFJROTC class consists of three components: aerospace science, leadership education, and a wellness program. Citizenship and character edu-

cation, the heart of the curriculum program, are primarily embedded in the leadership education series of courses, while sense of service and education in science and technology-related aerospace science are primarily found in the aerospace science series of courses. The flexibility of the AFJROTC curricula design enables each unit to meet the needs of their programs and accomplish the requirements set forth by the district and/or state. The curriculum is correlated to national standards using the Midcontinent Research for Educational and Learning (McREL) standards. In addition to the McREL standards, the other national standards alignments include the following:

- National Science Education Standards (NSES),
- Math Standards and Expectations,
- National Council for the Social Studies (NCSS),
- Geography for Life—National Geography Standards, and the
- International Society for Technology in Education (ISTE) National Educational Technology Standards for Students (NETS•S).

The correlations and alignments provide the foundation for standards-based curriculum and should assist each unit meeting district and state requirements. To reinforce what is taught in the classroom, students participate in many outside activities such as field trips to military bases, aerospace facilities and industries, museums, civilian airports, and other areas related to aerospace education. AFJROTC units also offer the opportunity to participate in extracurricular activities, including drill and ceremonies, summer leadership schools, and honorary academic groups. Additionally, community service projects are a major part of the AFJROTC experience and help instill a sense of civic pride and citizenship.

The AFJROTC curriculum is awarded continuing accreditation with the Southern Association of Colleges and Schools Council on Accreditation and School Improvement (SACSCASI).

The goals of the AFJROTC program are to instill the values of citizenship, service to the United States, personal responsibility, and a sense of accomplishment.

Learning Outcomes

- To educate and train students in citizenship and life skills
- To promote community service

- To instill a sense of responsibility
- To develop character and self-discipline through education and instruction in air and space fundamentals and the Air Force’s core values of “integrity first, service before self, and excellence in all we do”

Faculty. Retired Air Force commissioned and noncommissioned officers are full-time credentialed faculty members of the participating high school and are employed by the local school board to teach AFJROTC classes.

Duration. Standard academic training is 120–180 contact hours.

Eligibility. The AFJROTC program provides citizenship training and an aerospace science program for high school youth. Enrollment in the AFJROTC program is open to all young people who are in grades 9–12, are physically fit, and are US citizens. Host schools are selected upon the basis of fair and equitable distribution throughout the nation.

Curriculum Summary

| Course Number and Title |
|--|
| AS 100 A Journey into Aviation History |
| AS 200 The Science of Flight: A Gateway to New Horizons |
| AS 220 Cultural Studies: An Introduction to Global Awareness |
| AS 300 Exploring Space: The High Frontier |
| AS 400 Management of the Cadet Corps |
| AS 410 Survival: Survive • Return |
| AS 500 Aviation Honors Ground School |
| LE 100 Citizenship, Character, and Air Force Tradition |
| LE 200 Communication, Awareness, and Leadership |
| LE 300 Life Skills and Career Opportunities |
| LE 400 Principles of Management |
| LE 500 Drill and Ceremonies |

Note: There are 664 school districts nationwide that require each high school with a JROTC program adapt to individual state/district requirements for awarding credit.

Course Descriptions

For more information regarding AFJROTC courses, go to <http://www.au.af.mil/au/holmcenter/AFJROTC/index.asp>.

Ira C. Eaker Center Academic Instructor Course

Internet Address

<http://www.au.af.mil/au/ecpd>

Program Description. Prepares faculty to instruct, plan, develop, and manage academic instruction. The curriculum requires extensive reading, writing, and moderate research. Several instructional methods are taught.

Learning Outcomes

- Demonstrate an ability to plan and develop lesson objectives, including evaluation instruments.
- Demonstrate an ability to clearly communicate to achieve instructional objectives and manage educational processes.
- Show and prove competence in using essential teaching skills that apply to most instructional situations and that evaluate the achievement of learning outcomes.

Faculty. AIC faculty must possess a bachelor's degree and three or more years' experience in civilian or military educational administration, psychology, testing, instruction, or a related discipline.

Duration. This course is delivered in 10 academic days.

Eligibility. Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCPD001).

Completion Requirement. Students must master concepts and techniques of instruction and course management processes to enhance learning.

Course Description

**MCPD001 Eaker Center Academic
Instructor Course**

80 Contact Hours

This course prepares newly assigned faculty to instruct at Eaker Center. It is a rigorous, comprehensive, and fast-paced course that requires extensive

reading, writing, and moderate research. Major curricula areas are learning theory, communication skills, instructional design, teaching methods, and evaluation. The course is organized to provide maximum participation in learning, with the majority of class time devoted to small group activity. Students write level-of-learning objectives and lesson plans, present lessons, and develop rating scales and test items. Students must demonstrate the ability to write, present teaching lessons, and master selected academic content areas. The following methods are taught: informal lecture, guided discussion, case study, experiential instruction, teaching interview, and demonstration performance.

Commanders' Professional Development School

Internet Address

<http://www.au.af.mil/au/ecpd/hr>

Program Description. Prepare attendees for duty as wing commanders, vice wing commanders, group commanders, senior materiel leaders, wing commander and vice wing commander spouses, incident commanders, and emergency operations center directors. The school helps attendees deal with critical leadership and management challenges. The Wing Commanders' Seminar convenes five times each year; the group commanders' courses, five times; and the Air Force Incident Management Course, 15 times a year at Maxwell AFB and 15 times each year at other selected locations.

Learning Outcomes

- Prepare updates on critical issues affecting Air Force members, their people, their mission, and their individual roles and responsibilities.
- Summarize pertinent information on leadership and ethical considerations in the decision-making process.
- Give examples of practical skills that may be used to enhance the immediate effectiveness of new commanders.

Faculty. Commanders' Professional Development School (CPDS) faculty members must possess a bachelor's degree (in any discipline) and three or more years' experience in a relevant functional command assignment.

Duration. The Wing Commanders' Seminar is one week long, and the group commanders' courses last two weeks.

Eligibility. The Air Force Colonels Group determines attendance at the Wing Commanders' Seminar and the group commanders' courses. Attendance at the Air Force Incident Management Course is mandatory for USAF personnel designated as emergency operations center (EOC) directors and senior installation fire officials. The course is optional for security forces commanders, operations officers, flight chiefs, command inspector general team chiefs, and installation exercise evaluation team chiefs.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course numbers are listed in the syllabus table below).

Completion Requirement. Students must comprehend the major concepts and processes to deal with leadership, management, and command issues.

Course Descriptions

MLMDC800 USAF Wing Commander's Seminar

42 Contact Hours

This course provides an understanding of contemporary attitudes, approaches to leadership and management, legal responsibilities of command, and selected staff functions needing management and leadership emphasis. Attendees are provided an update on current Air Staff policies and procedures associated with command. Students have the opportunity to discuss issues and problems with key staff members as well as their peers in a seminar environment.

MLMDC810 USAF Mission Support Group Commander's Course

64 Contact Hours

This course prepares newly selected mission support group commanders with leadership tools and understanding of command responsibilities, resources, and operational guidance that will enhance their effectiveness in achieving mission requirements. Training will provide information on home station employment sustainment and deployment, beddown, and sustain-

ment at contingency locations: crisis actions, force protection, unit type code (UTC) preparation, load planning, communications, reception, contracting actions, bare base/tent city preparation, munitions, personnel readiness, services, force support, expeditionary combat support, and so forth.

**MLMDC813 Air Force Incident
Management Course**

32 Contact Hours

This course provides training on techniques and procedures necessary to effectively perform command and control functions during emergency and contingency situations involving aircraft, munitions, and hazardous material accidents and incidents, as well as natural disaster situations. The curriculum includes problem solving and exercises associated with situation assessment, emergency operations center duties and responsibilities, communications, special resources, planning, public affairs, and logistics support.

**MLMDC871 USAF Maintenance
Group Commander's Course**

64 Contact Hours

This course provides an understanding of contemporary attitudes, approaches to leadership and management, legal responsibilities of command, and selected staff functions needing management and leadership emphasis. Attendees are provided an update on current Air Staff policies and procedures associated with command. Students have the opportunity to discuss issues and problems with key staff members as well as their peers in a seminar environment.

**MLMDC872 USAF Medical Group
Commander's Course**

82.5 Contact Hours

This course provides an understanding of contemporary attitudes, approaches to leadership and management, legal responsibilities of command, and selected staff functions needing management and leadership emphasis. Attendees are provided an update on current Air Staff policies and procedures associated with command. Students have the opportunity to discuss issues and problems with key staff members as well as their peers in a seminar environment. This activity has been planned and implemented in accordance with the essential areas and policies of the Accreditation Council for Continuing Medical Education (ACCME) through the joint sponsorship of the Office of the Surgeon General United States Air Force and Maxwell AFB. The Office of the Surgeon General United States Air Force is accredited by the ACCME

to provide continuing medical education for physicians, and it designates this live activity for a maximum of 34 AMA PRA category 1 credit(s). TM physicians should claim only the credit commensurate with the extent of their participation in the activity.

This continuing nursing education activity was approved by the United States Air Force Nurse Corps, an accredited approver by the American Nurses Credentialing Center's Commission on Accreditation. The approval code is 12-005, and the number of contact hours is 35.1.

MLMDC874 USAF Senior

Materiel Leader Course

73 Contact Hours

This course prepares newly selected and inexperienced senior materiel leaders to meet the responsibilities of systems and sustainment program leadership and introduces attendees to their roles as director within the framework of Air Force policy. The course gives attendees a basic knowledge of the responsibilities, resources, operational concepts, and practices so they will quickly and effectively execute the full spectrum of weapon system acquisition and sustainment, and understand director responsibility, accountability, and discipline approaches to leadership and management. (Secretary of the Air Force (SAF/AQH) awards 40 continuous learning points toward ongoing acquisition professional development for the educational activity entitled USAF Senior Materiel Leader Course.)

MLMDC875 USAF Operations

Group Commander's Course

55 Contact Hours

This course prepares operations group commander selectees to meet the responsibilities of operations group leadership and introduces attendees to their roles as commander of an operations group within the framework of Air Force policy. The course provides an understanding of command responsibility, accountability, and discipline; approaches to leadership and management; contemporary attitudes; and cultural diversity. It also provides a background in group-level functional areas, including intelligence, weather, airfield operations, and aircraft accident investigation, reporting, and disposition. Attendees will have the opportunity to discuss current operations issues and problems with functional area experts, experienced commanders, and their peers in a seminar environment.

MLMDC877 USAF Senior Leaders'**Mission Generation Course****16.5 Contact Hours**

This course focuses on wing leadership teaming between maintenance, operations, and logistics support to achieve safe and effective mission generation. Students must comprehend the relationship and teamwork between maintenance, operations, and logistics support; comprehend applicable policies, training, discipline, and enforcement standards essential to generating safe and reliable air and space power; and apply learned teaming approaches and functional mission generation topics to conduct a case study and prepare a briefing for the senior mentor to assess.

USAF Personnel Professional Development School

Internet Address

<http://www.au.af.mil/au/ecpd/hr>

Program Description. Provides continuing education for the development and competence of force support professionals in the Total Force, including our joint partners. The courses are conducted depending on demand and funding, with some courses available completely online. Resident courses are conducted in a professional, seminar-based forum allowing for scenario-based exercises, cross-talk from peers, and information-sharing from subject-matter experts in the field. Distance learning courses incorporate these same techniques using features in Blackboard and Defense Connect Online.

Learning Outcomes. To access the USAF Personnel Professional Development School (USAF PPDS) learning outcomes and other information, visit the website on the Air Force Portal. From the main Air Force Portal at the base org-functional areas tab, select the Org A—Z Listing, select “I” for Ira C. Eaker Center for Professional Development, scroll down, and click on the school link. Go to Eaker Center Schools, and select the USAF Personnel Professional Development School. Here are some of the learning outcomes from a few of our courses:

- Effectively leads, plans, and manages a force support squadron.
- Discusses emerging issues, advises installation leadership, and responds effectively to an increasingly challenging expeditionary environment.
- Effectively leads flights providing sustainment, force development, community, education, and family services.
- Challenges and motivates squadron and flight members.
- Contributes as a key advisor to wing, group, and squadron commanders.
- Leads and manages military, civilian, and nonappropriated fund personnel to include force development concepts and practice.
- Summarizes the tools to operate and successfully contribute to organizational effectiveness.
- Values distinctive contributions of human resource leaders and managers.

Faculty. The USAF PPDS faculty must possess three or more years of experience in civilian or military force support, services, manpower, or personnel positions.

Duration. Residence courses vary in length from two to 14 days of classroom instruction. Distance learning courses range from five to 40 contact hours.

Eligibility. Requirements for participants vary for each course. Students can locate the course requirements on the Air Force Portal. Reference the ETCA website at <https://etca.randolph.af.mil> for additional information.

