

Civil Air Patrol Senior Member Training Program

SPECIALTY TRACK STUDY GUIDE

Aerospace Education Officer (AEO)

Foreword

This pamphlet prepares you for the responsibilities of a Civil Air Patrol Aerospace Education Officer. It applies to aerospace education officers at all levels, including squadrons, groups, wings, and regions. This guide also encompasses both the aerospace education internal and external programs.

This pamphlet is divided into three sections related to attaining the technician, senior, and master ratings in this specialty area. Progressively mastering the material in each section will prepare you for positions of increasing responsibility. Study each section and apply the information to actual situations on the job. You may be assigned an on-the-job training supervisor to assist you. If not, you should be able to learn the job through self-study.

When you are convinced that you are proficient in the tasks described for each section, take the written examination that accompanies the rating you are trying to complete. After successfully passing the exam, consult your commander who must certify your proficiency. After the commander has certified your proficiency, you may wear the ribbon and the appropriate star. You also become eligible for consideration for promotion to first lieutenant, captain, or major, depending on the rating earned, provided you meet all of the promotion eligibility criteria outlined in CAPR 35-5.

AEROSPACE EDUCATION OFFICER – TRAINING GUIDE

Technician Rating

1. Position Description. The technician rating (215T) involves implementing aerospace education programs for cadets and senior members. A technician rating prepares an AEO for duty at the squadron level.

2. Objectives.

- a. Develop a highly motivated and trained AEO who will conduct and promote effective internal and external aerospace education programs.
- b. Know the duties and tasks associated with CAP's squadron, group, wing, and region aerospace education officer positions.
- c. Possess a basic knowledge of the aerospace education programs.

3. Functions and Responsibilities.

- a. Knowledge Requirements. To achieve the technician rating, the candidate must demonstrate knowledge of CAP's internal and external aerospace education programs. Knowledge verification will be done by written examination. As a minimum, a 215 Technician should know the following:
 - (1) The definition of aerospace education.
 - (2) Basic aerospace education subject matter that cadets and seniors study.
 - (3) The operation of the internal and external aerospace education programs at the unit level.
 - (4) The relationship of aerospace education to both cadet and senior activities at the unit level.
 - (5) The aerospace education reports required from the unit to higher echelons.
 - (6) The forms, directives, and evaluation instruments associated with the internal aerospace education programs at the unit level.
 - (7) The certification, recording, and award procedures for the internal program at the unit level.
 - (8) Internal and external aerospace education awards.
- b. Performance Requirements.
 - (1) Prepare one or more aerospace bulletin boards and/or aerospace displays for the unit.
 - (2) Conduct at least two unit aerospace current event discussions.
 - (3) Conduct an aerospace lesson or activity for the unit using necessary visual aids or props to achieve the desired objective.
 - (4) Provide input to one of the following: unit goals and objectives, unit plan of action, or unit reports to the wing director of aerospace education (DAE).

Position Experience: Each 215 Technician candidate must have served a minimum of 4 months in one of the areas listed below:

1. Unit aerospace education officer (AEO)
2. Assistant to unit AEO conducting one of the following:

- a. Unit Assistant – AE Counselor to Cadets
- b. Unit Assistant – AE Activity Program
- c. Unit Assistant – AE Awards Program
- d. Unit Assistant – AE Reports Program
- e. Unit Assistant – AE Resource Materials Program
- f. Unit Assistant – AEPSM Program (if member has earned Yeager)

AEROSPACE EDUCATION OFFICER – TRAINING GUIDE

Senior Rating

1. Position Description. The senior rating (215S) involves implementing aerospace education activities and duties, developing materials/activities, promoting aerospace education programs for the local community and accepting a leadership role by holding an AE staff position. It prepares AEOs for positions from the squadron to the wing level.

2. Objectives.

- a. Understand the duties and tasks associated with CAP's squadron, group, wing and region aerospace education positions .
- b. Understand the elements of the various aerospace education programs.

3. Functions and Responsibilities.

- a. Knowledge Requirements. To achieve the senior rating, the candidate must have earned the 215 technician rating; demonstrated an advanced knowledge of CAP's internal and external aerospace education programs; and, be prepared to operate at a supervisor level while conducting aerospace education at the application level. Knowledge verification will be done by written examination. As a minimum, the 215 Senior candidate should know the following:

- (1) How to develop and implement aerospace education lessons and activities.
- (2) How to develop and write an Aerospace Education Plan of Action for a unit.
- (3) How to promote and present the Aerospace Education Membership Program to teachers within the local community.
- (4) The role of aerospace education workshops and the guidelines for conducting them.
- (5) How to integrate aerospace education into CAP activities in and above the squadron level.

- b. Performance Requirements. Performance requirements are measured in two categories: (1) activities to be performed and (2) position experience. The unit commander certifies performance verification. The following items fall into these categories and are the minimum requirements for the 215 Senior rating.

Activities: During the training period, the 215S candidate will do the following:

- (1) Develop and implement an aerospace education activity that will support the learning objectives of cadets and/or senior members.
- (2) Write and submit a Unit Plan of Action.
- (3) Prepare and present aerospace education programs to teachers within the local community.
- (4) Attend a wing or region aerospace education conference, aerospace education workshop, or the National Congress on Aviation and Space Education.
- (5) Develop and maintain a collection of aerospace education resources to support cadets, senior members, and the community.

Position Experience: The 215 Senior candidate must have served in a unit AE position and performed a major aerospace education task listed below.

Positions:

1. Group AEO or group internal AEO or group external AEO
2. Cadet squadron AEO
3. Senior squadron AEO
4. Composite squadron – AEO for cadets or AEO for senior members

Tasks (any of these tasks may be accomplished anytime while in the 215 specialty program):

1. Develop cadet or senior member aerospace education materials.
2. Present at or direct an aerospace education workshop or conference.
3. Register and participate in CAP approved college or university aerospace education workshop.
4. Make an aerospace education presentation in a school classroom.
5. Present at or direct