Course Descriptions

MAFHRMS108 Basic Civilian Training Force Development Specialist Course

40 Contact Hours

This course provides force development specialists (FDS) with basic skills and knowledge in areas of training and development. Subject coverage includes the following areas: operational force development specialist guidance, resource management, Standard Form 182, leadership, and systems applications.

**MAFHRMS109 Advanced Civilian Training
Force Development Specialist Course** **40 Contact Hours**

This course provides experienced civilian training force development specialists insight into the overall FDS function and its relationship to the total civilian personnel management program. It covers complex, controversial, and precedent-setting aspects of such areas as career programs, developing and managing the training budget, advising management on the determination of training needs, staff development, procurement training, management of training, and evaluating the training program. The curriculum is designed to enable students to assist and guide personnel on civilian training matters, identification and prioritization of training needs, and resource management and to provide advisory service to management and employees.

**MAFHRMS110 Basic Employee-Management
Relations Course** **23 Contact Hours**

This course provides personnel assigned to the employee-management relations (EMR) course with the basic skills and procedures for dealing with situations in areas such as conduct, discipline, appeals and grievances, health and safety, premium pay, drug and alcohol abuse control, and program evaluation.

**MAFHRMS112 Advanced Employee-
Management Relations Course** **36 Contact Hours**

This course improves the effectiveness of EMR specialists by providing insight into the overall EMR program and its relationship to the total civilian personnel management program. It covers complex, controversial, and precedent-setting aspects of various EMR program areas including discipline, performance management, drug and alcohol abuse, occupational health and safety, arbitration, and Merit System Protection Board proceedings. The purpose of this course is to intensify and broaden the skills of full-performance-level EMR specialists to enable them to better understand, plan, and formulate meaningful personnel programs and to use sound methods in resolving problem cases.

**MAFHRMS117 Civilian Workyear
Management Course** **32 Contact Hours**

This course provides orientation, basic knowledge, and skills in the management of an installation's annual civilian employment plan. The course is appropriate for those delegated responsibility for the direct management pro-

cess or for those providing advisory services on civilian personnel resource management, manpower issues, or financial management (civilian pay) issues.

MAFHRMS118 Equal Opportunity (EO)

Leadership Course

32 Contact Hours

The purpose of this course is to deliver education to EO leaders that empowers them to be a strategic resource by developing leadership competencies required as key advisors to leadership and customers; to align with the Air Force EO Strategic Plan; and to develop and mentor employees for future growth and development.

MAFHRMS119 Labor Management

Relations Course

68 Contact Hours

This course prepares participants to administer and negotiate labor union contracts and increases the effectiveness of labor-management relations practitioners in providing advice and guidance to managers representing the Air Force's position in arbitration and other third-party proceedings. The target audience is civilians, GS-9 through GS (GM)-14, and officers, captain through colonel. Its purpose is to prepare negotiating team members to effectively represent management at base level in negotiating written agreements between a labor organization and the activity commander.

MAFHRMS121 Civilian Personnel

Management Course

26 Contact Hours

Flexibility in our Civilian Personnel Management Course (CPMC) blended eLearning course allows students to perform most coursework according to their schedule. The course prepares supervisors of Air Force federal civilian employees for greater effectiveness in the exercise of their civilian personnel management responsibilities and develops skill and judgment in the application of civilian personnel policies, practices, and procedures, providing fundamental comprehension of civilian personnel functions (classification, staffing, employee/labor management relations, employee development, etc.). The CPMC is a regulatory requirement for all supervisors of Air Force civilian employees and must be completed within six months of assignment to a supervisory position.

MAFHRMS126 Basic Mediation Course**32 Contact Hours**

The Basic Mediation Course provides basic training to individuals who will serve as mediators for the Air Force. The curriculum includes the presentation of current Air Force policy, the mediation process, interest-based negotiations, Air Force ethical guidelines for mediators, confidentiality in mediations, standards of conduct for mediators, and settlement drafting guidelines. This course is intended for civilian or military individuals who will mediate civilian disputes.

MAFHRMS127 Advanced Mediation Course**40 Contact Hours**

The Advanced Mediation Course was developed to further train individuals to serve as effective mediators for the Air Force. Air Force Policy Directive (AFPD) 51-12, *Alternative Dispute Resolution*, requires the Air Force to use alternative dispute resolution “to the maximum extent practicable and appropriate.” To meet this directive, high-quality mediation training had to be institutionalized in the Air Force. The Advanced Mediation Course creates a small pool of highly trained, experienced mediators in the Air Force that will decrease reliance on expensive contract mediators. The purpose of this course is to prepare advanced mediators by emphasizing the “best practices” in mediation for the Air Force mediator. This course covers all of the advanced techniques one would need to master several areas of mediation practice. This course is intended for civilian individuals who will mediate civilian disputes.

**MAFHRMS140 Air Force Sexual Assault
Response Coordinator Course****40 Contact Hours**

This course prepares essential information, processes, and resources through interactive lecture, guided discussions, and role-plays to develop the knowledge and skills of Air Force sexual assault response coordinators (SARC) that will enable them to perform their sexual assault prevention, response, and outreach responsibilities.

MAFHRMS405 Manpower Staff Officer Course**108 Contact Hours**

The Manpower Staff Officer Course encompasses Air Staff manpower functions, Air Force Manpower Agency major command (MAJCOM) functions, readiness, total force, senior leader perspectives, management engineering, manpower programming, Air Force organizations, lineage and honors, whole system optimization, the art and science of manpower, and student projects and leadership.

**MAFHRMS408 Airman and Family
Readiness Basic Course**

40 Contact Hours

The Airman and Family Readiness Basic Course is designed to educate newly assigned readiness noncommissioned officers (RNCO), community readiness consultants, and community readiness specialists (CRC/CRS) on all Airman and family readiness core programs, policies, and operations. RNCOs and CRC/CRSs will be equipped with the skills and knowledge to collaborate with Airmen, family members, base agencies, local community partners, and commanders to ensure a mission-ready status. The participants will complete exercises during the course based on real-life scenarios. Students are placed in situations where they must assume responsibility for reacting to simulated natural disasters, deployments, and evacuations. The curriculum addresses core compliance and guidance, coordination of the Airman and Family Readiness Center, base and community support, deployment support, crisis response/emergency (Noncombatant Evacuation Operation [NEO]/Air Force Personnel Accountability and Assessment System [AFPAAS]), and community readiness service delivery, including the Air Force Family Integrated Readiness Statistical Tracking database.

**MAFHRMS415 Leadership Strategies
for Civilian Personnel Advisors Course**

32 Contact Hours

The course will provide the most up-to-date learner-focused education for effective leadership within the current FSS environment and will enable personnel leaders to anticipate and effectively respond to operational changes within the Air Force.

**MAFHRMS416 Military Personnel
Management Course**

16 Contact Hours

This course has been designed to provide essential knowledge-based training to civilian personnel who are entering supervisory assignments over military personnel. The training covers sources of authority governing military personnel management, unique aspects of the military Airman, career management issues, and performance management for the military Airman. This course provides the essential information, policies, and procedures and, most important, where to go for resources to use in each of these areas. The course covers Air Force subject matter and not information for sister services. The student target population for this course is first-level civilian supervisors of Air Force military personnel. Civilians that are also current Air Force Guard/

Reserve or retired from Air Force active duty/Guard/Reserve within the five years prior to the start of the course are waived from completing this course (this includes active Guard Reserve/Air Reserve technician/individual mobilization augmentee).

MAFHRMS417 USAF Supervisors Course **44 Contact Hours**

Title 5 Code of Federal Regulations (CFR) Section 412 requires that the Air Force provide initial training as an individual makes the critical transition to become a new supervisor. The course incorporates a blended eLearning approach that uses the benefits of in-residence techniques and the cost savings associated with distance learning. The target audience is all first-time supervisors of civilians that are active duty, Guard, and Reserve military who have not had an equivalent course within the last five years and federal civilian employees. The course provides an enterprise-wide solution, so every first-time supervisor can take this course within 180 days (120 days for the Air Force Materiel Command [AFMC]) of assuming supervisory duties.

MFSS200 Protocol Fundamental Course **56 Contact Hours**

This course provides personnel with a fundamental knowledge of protocol presented from a base-level perspective. Procedures for administration, meeting and conference planning, entertaining and social events, ceremonies, funding sources, DV visits, flightline protocol, flag usage, and escort duties will be discussed.

MFSS250 Mortuary Officers' Course **40 Contact Hours**

This course provides active duty and air reserve component officer and civilians with the technical aspects of mortuary affairs presented from a managerial perspective. Procedures for care and disposition of the deceased, communications with next-of-kin and higher headquarters, escort and transportation of remains, entitlements and eligibility criteria, and search and recovery operations will be discussed, as well as Air Force and contract mortuaries, honor guard, and summary courts officer duties. Students will be introduced to the psychological aspects of the mortuary affairs arena and will review current case studies.

MFSS255 Mortuary Technicians' Course**40 Contact Hours**

This course prepares enlisted, junior officers, and civilians working in a mortuary affairs office to understand their role in the Air Force Mortuary Affairs Program.

MFSS275 Force Support Contingency Course**37 Contact Hours**

This course targets force support officers and senior enlisted members assigned to specific UTCs for command and leadership during contingencies. The course consists of general force support contingency operations and addresses areas of concern to leaders in contingency situations, such as force beddown and base recovery. Major components of the course include doctrine supporting tactics, techniques, and procedures; organizational structures; command and control; personnel support for contingency operations (PERSCO); resource management; installation development; leadership and management; sustainment operations, to include bare-base sustainment initiatives; and force protection guidance. This course is mandatory for deploying leadership teams and has been combined with the Air Force Central, Directorate of Manpower and Personnel, Services Directorate (AFCENT/AIS) briefings that include site-specific capabilities and operations.

MFSS316 FSS Development Flight Leadership Course**34 Contact Hours**

This course is for officers and civilian equivalents holding force development flight chief/commander positions. Successful completion of MFSS300, FSS Flight Leadership Course, is a prerequisite for attending this course. Attendance in this course is recommended within 120 days of being assigned as a flight leader and no sooner than two years after the initial skills course. The course is a blended eLearning course taught to the students at their home station. The course focuses on force development flight-specific topics including field operating agency perspective, education and training section operations, library operations, professional development section operations, ALS operations, and flight-specific information on management information systems, construction program management, test security, awards and recognition, and other related topics. This interactive course requires self-directed study in the Blackboard learning management system, virtual group projects with student presentations, and online webinars through Defense Connect Online. Students will become more effective and confident flight chief/commanders by knowing more about what is expected of them and the personnel working

for them and by creating networks of fellow new and experienced flight commanders during the course.

MFSS317 FSS Airman and Family Services

Flight Leadership Course

36 Contact Hours

This course is for officers and civilian equivalents holding Airman and family services flight chief/commander positions. Attendance in this course is recommended within 120 days of being assigned as a flight leader and no sooner than two years after the initial skills course. This course provides an operational perspective on key programs/issues in the flight. It also includes a presentation by a senior civilian from the Air Staff on current/future issues impacting the career field. This course includes homework assignments, group projects, and student presentations.

MFSS318 FSS Sustainment Services

Flight Leadership Course

40 Contact Hours

This course is for officers and civilian equivalents holding FSS sustainment services flight chief/commander positions. Attendance in this course is recommended within 120 days of being assigned as a flight leader and no sooner than two years after the initial skills course. This course provides an operational perspective on key programs/issues in the flight, including fitness centers, dining facilities, lodging operations, and other flight areas as appropriate. It also includes a presentation by a senior civilian from the Air Staff on current/future issues impacting the career field. This active course includes homework assignments, group projects, and student presentations. The emphasis is on flight leadership and helping to maintain the well-being of our “Airmen weapons system.”

MFSS319 FSS Manpower and Personnel

Flight Leadership Course

40 Contact Hours

This course is for officers and civilian equivalents holding FSS sustainment services flight chief/commander positions. Attendance in this course is recommended within 120 days of being assigned as a flight leader and no sooner than two years after the initial skills course. This course focuses on manpower and personnel flight-specific topics including military personnel support section operations, manpower and organization section operations, civilian personnel support section operations, awards and recognition, crisis and humanitarian response, commander expectations and key issues, deployed

commander perspective, and other related topics. This course includes homework assignments, group projects, and student presentations.

MFSS375 Force Support Operations Officer Course 36 Contact Hours

This is a four-week distance learning course offered via Blackboard. The course curriculum includes A1 doctrine, squadron organization, processes, missions, unit training management, readiness and planning processes, installation contingency plans, installation force accountability, financial resources, customer service, personnel resources, leadership, support advisor responsibilities, honor guard, and related topics. This active course includes homework assignments, group projects, and student presentations.

MFSS400 Force Support Squadron Leadership Course 80 Contact Hours

The course provides FSS commanders, directors, and deputies with a thorough familiarization with the force support organization, doctrine, mission, and corporate structure; how to organize for success; force development; business models and resource management; current issues by flight; programming in the squadron environment; readiness responsibilities; and other pertinent topics necessary to fulfill joint roles as an FSS commander/director and the base strategic advisor for A1 issues. During the course, students receive briefings from senior A1 leaders (e.g., AF/A1, AFPC/CC, AF Director of Manpower, AF Director of Services). Students also participate in seminars with current and graduated squadron commanders, FSS superintendents, and a wing commander, where they discuss and receive insight on subordinate, peer, and senior command expectations. In-depth seminars are conducted on legacy manpower, personnel, and services issues and programs and AEF Readiness.

Defense Financial Management and Comptroller School

Internet Address

<http://www.au.af.mil/au/ecpd/dfmcs>

Program Description. The Defense Financial Management and Comptroller School (DFM&CS) focuses on developing broad comptroller skills to in-

clude critical thinking, analysis, advisory responsibilities, strategic orientation, leadership, and effective communications. This mission is achieved through presentations, interactive seminars, networking, small group discussions, and facilitated exercises. The course bridges the gap between technical functions and broad financial management leadership. The students must actively participate, formulate individual and group goals, and successfully complete homework and test requirements. The course is challenging, and graduates receive graduate-level credit for their work.

Learning Outcomes

- Demonstrates the ability to advise senior leaders by using enhanced strategic decision support techniques.
- Applies new techniques and concepts to improve personal leadership and interpersonal skills.
- Explains the impact of organizational relationships on the DOD mission.
- Appreciates the diverse financial management disciplines within DOD.
- Illustrates contingency operation concepts and their impact on financial management.

Faculty. Instructors at the DFM&CS possess a graduate-level degree in finance, accounting, or a related academic field and at least three years experience in financial/resource management or a similar area. Currently the faculty includes members representing the Army, Navy, Air Force, and Defense Financial Acquisition Service (DFAS).

Duration. The DFM&CS consists of approximately one week of prerequisite work (a combination of online work and written requirements as specified) followed by 14 academic days in residence at Maxwell AFB, AL. The DFM&CS is normally conducted four times per year.

The Defense Decision Support Course (DDSC) is four academic days and is normally conducted three times per year in residence at Maxwell AFB, AL. The DDSC may also be scheduled as a mobile course conducted upon request at installations throughout the world.

Eligibility. The target grades for DFM&CS students are O4 and above, GS12 and above, and E8 and above. Air Force O3s in the Financial Management

Leadership Program and GS11s are currently authorized to attend by exception only.

The target audience for the DDSC varies depending on the location. To assist in managing throughput and funding, the target audience for in-residence DDSC classes is the same as the target for DFM&CS. In order to help facilitate organizational change and increase throughput, mobile DDSC classes are open to any available rank or grade. Students selected for this course should already possess a broad knowledge of the DOD FM environment, a strategic perspective, and above average critical/creative thinking and communication skills (oral and written).

Attendance is authorized for personnel outside the comptroller career area when the training requirement is assessed against positions and responsibilities in resource management and associated fund management. Noncomptroller personnel packets must include a statement, endorsed by the major command/agency comptroller, highlighting the benefits of attendance.

Completion Requirement. Participants must complete all testing, writing, speaking, and seminar participation assignments, which demonstrate comprehension of the material and the ability to apply it in a professional environment.

Course Descriptions

MLMDC503 Defense Financial Management Course

112 Contact Hours

The DFMC curriculum focuses on developing skill sets for students who will eventually be placed in senior leader FM roles. Expectations will be high. Those enrolled in the course will become graduate students while attending. As such, they will complete various homework readings and assignments. They must actively participate in seminar discussions and complete various writing and speaking requirements to enhance their communication skills, including an advocacy paper about improving a specific comptroller functional area. DFMC combines seminar discussions, faculty lectures, distinguished guest speakers, and experiential learning to allow students to sharpen their skills for leading teams, leading change, managing conflict, critical thinking, strategic orientation, networking, communication, and advising senior leaders.

MLMDC504 Defense Decision Support Course

32 Contact Hours

The DDSC curriculum focuses on the concepts related to understanding financial management decision support. The curriculum also address trans-

forming roles of FM staff officers and improving financial managers' ability to deliver relevant and credible advice to leaders at all levels. The course defines decision support, introduces a decision support model, describes various analytical tools and techniques, and allows students to practice putting the concepts into action through interactive scenarios.

USAF Chaplain Corps College

Internet Address

<http://www.usafhc.af.mil>

Program Description. The curriculum provides the highest-quality professional continuing education, technical training, and resources to provide spiritual care and advice to leadership. The Air Force Chaplain Corps College (AFCCC) conducts five chaplain assistant apprentice courses, four basic chaplain courses, two chaplain corps spiritual leadership courses, two deputy wing chaplain courses, two wing chaplain courses, two superintendent/NCOIC chapel operations courses, two marriage care facilitator courses (distance learning), one senior chaplain course, one chaplain assistant senior leadership course, one chaplain candidate course, and one spiritual care for the wounded warrior course each year. If funding is available, the college may offer additional PCE courses each year covering topics of interest to the Chaplain Corps.

Learning Outcomes

- Perform professional duties and responsibilities commensurate with the roles of chaplains and chaplain assistants in providing spiritual care.
- Understand and apply key principles to advising leadership and commanders in the discharge of their responsibilities to provide for the free exercise of religion in the context of military service as guaranteed by the Constitution with regard to ethical, moral, and morale issues and needs for all Airmen.
- Understand and demonstrate how chaplains and chaplain assistants provide religious accommodation for the free exercise of religion for all Airmen and their families and are respectful of a pluralistic religious environment and supportive of all faith groups.

- Apply spiritual leadership principles and demonstrate transformational leadership within the Chaplain Corps.
- Comprehend expeditionary Air Force requirements and demonstrate how to provide ministry in the readiness and deployed environment.
- Leverage religious support team operations and team building to accomplish the Chaplain Corps mission.
- Develop, implement, control, and evaluate religious programs to ensure unit and wing ministry effectiveness to include unit engagement, worship, liturgies, rites, and other religious requirements for all faith groups.
- Understand and demonstrate resource management of funds, facilities, supplies, and equipment to include chapel administration.
- Demonstrate crisis intervention and counseling techniques and comprehend privileged communication.

Faculty. AFCCC chaplain-teaching faculty members must possess a master's degree in divinity or a comparable field and be endorsed by their ecclesiastical body. Chaplain assistant teaching faculty may possess higher degrees of education but be certified in education training programs.

Duration. Courses vary in length from three to 30 days.

Eligibility. The prerequisites for the Basic Chaplain Course and Chaplain Assistant Apprentice Course are selection for duty as a chaplain or chaplain assistant. Chaplains must complete commissioned officer training before attending the Basic Chaplain Course. Other courses are pulse-point and just-in-time training to meet the needs of the Chaplain Corps.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information.

Completion Requirement. Students evidence mastery of the chaplain concepts and processes used in the accomplishment of ministry within the Air Force and pass required exams and measurements.

Course Descriptions

MAFCSI101 Basic Chaplain Course (BCC) 240 Contact Hours

This course introduces chaplains to the unique aspects of ministry within the Air Force and facilitates the new chaplain's transition from civilian ministry to ministry within the Air Force community. It prepares chaplains to work as a team with clergy of various faiths. It teaches unique Air Force subjects such as military funerals, funds management, interfaith worship, inclusive chapel programs, ministry in a readiness environment, chaplain administrative responsibilities, and counseling skills.

MAFCSI114 Deputy Wing Chaplain Course (DWCC) 80 Contact Hours

This course prepares selected chaplains for supervisory responsibilities and for leadership of major faith group programs. Topics include personnel management, resource management, leadership development, and other areas as identified by the functional manager.

MAFCSI115 Wing Chaplain Course (WCC) 80 Contact Hours

This course trains selected chaplains to function in senior leadership positions. Topics include structure, mission, and vision of the Air Force chaplaincy; dynamics of leadership in the multifaceted role of the senior chaplain; personnel and resource management; and other issues identified by the functional manager.

MAFCSI117 Chaplain Candidate Course 80 Contact Hours

The chaplain candidate program is the primary source for accessing chaplains available to active duty and the Air Reserve components. This course qualifies students for supervised field training on duties/responsibilities of chaplain candidates, roles of clergy/officer, concepts of religious pluralism and religious accommodation in the Air Force environment, parameters and obligations of privileged communication, multicultural diversity, integration of Chaplain Corps personnel in the Total Force, and the importance of mental and spiritual preparation for deployed ministry.

**MAFCSI118 Wartime Ministry
Skills Workshop**

24 Contact Hours

This course prepares selected chaplains and chaplain assistants for effective wartime ministry. Topics include establishing chapel operations, operational and deployed parish ministry and support, current topics in Islam, the impact of war (psychological, emotional, physical, and spiritual), just war issues, force protection during wartime operations, resourcing ministry in the area of responsibility (AOR), and advising command leadership.

MAFCSI123 Pastoral Counseling Course

24 Contact Hours

This course prepares selected chaplains to heighten counseling skills. Students learn, practice, watch, and employ brief pastoral counseling tools using the solution-focused brief counseling model. Topics include empathic listening, attending to counselees' needs, rapid assessment, focused spiritual diagnosis, and the demonstration of hope for client change.

**MAFCSI124 Redeployment, Reintegration,
and Reunion Issues Course**

24 Contact Hours

This course prepares selected chaplains to deal with the impact of redeployment, reunion, and reintegration in light of current deployment cycles and the changing nature and complexity of war. Topics include preventing and recognizing the effects of post-traumatic stress, tools for effective reintegration, and managing issues related to redeployment.

**MAFCSI125 Chaplain Corps Senior
Leadership Issues Course**

24 Contact Hours

This course prepares selected chaplains to deal with current issues affecting the Chaplain Corps as they relate to senior leaders.

**MAFCSI128 Religious and Cultural
Awareness: Tools and Techniques**

24 Contact Hours

This course equips the Chaplain Corps with skills necessary for acquiring religious and cultural competence in order to advise leaders at tactical, operational, and strategic levels. The course focuses on the impact religion has on cultural norms and how cultural norms impact religion in areas of national strategic interests. The course is open to chaplains and chaplain assistants.

MAFCSI129 Senior Chaplain Course**24 Contact Hours**

This course prepares selected chaplains to deal with current issues affecting the Chaplain Corps as they relate to senior leaders in MAJCOM positions. The course will provide essential analytical tools for identifying and addressing religious issues throughout the geopolitical spectrum. The student will learn strategic planning methodology and demonstrate the ability to construct a comprehensive strategic plan.

MAFCSI130 Chaplain Corps Current Education Issues Course**24 Contact Hours**

This course addresses current hot issues and topics faced by the Chaplain Corps. It gives the Chaplain Corps the capability to respond quickly to emergent needs. It gives students essential analytical tools for identifying and addressing religious issues throughout the geopolitical spectrum.

MAFCSI131 Chaplain Assistant Senior Leadership Issues Course**24 Contact Hours**

This course addresses senior chaplain assistant issues and topics. The course provides students with essential analytical tools for identifying and addressing religious support issues throughout the geopolitical spectrum. The course also provides students with techniques for advising leaders on moral, ethical, and religious issues at the strategic level.

MAFCSI132 Spiritual Care for Wounded Warriors**24 Contact Hours**

This course addresses the mental, physical, and spiritual care necessary to provide for physically and emotionally wounded warriors. It provides the Chaplain Corps the capability to respond accurately and quickly, using current tools, methodology, and terminology. Further, it introduces the concept of vicarious traumatization and the awareness of when to refer.

MAFCSI133 Ministry to Young Adults**24 Contact Hours**

This course takes current benchmarked Airman Center programs and uses them to train chaplains in their creation and sustainment. The emphasis is on authentic community, service before self, spiritual formation, and moral/character development while maintaining a distinctively global ministry focus.

**MAFCSI136 Chaplain Assistant Crisis
Intervention Counseling**

24 Contact Hours

This course prepares chaplain assistants to conduct intervention and crisis counseling. It updates chaplain assistants on the latest techniques and processes for intervening in crisis situations.

**MAFCSI137 Chaplain Assistant
NCO Leadership Issues**

24 Contact Hours

This course prepares selected chaplain assistant noncommissioned officers in charge (NCOIC) to become better leaders and managers. Topics for this include managing chapel tithes and offerings funds, the appropriated funds cycle, leadership and teamwork, training, fitting it all into the Chaplain Corps strategic plan, and crisis management.

**MAFCSI138 MarriageCare Facilitator
Training Course**

20 Contact Hours

This course will train chaplains to host and teach the MarriageCare curriculum at their respective ministry locations. Chaplains will receive in-depth training in all MarriageCare blocks of instruction and the proper application thereof. Chaplains must demonstrate they can successfully teach a block of the curriculum according to the MarriageCare model to receive certification. The impact of this course will enable Chaplain Corps members to facilitate MarriageCare retreats at their local units Air Force-wide.

National Security Space Institute

Internet Address

<https://www2.peterson.af.mil/nssi/CESET/nssi/index.htm>

Program Description. Students learn about space system acquisition, capabilities, and power at the operational and strategic levels. Space 200 is offered approximately 15–17 times a year; Space 300 is held approximately 11–13 times a year.

Learning Outcomes. Upon completion of the space professional continuing education curriculum (Space 200 and Space 300), students will master the following:

Space 200:

- Apply DOD space acquisition policies and space mission design principles in order to participate in the delivery of space capabilities to a diverse community of users.
- Analyze the impact of the space mission areas in support of joint and coalition forces across the range of military operations.
- Analyze the impact of competing space and counterspace capabilities on joint and coalition forces.

Space 300:

- Analyze the space acquisition environment to develop an understanding of its impact on the delivery of space capabilities and national security.
- Analyze the space-related policy and strategy environment to ascertain its influence on US national security.
- Synthesize approaches to effectively advocate for space capabilities.
- Synthesize approaches to effectively employ space capabilities in support of national leadership and joint and coalition forces.

Faculty. The NSSI faculty is composed of carefully selected military, contractors, and civilian personnel.

Duration. Space 200 is 18 class days; Space 300 is 15 class days.

Eligibility. The Space & Cyberspace Professional Management Office, located at Headquarters Air Force Space Command, generates the list of eligible candidates for Space 200 and Space 300.

Space 200 eligibility

Officer: Space Professional Development Program (SPDP) Level 1; total active federal commission service date (TAFCSO) of 8–10 year; minimum 24 months space experience.

Enlisted: SPDP Level 1; TSgts/selects and SSgts with a total active federal military service date (TAFMSD) of 9–11 years; minimum 24 months space experience.

Civilian: GS-12 and GS-13 in space positions; minimum 24 months space experience.

Space 300 eligibility

Officer: Field grade; TAFMSD of 13–15 years; SPDP Certification Level 2; minimum 72 months space experience.

Enlisted: SPDP Level 2; SMSgts/selects and MSgts with 14–18 years of service; minimum 72 months space experience.

Civilian: GS-14 and -15 in space positions; minimum 72 months space experience.

Completion Requirement. Students must be able to critically analyze the space acquisition environment and space policy environment and the impacts space power yields at the operational, tactical, and strategic levels. Students must articulate approaches to effectively employ space capabilities in support of national leadership and joint/coalition forces.

Course Descriptions

MSpace200 Space 200

**113 Contact Hours
46 Noncontact Hours**

Space 200 is the NSSI's midcareer course for space professional education. It produces space professionals who think critically about the application of space power. The course investigates two major areas: space systems development and space power. In each area students actively participate in exercises challenging them to determine what to do given the dynamics and uncertainty of the national security environment.

MSpace 300 Space 300

**93 Contact Hours
20.5 Noncontact Hours**

Space 300 is the NSSI's capstone course for space professional continuing education. It produces space professionals who understand national policy considerations and strategic thought within an international geopolitical environment. Students will be able to critically address space acquisition, capabilities, and power at the operational and strategic levels across the range of military operations as well as space power's strategic contributions to national security.

Air Force Smart Operations for the Twenty-First Century Black Belt Certification Course

Internet Address

<http://www.au.af.mil/au/ecpd>

Program Description. The Air Force Smart Operations for the Twenty-First Century (AFSO21) Black Belt Certification Course is intended to ensure a basic understanding of why, how, and when each of the process improvement methodologies should be used. The course will provide a limited approach to the relationships between Lean (L), Six Sigma (6S), Theory of Constraints (ToC), and Business Process Reengineering (BPR). This course is the bedrock of a more robust process improvement initiative, providing the education required by all potential members of a team charged with process improvement.

Learning Outcomes. Learning in this course will allow students to provide value to the USAF by supplying them with the tools to lead efforts to maximize value and eliminate waste in all environments—operational, support, and otherwise—and fully integrate continuous process improvement (CPI) across the Air Force.

Faculty. All instructors are experienced (black belt certified) active-duty, Reserve, Guard, US military, and/or DOD Civilians.

Duration. This course lasts 10 academic days.

Eligibility. This course is open to all active-duty Air Force, Reserve, and Guard officers and DOD civilians and enlisted personnel in the grades of TSgt–CMSgt. Except in rare instances, students are required to complete AFSO21 Green Belt certification prior to attending this course.

Completion Requirements. Upon completion of the training, the students are prepared to assist leadership in executing Lean, Six Sigma, and Theory of Constraints projects or to assist experienced greenbelts in conducting process improvement events. The students will also be prepared to mentor new students and teach in the L/6S/ToC/BPR areas taught in the course.

Course Description

MAFSO2101 Black Belt Certification Course

80 Contact Hours

This course includes advanced process improvement methodologies, group dynamics, facilitation, and process engineering training in a classroom environment followed by participation and application of skills in a series of lean, process reengineering, or other CPI events or projects in more than one CPI methodology, with one or more events at a cross-functional or enterprise-wide level. Green belt certification is a prerequisite for black belt training. The DOD course, sponsored by SAF/USMS, satisfies black belt certification requirements.

Joint Flag Officer War-Fighting Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The course prepares two-star general officers of the four services for theater-level combat leadership. It is tailored to provide future theater combatant commanders and service component and joint task force (JTF) commanders with a broad perspective of the strategic and operational levels of war. Instruction for the course comes from senior national-level civilian and military representatives, flag officers serving as combatant commanders, and retired, battle-tested officers. Retired war-fighting generals draw from their combatant and component commander experience to lead a campaign-planning exercise focused in various parts of the world across the continuum of conflict.

Through the study of war fighting, military doctrine, and the application of unified, joint, and combined combat forces, the attendees will be better prepared to respond to crises. The Joint Flag Officer War-Fighting Course (JFOWC) is a two-week course that is offered twice a year. Each class is limited to 19 general/flag officers and senior executive civilians who represent the military services.

Learning Outcomes. As directed by Chairman, Joint Chiefs of Staff Instruction (CJCSI) 1800-01D, *Officer Professional Military Education Policy*, Appendix L to Enclosure E.

Faculty. Instruction for the course comes from senior national-level civilians and military representatives, flag officers serving as combatant commanders, and retired, battle-tested officers.

Duration. The JFOWC is delivered in 10 academic days.

Eligibility. Per CJSCI 1800-01D, Appendix L to Enclosure E, and a memorandum of understanding (MOU) between the four executive agents, attendees will normally consist of 18 general/flag officers in the rank of major general/rear admiral-upper half or brigadier general (promotable)/rear admiral-lower half (promotable) at least a year after their attendance at capstone.

Reference the ETCA web site at <https://etca.randolph.af.mil> for additional information (ETCA course number: MAAFNJ007).

Completion Requirement. Students must successfully complete all pass/fail evaluations and exercises.

Curriculum Summary

| MAAFNJ007 Learning Areas | Contact Hours |
|---|---------------|
| National Security Strategy | 8.50 |
| National Planning Systems and Processes | 10.00 |
| National Defense Strategy | 11.50 |
| National Military Strategy and Organization | 8.00 |
| Theater Strategy and Campaigning | 27.75 |
| The Role of Strategic Communication in Twenty-First Century Warfare | 7.00 |
| Strategic Leader Development | 12.25 |
| Total | 85.00 |

Note: CSJCI 1800-01C uses the term *learning area* vice *curriculum area*.

Learning Area Descriptions

National Security Strategy

8.5 Contact Hours

- Role of Congress in military affairs and how Congress views the military.
- Role of military leaders in developing national political objectives.
- Four elements of national power and how the elements are used during a crisis.
- Relationship between the strategic and military end states and how they differ and influence stability operations and redeployment.

National Planning Systems and Processes**10 Contact Hours**

- Role of joint doctrine as it applies to operations planning, mobilization, deployment, employment, sustainment, and redeployment.
- Effect of time, coordination, policy, politics, doctrine, and national power on the planning process.
- Joint strategy development and operational planning process.

National Defense Strategy**11.50 Contact Hours**

- How the military operationalizes the national defense strategy to address strategic challenges by setting priorities among competing capabilities.
- How the military dissuades potential adversaries from adopting threatening capabilities, methods, and ambitions, particularly by sustaining and developing US key military advantages.

National Military Strategy and Organization**8 Contact Hours**

- The combatant commander's perspective and the role of subordinate commanders in developing, deploying, employing, and sustaining military forces.
- Roles, relationships, and functions of the president, secretary of defense, chairman of the Joint Chiefs of Staff, combatant commanders, secretaries of the military departments, and the service chiefs as related to the national military strategy.

Theater Strategy and Campaigning**27.75 Contact Hours**

- Role of the unified commander in developing theater plans, policies, and strategy.
- Complexities of interagency coordination and support in campaign planning and execution of military operations.
- Challenges and opportunities that may accrue from the combatant commander's regional focus and an ambassador's country focus.
- Multinational campaign plan for a geographic combatant commander in support of national and coalition objectives.

**The Role of Strategic Communication
in Twenty-First Century Warfare**

7 Contact Hours

- Describes how theater commanders, component commanders, or JTF commanders access information operations resources and develop responsive information operations plans.
- Comprehends the impact of national agencies that support the theater commander's requirements for information operations on national security issues.
- Evaluates how the joint operational planning and execution system is integrated into both theater and operational information operations campaign planning and execution to support theater and national strategic sustainment and war-fighting efforts.
- Comprehends the importance of strategic communication in a multinational environment and the impact it has in shaping the information environment.
- Evaluates how public diplomacy and public affairs are integrated in theater and operational information operations planning and execution to support theater and national strategic sustainment and war-fighting efforts.

Strategic Leader Development

12.25 Contact Hours

- Challenges of command at the three- and four-star levels.
- Leadership challenges in a coalition environment.
- Leadership challenges in working with and understanding the cultures of other members of the interagency.

Joint Force Air Component Commander Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The course prepares one-, two-, and three-star general officers of all four services for component command leadership. Attendees study war fighting, military doctrine, and application of unified, joint, and combined combat forces so they will be better prepared to respond to crises as functional component commanders.

The course is conducted annually during December at Maxwell AFB, Alabama. When practical, students travel to a major exercise, such as Blue Flag, for the final two days. If a major exercise is unavailable, students may visit an air and space operations center (AOC). The course is limited to 18 active duty (includes Reserve and National Guard) one-, two-, and three-star general officer attendees; one-star general officer selects are permitted by exception. The desired attendee mix is nine US Air Force, four US Navy, three US Marine, and two US Army flag officers.

Learning Outcomes. As directed by CJCSI 1800-01D, *Officer Professional Military Education Policy*, Appendix L to Enclosure E.

Faculty. Instruction for the course comes from senior national-level civilians and military representatives, flag officers serving as combatant commanders, and retired, battle-tested officers.

Duration. The Joint Force Air Component Commander (JFACC) Course is delivered in seven academic days.

Eligibility. Per CJCSI 1800-01D, Appendix L to Enclosure E, attendees should be at least a one-star flag officer (one-star selects may attend on a case-by-case basis). Since these courses build on knowledge from the National Defense University's (NDU) Capstone Course, attendees should complete this congressionally mandated course before attending a component commander course.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCADRE004).

Completion Requirement. Students must successfully complete all pass/fail evaluations and exercises.

Curriculum Summary

| MCADRE004 Courses | Contact Hours |
|---|----------------------|
| National Security Strategy | 7.25 |
| National Planning Systems and Processes | 10.00 |
| National Military Strategy and Organization | 9.25 |
| Theater Strategy and Campaigning | 17.25 |
| Information Operations | 4.25 |
| The Role of Strategic Communication in Twenty-First Century Warfare | 5.00 |
| Strategic Leader Development | 7.00 |
| Total | 60.00 |

Course Descriptions

National Security Strategy **7.25 Contact Hours**

- Relationship between political and military objectives and how the relationship may enhance or inhibit the combatant commander in reaching his or her theater military objectives.

National Planning Systems and Processes **10 Contact Hours**

- Joint and service doctrine applicable to the planning and execution of operations in support of theater-level plans and operations.
- How time, coordination, policy, politics, doctrine, and national power affect the planning process.
- Joint strategy development and operational planning processes.

National Military Strategy and Organization **9.25 Contact Hours**

- Combatant commander's perspective and the role of subordinate commanders in developing, deploying, employing, and sustaining military forces.
- Roles and functions of the component commander to include relationships with and perspectives of the combatant commander, combined/

joint force commanders (C/JFC), and component commanders (both functional and service).

Theater Strategy and Campaigning

17.25 Contact Hours

- Role of the unified commander in developing theater plans, policies, and strategy.
- Theater-level strategy development and the development of military objectives, end states, and joint concepts of operations.
- Theater component strategy that supports the C/JFC campaign plan.
- Roles of joint doctrine as they apply to operations planning, mobilization, deployment, employment, assessment, sustainment, and redeployment.
- Issues related to component functioning (i.e., air defense, airspace coordination, theater missile defense, fire support coordination, targeting, rules of engagement, and joint fires).
- Key components, systems, and processes used to plan, direct, coordinate, control, and assess combined/joint air, land, maritime, and space effects-based operations.

Information Operations

4.25 Contact Hours

- How theater commanders, component commanders, or JTF commanders access information operations resources and develop responsive information operations plans.
- Historical or ongoing information operations.
- Requirements necessary to collect, collate, and disseminate intelligence information.
- Strategic communication in a multinational environment and the impact it has in shaping the information environment.

The Role of Strategic Communication in Twenty-First Century Warfare

5 Contact Hours

- Role of joint experimentation, joint exercises, research and development, and emerging organizational concepts with respect to transforming the US military.
- Nature of warfare in the information age, to include advanced planning and analysis capabilities.

Strategic Leader Development

7 Contact Hours

- Unique challenges of operational command at the three-star level.
- Complexities associated with leadership in a coalition environment at the task force, component, and combatant commander levels.
- Complexities associated with leadership in an interagency environment at the task force, component, and combatant commander levels.

Combined Force Air Component Commander Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The course prepares one-, two-, and three-star general officers of the four services for component command. Attendees study war fighting, military doctrine, and application of unified, joint, and combined combat forces to be better prepared to respond to crises as functional component commanders.

The course is conducted annually during the summer at Maxwell AFB, AL. When practical, students travel to a major exercise, such as Blue Flag, for the final two days. If a major exercise is unavailable, students may visit an air and space operations center (AOC). The course is limited to 18 active duty (includes AFRES and ANG) one-, two-, and three-star attendees; one-star selects are permitted by exception. The desired attendee mix is five USAF, two US Navy, two US Marine, one US Army, and eight allied flag officers.

Learning Outcomes. As directed by CJCSI 1800-01D, *Officer Professional Military Education Policy*, Appendix L to Enclosure E.

Faculty. Instruction for the course comes from senior national-level civilians and military representatives, flag officers serving as combatant commanders, and retired, battle-tested officers.

Duration. The Combined Force Air Component Commander Course (CFACC) is delivered in seven academic days.

Eligibility. Per CJCSI 1800-01D, Appendix L to Enclosure E, attendees should be at least a one-star flag officer (one-star selects may attend on a case-by-case basis). Since these courses build on knowledge from the NDU Capstone Course, attendees should complete this congressionally mandated course before attending a component commander course.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCADRE007).

Graduation Requirement. Students must successfully complete all pass/fail evaluations and exercises.

Curriculum Summary

| MCADRE007 Courses | Contact Hours |
|---|---------------|
| National Security Strategy | 7.25 |
| National Planning Systems and Processes | 10.00 |
| National Military Strategy and Organization | 9.25 |
| Theater Strategy and Campaigning | 17.25 |
| Information Operations | 4.25 |
| The Role of Strategic Communication in Twenty-First Century Warfare | 5.00 |
| Strategic Leader Development | 7.00 |
| Total | 60.00 |

Course Descriptions

National Security Strategy

7.25 Contact Hours

- Relationship between political and military objectives and how that nexus may enhance or inhibit the combatant commander in reaching theater military objectives.

National Planning Systems and Processes **10 Contact Hours**

- Joint and service doctrine applicable to the planning and execution of operations in support of theater-level plans and operations.
- How time, coordination, policy, politics, doctrine, and national power affect the planning process.
- Joint strategy development and operational planning processes.

National Military Strategy and Organization **9.25 Contact Hours**

- Combatant commander's perspective and the role of subordinate commanders developing, deploying, employing, and sustaining military forces.
- Roles and functions of the component commander to include relationships with and perspectives of the combatant commander, combined/joint force commanders (C/JFC), and component commanders (both functional and service).

Theater Strategy and Campaigning **17.25 Contact Hours**

- Role of the unified commander in developing theater plans, policies, and strategy.
- Theater-level strategy development and the development of military objectives, end states, and joint concepts of operations.
- Theater component strategy that supports the C/JFC campaign plan.
- Roles of joint doctrine as they apply to operations planning, mobilization, deployment, employment, assessment, sustainment, and redeployment.
- Issues related to component functioning (i.e., air defense, airspace coordination, theater-missile defense, fire support coordination, targeting, rules of engagement, joint fires, etc.).
- Key components, systems, and processes used to plan, direct, coordinate, control, and assess combined/joint air, land, maritime, and space effects-based operations.

Information Operations**4.25 Contact Hours**

- How theater, component, or JTF commanders access information operations resources and develop responsive information operations plans.
- Historical or ongoing information operations.
- Requirements necessary to collect, collate, and disseminate intelligence information.
- Strategic communication in a multinational environment and the impact it has in shaping the information environment.

**The Role of Strategic Communication
in Twenty-First Century Warfare****5 Contact Hours**

- Role of joint experimentation, joint exercises, research and development, and emerging organizational concepts with respect to transforming the US military.
- Nature of warfare in the information age, to include advanced planning and analysis capabilities.

Strategic Leader Development**7 Contact Hours**

- Unique challenges of operational command at the three-star level.
- Complexities associated with leadership in a coalition environment at the task force, component, and combatant commander levels.
- Complexities associated with leadership in an interagency environment at the task force, component, and combatant commander levels.

Senior Joint Information Operations Applications Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. This course prepares selected general/flag officers and senior executive civilians of the four services and the DOD to develop infor-

mation operations into a war-fighting core military competency that will enable combatant commanders to target adversary decision making while protecting US prerogatives. The course also includes interagency attendees. The course is tailored to provide senior leaders with a broad perspective of information operations at the joint theater (operational) and national (strategic) levels of war.

Attendees study war fighting and doctrine as they relate to information operations concepts and principles. Course objectives provide a common framework for understanding and valuing information operations and the necessary law, policies, and procedures that allow planning and integration of information operations into the joint fight; reviewing joint and service doctrine applicable to the planning and execution of information operations; analyzing the means to effectively communicate US government capabilities and intentions as an important method of combating the plans of US adversaries; examining the current and potential role of interagency and nongovernment organizations; demonstrating the integration of information operations into contingency and crisis plans; evaluating the outcomes and lessons; describing information operations tools, illustrating outcomes of their employment, and explaining lessons from their employment; and illustrating the impact the media has upon operations. Attendance is limited to 18 US flag officers in the grade of brigadier general or major general and equivalent members of the Senior Executive Service (SES).

Learning Outcomes. As agreed upon by the four services.

Faculty. Instruction for the course comes from senior national-level civilians and military representatives, flag officers serving as combatant commanders, and retired, battle-tested officers.

Duration. The Senior Joint Information Operations Applications Course (SJIOAC) is delivered in four and one-half academic days.

Eligibility. Attendees will normally consist of 18 general/flag officers in the rank of major general/rear admiral-upper half, brigadier general/rear admiral-lower half, or members of the SES (or similarly ranked civilians). One-star selects may attend on a case-by-case basis.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCADRE006).

Completion Requirement. Students must successfully complete all pass/fail evaluations and exercises.

Curriculum Summary

| MCADRE006 Courses | Contact Hours |
|--|----------------------|
| The Role of Information and Technology in Twenty-First Century Warfare | 3.50 |
| Joint Doctrine for Information Operations | 5.00 |
| Information Operations Core Capabilities | 5.00 |
| Strategic Communication | 2.50 |
| Media Relations | 5.00 |
| Public Diplomacy | 2.50 |
| Legal and Policy Implications of Information Operations | 2.00 |
| Cyber Warfare | 7.00 |
| Coalition Perspective | 1.25 |
| US Strategic Command Perspective | 2.75 |
| Combatant Command Perspective | 3.50 |
| Total | 40.00 |

Course Descriptions

The Role of Information and Technology in Twenty-First Century Warfare

3.50 Contact Hours

- Role of joint experimentation, joint exercises, research and development, and emerging organizational concepts with respect to transforming the US military.
- The nature of warfare in the information age.
- How theater commanders, component commanders, or JTF commanders access information operations resources and develop responsive information operations plans.
- Historical or ongoing information operations.
- The requirements necessary to collect, collate, and disseminate intelligence information.
- The importance of strategic communication in a multinational environment and the impact it has in shaping the information environment.

Joint Doctrine for Information Operations**5 Contact Hours**

- The approach to information operations outlined in Joint Publication (JP) 3-13, *Joint Doctrine for Information Operations*.
- The implications of the joint doctrine for military involvement in inter-agency and multinational affairs.
- The implications of the multinational and nongeographic aspects of information operations.
- Service doctrines for information operations and divergences from joint doctrine.
- Selected non-US approaches to information operations and their implications for US national security.

Information Operations Core Capabilities**5 Contact Hours**

- What constitutes psychological operations (PSYOP), its limits and constraints, and how it is integrated into the planning process?
- The relationship between PSYOP and public affairs and the connection of PSYOP force support to public diplomacy, the challenges and factors that must be accounted for during planning and execution, and examples of when each did or did not work well in concert.
- Planning factors for a military deception (MILDEC).
- Specific examples of MILDEC and their predicted outcomes and actual results.
- Implications of the multinational and “nongeographic” aspects of electronic warfare (EW).
- Current and future EW threats (illustrate the threats with specific examples and experiences).
- Computer network operations effectiveness of US adversaries and the current means in countering them (including nonstate actors).
- Threats commanders face before and during operations and, specifically, the “platforms” US forces use to mitigate and negate the threat.
- How information assurance enables other war-fighting domains.

Strategic Communication**2.5 Contact Hours**

- The DOD perspective regarding strategic communication.
- The near-instantaneous global nature of information and its implications for a multinational environment.
- The importance of strategic communication and the coordination, synchronization, and delivery of strategic effects.
- How public diplomacy and public affairs are integrated into theater and operational information operations planning and execution to support theater and national strategic sustainment and war-fighting efforts.
- How theater, component, or JTF commanders must optimally leverage their public affairs resources and develop a strategic response.
- Specific examples of strategic communication employment: evaluate effectiveness at the strategic, operational, and tactical levels.

Media Relations**5 Contact Hours**

- Causes of the adversarial relationship that often exists between the press and the military.
- The dynamics of strategic communications to numerous audiences (American public, coalition partners, adversaries, and neutrals).
- The impact of various technologies that provide live broadcasts from the battlefield to American living rooms.
- Media issues experienced with recent or ongoing operations.
- Fundamental conflicts of tactical, operational, and strategic security concerns with the media's view of the public's right to know.

Public Diplomacy**2.5 Contact Hours**

- Past and current challenges in disseminating coherent messages. (How do you ensure that the various organisms of the US government maintain a consistent message and overcome policy and procedural differences?)
- Issues of military support to public diplomacy. (You must comprehend the challenges of working in an interagency environment and the "corporate culture" differences that exist and must be overcome to develop national synergy.)

- How public diplomacy and public affairs are integrated into theater and operational information operations planning and execution to support theater and national strategic sustainment and war-fighting efforts.
- Recent public diplomacy efforts, their effectiveness, lessons learned, and efficacy.
- The relationship between political and military objectives and how the relationship may enhance or inhibit the combatant commander or CFC in obtaining theater objectives.

Legal and Policy Implications

of Information Operations

2 Contact Hours

- Key provisions in standing rules of engagement, policy, statutes, international law, and constitutional law that shape operations.
- Case studies in which the employment of information operations assets was affected by legal or policy factors.
- Means by which military commanders can prepare to handle legal implications of using information warfare assets.

Cyber Warfare

7 Contact Hours

- Attributes and emerging concepts of the future combined/joint force, and how this force incorporates, organizes, plans, prepares, and conducts operations (in cyberspace).
- Advocacy, funding, planning, programming, and budgeting for cyber assets' national organization (national resources, interagency, the DOD, US Strategic Command, etc.).
- Mutual deterrence strategy in cyber warfare.

Coalition Perspective

1.25 Contact Hours

- The complexities associated with leadership in a coalition environment.
- Command and control (C2) challenges facing the joint/combined force component commander, including the personalities of external principals (CFC, other component commanders, and international), transitions, and commander's critical information requirements.

- Key national authority and rules of engagement issues which could impact the joint/combined component force, including national policies and prerogatives, information sharing, and titles.
- Complexities associated with leadership in a coalition environment.
- Force structure, major players, and interoperability issues of allied partners.
- Allied information operations concept of operations and how their commands obtain information operations capabilities within an area of responsibility (AOR).

US Strategic Command Perspective**2.75 Contact Hours**

- US Strategic Command (USSTRATCOM) Unified Command Plan mission.
- Current issues with synchronization and integration of the DOD information operations and the impact on the war fighter.
- Current competency constructs and how they may require change to meet domestic threats.
- Global and/or transregional nature of the future of US netcentric world.
- Processes for providing reach-back capability to combatant commanders.

Combatant Command Perspective**3.50 Contact Hours**

- Views on the war-fighting value of information operations.
- Examples of how information operations strategies are developed both in contingency and crisis planning and the factors commanders must consider in developing courses of action.
- Examples of information operations asset employment and an evaluation of their effectiveness at the strategic, operational, and tactical levels.
- Experiential challenges for the employment of information operations.

Contingency Wartime Planning Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The Contingency Wartime Planning Course (CWPC) provides a comprehensive macro view of the contingency and crisis action planning processes from both joint and Air Force perspectives. Supporting topics include unit readiness assessment, mobilization, expeditionary site planning, and command relationships. Students must successfully pass two progress checks to complete the course. Up to 700 students complete 10 programmed courses each year.

Learning Outcomes. Demonstrate the ability to employ the concepts, principles, and methodologies of deliberate and crisis-action planning.

Faculty. The course is taught by a diverse group of instructors with a wide range of planning experience in logistics, engineering, personnel, or operational specialties.

Duration. The CWPC is delivered in nine academic days.

Eligibility. CWPC quotas are allocated to each MAJCOM and are available by contacting the respective MAJCOM training manager. AU-funded quotas are not available for ANG, AFRC, and sister-service personnel. Unit-funded quotas are built into each class for these personnel. CWPC is available for Airmen in grades E-5 through O-5.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCADRE002).

Completion Requirement. Students must maintain a grade of “B” or better to graduate.

Curriculum Summary

| MCADRE002 Courses | Contact Hours |
|----------------------------|---------------|
| IP 100 Strategic Guidance | 7.00 |
| IP 200 Concept Development | 6.00 |
| IP 300 Plan Development | 20.00 |
| IP 400 Plan Assessment | 8.00 |
| IP 500 Exercises | 19.00 |
| Total | 60.00 |

Course Descriptions

IP 100 Strategic Guidance **7 Contact Hours**

The strategic guidance curriculum presents an overview of the CWPC and begins the process of comprehending how strategic guidance, direction, and policy influence deliberate and crisis-action planning.

IP 200 Concept Development **6 Contact Hours**

The concept development curriculum provides an overview of key topics that form the foundation of operational design and campaign planning and legal considerations involved with developing concepts of operation.

IP 300 Plan Development **20 Contact Hours**

The plan development curriculum introduces key planning-related systems used in the plan development process, including the joint strategic planning system, deliberate crisis action planning execution system (DCAPES), and joint operation planning and execution system (JOPES). It describes Air Force operations planning execution, base-level planning, mobilization, and readiness assessment tools.

IP 400 Plan Assessment **8 Contact Hours**

The plan assessment curriculum provides an overview of the plan assessment function and the crisis action planning process.

IP 500 Exercises **19 Contact Hours**

The exercises curriculum allows students to apply knowledge gained throughout the course. Exercises are interspersed within all of the preceding sections of the course, culminating in a crisis action planning exercise built upon the work completed in the previous exercise periods of instruction.

Joint Air Operations Planning Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The course provides students with an in-depth understanding of the joint operation planning process for air (JOPPA) at the operational level of war. Participants gain insight into the fundamental concepts, principles, and doctrine required to develop a joint/combined air operations plan.

Learning Outcome. Demonstrate the ability to employ the concepts, principles, and methodologies of JOPPA.

Faculty. The course is taught by highly experienced instructors with a wide range of planning experience in operational specialties.

Duration. The JAOPC is delivered in nine academic days.

Eligibility. JAOPC quotas are allocated to each MAJCOM and are available by contacting the respective MAJCOM training manager. AU-funded quotas are not available for ANG, AFRC, and sister-service personnel. Unit-funded quotas are built into each class for these personnel. JAOPC is available for Airmen in the grades of O-3 through O-6 and civilian equivalents.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCADRE003).

Completion Requirement. Students must maintain a grade of “B” or better to graduate.

Curriculum Summary

| MCADRE003 Courses | Contact Hours |
|--|---------------|
| Block I Basic Joint Air Operations Planning Concepts | 16.50 |
| Block II Joint Air Operations Planning Case Studies | 5.50 |
| Block III Joint Air Estimate Process Development | 40.00 |
| Total | 62.00 |

Course Descriptions

Block I Basic JAOP Concepts

16.5 Contact Hours

Block I defines the basic concepts related to the joint air operations planning process. It includes intelligence, logistics, law of weaponing, and an effect-based approach to operations.

Block II JAOP Case Studies

5.5 Contact Hours

Block II provides an understanding of the development of the JOPPA through historical case studies.

Block III Joint Air Estimate Process Development

40 Contact Hours

Block III provides the opportunity to demonstrate knowledge of the seven steps of the JOPPA during a comprehensive practical exercise.

Information Operations Fundamentals Application Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The course provides a broad understanding of information operations doctrine and insight into how information operations are applied across the full spectrum of conflict from peace to war. Supporting topics help students gain a better understanding of how current and emerging technologies, tactics, and techniques are designed to affect our decision-making capabilities as well as those of our adversaries.

Learning Outcome. This course helps students develop an awareness of the application of information operations across the spectrum of conflict.

Faculty. The course is taught by highly experienced instructors with a wide range of information operations (IO) experience in intelligence, communications, and operational specialties.

Duration. The Information Operation Fundamentals Application Course (IOFAC) is delivered in four academic days.

Eligibility. IOFAC quotas are allocated to each MAJCOM and are available by contacting the respective MAJCOM training manager. AU-funded quotas are not available for ANG, AFRC, and sister-service personnel. Unit-funded quotas are built into each class for these personnel. IOFAC is available for Airmen in the grades of E-5 through O-5 and civilian equivalents.

Reference the ETCA website at <https://etca.randolph.af.mil> for additional information (ETCA course number: MCADRE005).

Completion Requirement. Students must maintain a grade of “B” or better to graduate.

Curriculum Summary

| MCADRE005 Courses | Contact Hours |
|--|---------------|
| Block I Major Components of Information Operations | 14 |
| Block II Environmental Factors of Information Operations | 6 |
| Block III Applications of Information Operations | 11 |
| Total | 31 |

Course Descriptions

Block I Major Components of Information Operations **14 Contact Hours**

Block I defines information operations using AFDD 3-13, *Information Operations*, and additional sources. It also provides students with an understanding of the components of IO and shows how they fit in US Air Force doctrine.

Block II Environmental Factors of Information Operations **6 Contact Hours**

Block II presents environmental factors that can influence and affect information operations and distills how these elements can be applied across the entire military spectrum.

Block III Applications of Information Operations **11 Contact Hours**

Block III presents instruction on current information operations applications and provides students the opportunity to demonstrate what they have learned through practical exercises.

Cyberspace Operations Executive Course

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The course was developed in direct response to the emergence of cyberspace as a war-fighting domain and the need to bring senior officers up to a baseline understanding of cyberspace and cyber operational capabilities. The desired effect is to broaden senior AF leaders' knowledge on cyber issues as they shape cyber-related doctrine, organization, training, materiel, leadership, personnel, and facilities (DOTMLPF). The course is offered twice annually with up to 15 students per class. The course is guided by a senior advisor and is delivered by guest experts from organizations outside Air University. Course material is developed and executed through a course director assigned to the LeMay Center/WEF.

Faculty. Instruction for the course comes from senior national-level civilians, military representatives, and flag officers serving in cyberspace billets in various organizations.

Learning Outcome. As agreed upon by the chief of staff of the Air Force (CSAF).

Duration. The course is one and one-half academic days.

Eligibility. Attendees will normally consist of 15 general/flag officers in the rank of lieutenant general/general and Tier III Senior Executive Service (SES) members.

Graduation Requirement. Students must successfully complete all pass/fail evaluations and exercises.

Curriculum Summary

| MCOEC001 Learning Areas | Contact Hours |
|--|----------------------|
| Nature and Characteristics of Cyberspace | 3 |
| Capabilities and Functions | 3 |
| Integration and Interrelationships | 2 |
| Employment of Cyberpower | 3 |
| Law, Policy, and Ethics | 2 |
| Total | 13 |

Learning Area Descriptions

Nature and Characteristics of Cyberspace **3 Contact Hours**

- Comprehend the complexities of defining cyberspace in reference to a military domain of operations.
- Analyze the current discourse on cyberspace and key components of developing common cyber terminology.
- Value the need to create cyberpower doctrine.

Capabilities and Functions **3 Contact Hours**

- Comprehend the range of capabilities the DOD has in the cyberspace domain, including offensive, defensive, and support capabilities.
- Analyze the synergistic application of cyber and noncyber capabilities in other domains.
- Articulate the manner in which DOD cyberspace functions can be executed to achieve effects in support of national security objectives.

Integration and Interrelationships **2 Contact Hours**

- Analyze the effects of current national cyber security policy on the DOD and military strategies.
- Understand the direction in which the DOD is proceeding in integrating cyberspace as a war-fighting domain and why.
- Value the complexities of integrating cyberspace operations between services, governmental agencies, and the private sector, including offensive, defensive, and support operations.

Employment of Cyberpower**3 Contact Hours**

- Comprehend the development of cyberpower as a war-fighting domain.
- Value the role cyberspace offensive, defensive, and support capabilities have played in recent operations.

Law, Policy, and Ethics**2 Contact Hours**

- Value the myriad issues associated with developing cyber offensive and defensive capabilities.

Senior Leader Airpower Doctrine Seminar

Internet Address

<http://www.au.af.mil/au/lemay/>

Program Description. The LeMay Center executes the Senior Leader Airpower Doctrine Seminar (SLADS) on behalf of the Air Force chief of staff.

The course was developed to provide a forum for the examination and evaluation of select doctrine topics and issues. SLADS is a CSAF-directed course offered the day before Capstone (first level of general and flag officer PME), JFACC, CFACC, JWOF, and SJIOAC. The course is guided by a senior advisor and delivered by guest experts from organizations inside and outside Air University. Course material is developed and executed through a course director assigned to LeMay Center/WEF.

Faculty. Instruction for the course comes from senior doctrine developers assigned to the LeMay Center. In addition to assigned personnel, the course uses senior leaders, functional area experts, and AF senior advisors who furnish additional expertise.

Learning Outcome. To understand the present state of doctrine and the current doctrinal issues.

Duration. The course length ranges from four to eight hours depending on which JPME course is being supported.

Eligibility. Attendees will normally consist of six to 12 general officers.

Graduation Requirement. Students must actively participate in all course briefing blocks and discussions.

Curriculum Summary

| MSLADS001 Learning Areas | Contact Hours |
|-----------------------------|---------------|
| Recent Doctrine Development | 1 |
| Senior Advisor Perspective | 1 |
| Select Doctrinal Issues | 2 |
| Command Relationships | 2 |
| Lessons Learned | 2 |
| Total | 8 |

Learning Area Descriptions

Recent Doctrine Development 1 Contact Hour

- Evaluate recent doctrine development addressing current service, joint, multinational, and interagency issues.

Senior Advisor Perspective 1 Contact Hour

- Assess senior advisor perspectives on service, joint, multinational, and interagency issues facing senior leaders.

Select Doctrinal Issues 2 Contact Hours

- Evaluate select AF and joint war-fighting doctrinal issues.

Command Relationships 2 Contact Hours

- Examine the command relationships and organizational structures relevant to the JPME class.

Lessons Learned 2 Contact Hours

- Examine recent Air Force and joint lessons learned relevant to the upcoming JPME class.

ACADEMIC SUPPORT

Several organizations at Maxwell AFB provide academic and historical support for the Air University (AU) resident and distance learning programs. These organizations enable the university to extend essential mission support to a wide range of Air Force units and commands, including Headquarters Air Force and the Department of Defense (DOD).

Air University Registrar

Internet Address

<http://www.au.af.mil/au/cf/auregistrar/registrar.asp>

The Air University registrar oversees three branches: Registrar Services, Registrar Support, and Technology Support. Through the Registrar Services branch, the registrar provides a permanent archival data trail for AU schools; produces transcripts for graduates of those schools; serves as the admissions officer for Air War College (AWC), Air Command and Staff College (ACSC), the School of Advanced Air and Space Studies (SAASS), and the USAF Test Pilot School (USAF TPS) master's and doctoral degree programs; and processes enrollments for distance education students. This branch also produces course completion certificates, diplomas, and transcripts. Registrar Support manages course requirements, allocations, schedules, and program changes. This branch also supports the Air Force Education Requirements Board through data tracking and analysis for Air Force advanced academic degree programs and professional continuing education requirements. Registrar Support is also the "hub" for providing historical and current data on student admissions and enrollments. Registrar Technology Support provides assistance for the Air University Registrar Education Program Management system and functions as the single input source for updating Air Force officer records with professional military education (PME) graduate data and developmental education credits. This branch also supports promotion boards by screening eligible lists to provide PME graduate and developmental education credits.

Air Force Research Institute

Internet Address

<http://www.au.af.mil/au/afri/>

Mission. *Conduct objective research, outreach, and engagement to empower Airmen and enhance the effectiveness of airpower in support of national security.*

The Air Force Research Institute (AFRI) was officially activated as an independent, unique organization at AU on 19 May 2008. However, AFRI integrates several units with long histories of excellence at AU, including the Airpower Research Institute, the Air University Press (AU Press), the Air Force Fellows, and the *Air and Space Power Journal*. AFRI supplements the idea-generating capacity of AU and the US Air Force and supports airpower research inquiries from the chief of staff and other top-level decision makers throughout the Air Force and the DOD. AFRI products also enhance long-term studies of external agencies, support student research, and address specialized research projects directed by the Air Staff and the DOD to enhance national security and to provide relevant research for the Air Force. AFRI promotes advanced thinking and strategy regarding airpower through publications, conferences, and forums that address current issues vital to the Air Force and also capture lessons from history. AFRI's publication products and much of AU's unclassified graduate-level research are available for review either electronically or in print. AFRI comprises three divisions: Research, Outreach, and Engagement.

The Research Division is comprised of experienced airpower analysts and researchers conducting independent operational- and strategic-level research on topics of vital interest to the Air Force and the DOD. This research involves the enduring elements of air, space, and cyberspace and their effect on the US military and national security across the full spectrum of military interests. The Research Division generates and solicits books, original studies, research pamphlets, monographs, and papers on topics of interest to Air Force leaders and those related to current and future air, space, and cyber operations.

The Air Force Fellows program supports the Air Force's PME intermediate and senior developmental education (IDE and SDE) requirements through management of over 110 IDE and SDE students located at think tanks, industries, academic institutions, interagency organizations, and the DOD.

The Outreach Division extends the university's reach nationally and internationally through publications such as the *Air and Space Power Journal* (ASPJ) and *Strategic Studies Quarterly* (SSQ), which generate professional

discourse and forums for airpower education and debate. *ASPJ* has been the professional journal of the US Air Force since 1947. *ASPJ* includes three foreign language editions for French-, Spanish-, and Chinese-speaking readers, with content in each edition tailored for the audience served. Beginning in 2012 the *ASPJ* English edition became an online journal available worldwide. The foreign language editions are also available electronically and are distributed in print to over 150 countries to reach targeted audiences. *SSQ* is the senior USAF-sponsored journal providing a strategic-level forum for military, government, and academic professionals. *SSQ* critically examines and debates contemporary national defense and academic topics, such as strategy, national security, warfare, and international and national defense policies.

The Engagement Division extends the reach of AFRI's mission by informing Airmen and building relationships through conferences and workshops, print publications, and online publishing. These efforts include collaboration to establish and develop partnerships with other government, research, and academic communities including universities, think tanks, and international allies. The division's goal is to expand the understanding and development of concepts, issues, and topics of interest to Air Force leaders and policy makers. The Engagement Division manages digital scholarly content through its websites, social media venues, and internal and external marketing efforts to inform the public, the DOD, and allied military and research communities on timely and relevant issues regarding airpower. The Engagement Division manages online publishing for AFRI and AU Press, including *ASPJ* and *SSQ*, providing airpower and national security dialog at the operational and strategic levels. The Engagement Division also manages the Air University Research Council's research efforts throughout each academic year, providing support with an annual call for research topics, daily management of the Air University Research Information Management System (AURIMS), and publication of the AU Research Bulletin.

AU Press is the publishing arm of AU, consisting of the following two branches: editing and research and design and production. The editing and research team supports publication of AFRI's journals as well as selected manuscripts, articles, research papers, and pamphlets addressing airpower issues. Most of these products are available in print, and all are published in electronic formats available at the AU Press website. The design and production team manages the print and multimedia functions of AU Press and the highly credentialed Air University Publications Review Board, which provides assistance in acquiring manuscripts for publication that provide valuable research to the Air Force and the DOD. It also produces original illustrations and digital art for journals, research, and books for both online and print media.

Descriptions and downloadable versions of all AFRI products are available at <http://www.au.af.mil/au/afri/>.

Air Force Enlisted Heritage Research Institute

Internet Address

<http://AFEHRI.maxwell.af.mil>

Mission. *Supports the Barnes Center for Enlisted Education by educating and motivating enlisted leaders on our enlisted heritage and history.*

The Air Force Enlisted Heritage Research Institute (AFEHRI) was established 23 May 1997 as a component of the Barnes Center. It is comprised of a director, a curator, a noncommissioned officer in charge of the research and the heritage center, and a client support administrator. The AFEHRI provides curriculum and student support to all facets of enlisted PME and Airman Leadership Schools. It also provides secondary student support to the USAF First Sergeant Academy and USAF Historian Development Course. The institute captures, preserves, and archives enlisted history and heritage and assists in developing the *Air Force Professional Development Guide*.

The institute is comprised of two elements. The research and archives element consists of a research center, archives storage, and a student computer lab. The heritage center element consists of the Enlisted Heritage Hall, with many student-teaching exhibits. A city and state tourist attraction, it also serves as a military museum to civilian visitors. The AFEHRI preserves the rich and dramatic heritage and tradition of the USAF enlisted corps and its antecedents—Aeronautical Division, Army Air Service; Army Air Corps; and Army Air Forces—in the development of airpower to defend the United States. The AFEHRI achieves its mission by featuring artifacts, art collections, pictorial exhibits, written and oral documentation, audiovisuals, equipment, and selected aircraft parts. Additionally, students use the in-house and online research capabilities to enhance learning and complete enlisted heritage research projects. A significant archival holding is also available, and efforts are systematically made to ensure its growth and availability to researchers and the public.

Air Force Historical Research Agency

Internet Address

<http://www.afhra.af.mil>

The Air Force Historical Research Agency (AFHRA) is the primary repository for Air Force historical documents. Established in Washington, DC, during World War II, the agency's collection moved to Maxwell AFB, AL, in 1949 to support Air University (AU) and is located adjacent to the Muir S. Fairchild Research Information Center (MSFRIC). The AFHRA is a field operating agency functioning under the policy guidance of the Air Force historian at Headquarters Air Force.

AFHRA's current holdings exceed 700,000 documents and 100 million pages and represent the world's largest and most valuable organized collection of historical documents on US military aviation. These holdings cover a variety of subjects—for example, the use of balloons in the Civil War; air force activities in World War II, Korea, and Southeast Asia; the air war over Serbia; and Operations Desert Storm, Noble Eagle, Enduring Freedom, Iraqi Freedom, and New Dawn.

The majority of documents consist of USAF organizational histories from every echelon of the service from major command to squadron level. Except for the classified or restricted documents comprising approximately 25 percent of the holdings, the collection is open to the public. Finding aids include an electronic database and bibliographies for identifying and locating individual documents on specific topics of interest to the researcher.

To complement the unit histories, the agency houses several special collections, with some dating back to the early 1900s. These collections include historical monographs and studies; almost 2,500 oral history interviews; end-of-tour reports of notable overseas commanders; course materials of the Air Corps Tactical School from the 1930s; and working papers of key Army Air Force staff offices, the British Air Ministry, and the Luftwaffe during World War II. An extensive two-million-page Persian Gulf War collection and electronic database of nearly 85 gigabytes of information on the air war over Serbia have been added to the agency's holdings in the past decade. The Gulf War holdings include chronologies, working papers, message traffic, oral history transcripts, unit histories, and contingency reports.

The agency also holds the personal paper collections of more than 500 Air Force civilian and military figures, including John L. Brown, George C. Kenney, Curtis E. LeMay, John D. Ryan, and Thomas D. White.

The AFHRA receives historical reports and information from Operations Noble Eagle, Enduring Freedom, and other ongoing Air Force operations. Its historical collection is readily available to AU students, faculty, and staff. In addition, agency staff members provide research and advisory services to assist AU students in preparing papers and theses.

Beyond its support to AU, the AFHRA staff answers requests for historical information from Congress, the Joint Chiefs of Staff, the Air Staff, the major commands, and the general public. Other key functions include drafting and updating the official lineage and honors histories and emblems of the Air Force organizations, writing and publishing historical reference works, conducting the Air Force's oral history program, maintaining records showing the status of aircraft, and updating and preserving the official lists of aerial victory credits earned during each war.

The AFHRA staff routinely takes part in training new Air Force historians and conducting archival and oral history training courses for professional members of the Air Force history and museums program.

Muir S. Fairchild Research Information Center

Internet Address

<http://aulibrary.au.af.mil>

The Muir S. Fairchild Research Information Center (MSFRIC), founded in 1946 as the AU Library, is the premier library in the DOD. It houses well-balanced collections especially strong in the fields of war fighting, aeronautics, Air Force and DOD operations, military sciences, international relations, education, culture and language, leadership, and management. MSFRIC improves Air Force education by providing access to the world of information through quality library services.

The center holds more than 2 million items, including 514,000 military documents, 561,000 monographs and bound periodical volumes, 208,000 maps and charts, and 150,000 military regulations and manuals.

MSFRIC sits at the center of Chennault Circle, Maxwell AFB, AL. On 19 January 2007, the Air University Library was redesignated the Muir S. Fairchild Research Information Center. The library building, Fairchild Library, is named for the founder and first commander of AU, Gen Muir Stephen "Santy"

Fairchild. MSFRIC also operates the Henry “Red” Erwin Library at Maxwell-Gunter Annex. This branch provides tailored information collections and services for the NCO Academy and the Senior NCO Academy.

An active program of bibliographic publications and indexes facilitates access to the center’s holdings and information. Special subject bibliographies and curriculum support pages are published throughout the year and posted concurrently on the center’s website. Produced since 1949, the *Air University Library Index to Military Periodicals* is searchable online, accessed through the center’s website.

Electronic information technologies are critical to the delivery of library resources and services. A third-generation integrated library system automates ordering, cataloging, identifying, locating, and circulating library-owned materials. A robust website provides Internet access to the Special Bibliography Series, other PME curriculum-support materials, map and image sites, full-text journals, e-books, newspapers, online databases, and links to key websites. Many MSFRIC tools are now available through the Air Force Portal, including links to reference librarians, bringing the personal touch of library service to the entire Air Force community.

MSFRIC is a member of the Association of Southeastern Research Libraries, the Military Education Research Library Network, and the Network of Alabama Academic Libraries.

AIR UNIVERSITY FACULTY

Full-time Air University (AU) faculty may hold one of four academic ranks: (highest to lowest) professor, associate professor, assistant professor, and instructor. Criteria for academic rank are listed in the table below.

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|---------------------|--|
| Instructor | must hold a relevant master's degree |
| Assistant Professor | must hold a relevant earned doctoral degree |
| Associate Professor | must hold a relevant earned doctoral degree and be published in an appropriately recognized professional journal |
| Professor | must hold a relevant earned doctoral degree, be published in an appropriately recognized professional journal, have at least 10 full years of applicable professional experience, normally including no less than 10 years of full-time university-level teaching with a minimum of 3 years at the rank of associate professor |

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ABBREVIATIONS

| | |
|----------|---|
| AB | artium baccalaureatus; air base |
| ABD | all but dissertation |
| ACCME | Accreditation Council for Continuing Medical Education |
| ACE | American Council on Education |
| ACSC | Air Command and Staff College |
| ACT | accelerated combat timeline |
| ACTS | Air Corps Tactical School |
| AEF | air and space expeditionary force |
| AETC | Air Education and Training Command |
| AF | Air Force |
| AFB | Air Force base |
| AFCCC | Air Force Chaplain Corps College |
| AFCDA | Air Force Career Development Academy |
| AFDC | Air Force Doctrine Center |
| AFDD | Air Force doctrine document |
| AFEHRI | Air Force Enlisted Heritage Research Institute |
| AFEWT | Air Force Educational Wargaming Toolset |
| AFHRA | Air Force Historical Research Agency |
| AFHRMS | Air Force Human Resource Management School |
| AFI | Air Force instruction |
| AFIT | Air Force Institute of Technology |
| AFJROTC | Air Force Junior Reserve Officer Training Corps |
| AFJROTCI | Air Force Junior Reserve Officer Training Corps instruction |
| AFMS | Air Force Medical Service |
| AFOATS | Air Force Officer Accession and Training Schools |
| AFPC | Air Force Personnel Center |
| AFPD | Air Force policy directive |
| AFRC | Air Force Reserve Command |
| AFRES | Air Force Reserve |
| AFRI | Air Force Research Institute |
| AFRICOM | Africa Command |
| AFROTC | Air Force Reserve Officer Training Corps |
| AFSAT | Air Force Security Assistance Training |
| AFSEWPS | Air Force Senior Executive War-fighter Perspective Seminar |
| AFSNCOA | Air Force Senior Noncommissioned Officer Academy |
| AFSO 21 | Air Force Smart Operations for the Twenty-First Century |
| AFWI | Air Force Wargaming Institute |

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|---------|--|
| AGA | Alabama Goodwill Ambassadors |
| AIC | Academic Instructor Course |
| AICE | Association of International Credential Evaluators |
| ALS | Airman Leadership School |
| AMA PRA | American Medical Association Physician's Recognition Award |
| AMS | Academy of Military Science |
| ANG | Air National Guard |
| AOC | air and space operations center |
| AOR | area of responsibility |
| AP | airpower studies |
| APID | advanced principles of instructional design |
| ARCS | Air Reserve Component Seminar |
| ARPS | Aerospace Research Pilot School |
| AS | Aerospace Education |
| ASB | Air-Sea Battle |
| ASBC | Air and Space Basic Course |
| ASI | Avionics Systems Integrations |
| ATO | air tasking order |
| AU | Air University |
| AUI | Air University instruction |
| AUSIS | Air University Student Information System |
| AWC | Air War College |
| AWP | Air Web Planner |
| BA | bachelor of arts |
| BBA | bachelor of business administration |
| BEAST | Basic Expeditionary Airman Skills Training |
| BDE | basic development education |
| BOT | Basic Officer Training |
| BS | bachelor of science |
| BT | Blue Thunder |
| C2 | command and control |
| C/JAOC | combined/joint air operations center |
| C/JFACC | combined/joint force air component commander |
| C/JFC | combined/joint forces command or commander |
| CADRE | College of Aerospace Doctrine, Research, and Education |
| CALT | Civilian Acculturation and Leadership Training |
| CAOC | combined air operations center |

| | |
|----------|---|
| CAP | Civil Air Patrol |
| CAPSTONE | first level of general and flag officer professional military education |
| CAP-USAF | Civil Air Patrol–United States Air Force |
| CBT | computer-based testing |
| CCAF | Community College of the Air Force |
| CCC | cross-cultural communication |
| CDC | career development course |
| CEO | chief executive officer |
| CFACC | combined forces air component commander |
| CFAST | Collaborative Force Analysis, Sustainment, and Transportation |
| CFC | Combined Forces Command |
| CFP | check flight phase |
| CFT | career field team |
| CGO | company grade officer |
| CGSC | Command and General Staff College (Army) |
| CIA | Central Intelligence Agency |
| CJCSI | Chairman, Joint Chiefs of Staff instruction |
| CLC | Chief Master Sergeant Leadership Course |
| CMSgt | chief master sergeant |
| CNW | College of Naval Warfare |
| COA | course of action |
| COEC | Cyberspace Operations Executive Course |
| COIN | counterinsurgency |
| CONUS | continental United States |
| COT | Commissioned Officer Training |
| CPDS | Commanders’ Professional Development School |
| CPE | continuing professional education |
| CPI | continuous process improvement |
| CPMC | Civilian Personnel Management Course |
| CSAF | chief of staff of the Air Force |
| CSAT | Center for Strategy and Technology |
| CSO | combat systems officers |
| CSP | credentialed space professional |
| CWG | Capstone War Game |
| CWPC | Contingency Wartime Planning Course |
| DA | administration division |
| DDS | doctrine development service; service doctrine development |

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|---------|--|
| DDSC | Defense Decision Support Course |
| DE | education division |
| DEW | Department of Joint Warfare Studies |
| DFMC | Defense Financial Management Course |
| DFM&CS | Defense Financial Management & Comptroller School |
| DL | distance learning |
| DLI | Defense Language Institute |
| DLS | Distinguished Lecture Series |
| DOD | Department of Defense |
| DOE | design of experiments |
| DOTMLPF | doctrine, organization, training, materiel, leadership, personnel, and facilities |
| DSCA | Defense Security Cooperation Agency |
| DSN | Defense Switching Network |
| EAD | extended active duty |
| ECI | Extension Course Institute |
| ECPD | Eaker College for Professional Development |
| EHRI | Enlisted Heritage Research Institute (Air Force) |
| EL | elective; expeditionary leadership |
| ELFP | Executive Leadership Feedback Program |
| EOC | emergency operations center |
| EPME | enlisted professional military education |
| EPMEIC | enlisted professional military education instructor course |
| ESL | English as a second language |
| ETCA | Education and Training Course Announcements |
| ETS | Education and Training Services |
| EW | electronic warfare |
| EX | exercise |
| FC | flight commander |
| FERPA | Federal Family Educational Rights and Privacy Act |
| FGO | field grade officers |
| FM | financial management |
| FS | Foundations of Strategy |
| FSA | First Sergeant Academy |
| FTE | flight-test engineering |
| FTN | flight-test navigator |
| FTT | flight-test techniques |

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|------------|--|
| GC | Global Challenge |
| GDP | Guidance for Development of the Force |
| GMC | general military course |
| GOE | Gathering of Eagles |
| GPA | grade point average |
| GPS | Global Positioning System |
| GS | global security; General Schedule |
| GSC | Grand Strategy Concentration |
| GSP | Global Security Program |
| GSU | geographically separated unit |
| | |
| HAF | Headquarters Air Force |
| HCI | Holm Center instruction |
| HPSP | Health Professions Scholarship Program |
| HQ | headquarters |
| HQE | highly qualified expert |
| | |
| IBT | internet-based testing |
| ICL | institutional competency list |
| ID | intelligence department |
| IDE | intermediate developmental education |
| IDI | Intercultural Development Inventory |
| IF | International Fellow |
| IFAST | Integration Facility for Avionics System Testing |
| ILE/ILE EX | intermediate-level education/exercise |
| IMA | individual mobilization augmentee |
| IMS | international military student |
| IN | Directorate of Intelligence |
| IO | information operations; international organizations |
| IOFAC | Information Operations Fundamentals Applications Course |
| IOP | instrument of power |
| IOS | International Officer School |
| IR | International Relations |
| ISAF | International Security Assistance Force |
| ISD | instructional systems design |
| ISR | intelligence, surveillance, and reconnaissance |
| ISS | International Security Studies |
| ISTE | International Society for Technology in Education |

| | |
|--------|---|
| JA | joint air operations |
| JAEP | joint air estimate process |
| JAEX | joint air and space exercise |
| JAGWAR | Judge Advocate General Wargame |
| JAOC | joint air operations center |
| JAOP | joint air operations plan |
| JAOPC | Joint Air Operations Planning Course |
| JASOC | Judge Advocate Staff Officer's Course |
| JFACC | joint force air component commander |
| JFC | joint force commander |
| JFOWC | Joint Flag Officer War-Fighting Course |
| JIPSE | Joint Intermediate Planning Staff Exercise |
| JLASS | joint land, aerospace, and sea simulation |
| JMO | joint military operation |
| JOPES | joint operations planning and execution system |
| JOPPA | joint operation planning process for air |
| JP | joint planning; Joint Publication |
| JPEX | joint planning exercise |
| JPME | joint professional military education |
| JSCSC | Joint Services Command and Staff College (United Kingdom) |
| JSL | joint strategic leadership |
| JTF | joint task force |
| JWAR | joint wargame |
| | |
| LA | learning areas |
| LD | leadership |
| LDP | Leadership Development Program |
| LDS | leadership development simulation |
| LLAB | Leadership Laboratory |
| | |
| MA | master of arts |
| MAAS | master of airpower art and science (SAASS) |
| MAJCOM | major command |
| MAWS | Maritime Advanced Warfighting School |
| MBA | master of business administration |
| McREL | Mid-Continent Research for Education and Learning |
| MERLN | Military Education Research Library Network |
| MILDEC | military deception |
| MilPDS | Military Personnel Data System |
| MMOAS | master of military operational art and science (ACSC) |

| | |
|--------|---|
| MOU | memorandum of understanding |
| MPA | master of public administration |
| MPF | military personnel flight |
| MPIA | master of Pacific international affairs |
| MS | master of science |
| MSFRIC | Muir S. Fairchild Research Information Center |
| MSFTE | master of science degree in flight test engineering |
| MSS | master of strategic studies (AWC) |
| NAAL | Network of Alabama Academic Libraries |
| NACES | National Association of Credentials Evaluation Services |
| NATO | National Atlantic Treaty Organization |
| NCACS | North Central Association of Colleges and Schools |
| NCO | noncommissioned officer |
| NCOA | Noncommissioned Officer Academy |
| NCSS | National Council for the Social Studies |
| NDU | National Defense University |
| NETS•S | National Educational Technology Standards for Students |
| NGO | nongovernmental organizations |
| NMP | nonmaster's program |
| NRO | National Reconnaissance Office |
| NSDM | National Security and Decision Making |
| NSES | National Science Education Standards |
| NSF | National Security Forum |
| NSPS | National Security Personnel System |
| NSSI | National Security Space Institute |
| OD | officer development |
| OEF | Operation Enduring Freedom |
| OL | organizational leadership |
| OLMP | Online Master's Program |
| OPMEP | Officer Professional Military Education Policy |
| OSD | Office of the Secretary of Defense |
| OTS | Officer Training School |
| PACOM | Pacific Command |
| PBT | paper-based testing |
| PCE | professional continuing education |
| PDS | personnel data system |
| PhD | doctor of philosophy |

| | |
|----------|---|
| PMCC | Professional Military Comptroller Course |
| PMCS | Professional Military Comptroller School |
| PME | professional military education |
| POC | professional officer course |
| POLAD | political advisor |
| PSP | professional studies paper |
| PSYOP | psychological operations |
| PT | practice teaching |
| | |
| QDR | Quadrennial Defense Review |
| | |
| RCOT | Reserve Commissioned Officer Training |
| RCS | regional and cultural studies |
| RDT&E | research, development, test, and evaluation |
| READI | an assessment of basic distance learning skills |
| RES | research |
| RFCC | Reserve Forces Comptroller Course |
| RPA | remotely piloted aircraft |
| RPA-P | remotely piloted aircraft pilots |
| | |
| SAASS | School of Advanced Air and Space Studies |
| SACS/COC | Southern Association of Colleges and Schools, Commission of Colleges |
| SAF | secretary of the Air Force |
| SAF/IA | secretary of the Air Force for international affairs |
| SAMS | School of Advanced Military Studies |
| SAW | School of Advanced Warfighting |
| SC | Solo Challenge |
| SCI | sensitive compartmented information |
| SDI | special duty identifier |
| SES | Senior Executive Service |
| SIMWAR | simulated warfare |
| SIWAC | Senior Information Warfare Applications Course |
| SJIOAC | Senior Joint Information Operations Applications Course |
| SLADS | Senior Leader Airpower Doctrine Seminar |
| SNCOA | AF Senior Noncommissioned Officer Academy |
| SOC | Squadron Officer College |
| SOCOM | US Special Operations Command |
| SOD | special operations division |
| SOF | special operations forces |

| | |
|------------|--|
| SORTS | status of resource and training system |
| SOS | Squadron Officer School |
| SPDP | Space Professional Development Program |
| SSO | Special Security Office |
| SSTR | security, stability, transition, and reconstruction |
| | |
| T&E | test and evaluation |
| TAFCS | total active federal commission service |
| TCW | theater campaign warfare |
| TEC | training and education center |
| TECOM | Education and Training Command (Marine) |
| TFCSD | total federal commissioned service to date |
| TMP | test management project |
| TOEFL | Test of English as a Foreign Language |
| TPAE | theories and principles of adult education |
| TPFDD | time-phased force and deployment data |
| TPS | Test Pilot School |
| | |
| UAS | unmanned aircraft system |
| UAV | unmanned aerial vehicle |
| UCMJ | Uniform Code of Military Justice |
| UK | United Kingdom |
| UN | United Nations |
| US | United States |
| USAF | United States Air Force |
| USAFTPS | United States Air Force Test Pilot School |
| USC | <i>United States Code</i> |
| USCENTOM | US Central Command |
| USSTRATCOM | US Strategic Command |
| USUHS | Uniformed Services University of the Health Sciences |
| | |
| VISTA | variable-stability in-flight simulator test aircraft |
| VSS | Variable Stability System |
| | |
| WA | Warfighting Applications Directorate |
| WAPS | Weighted Airman Promotion System |
| WAR | warfighting |
| WE | Warfighting Education Directorate |
| WESTPAC | western Pacific |
| WG | wargame |

| | |
|-------|--|
| WMD | weapons of mass destruction |
| WMD/E | weapons of mass destruction/effects |
| WRM | war reserve materiel |
| WS | warfare studies |
| XNBP | Exercise in National Budget Priorities |



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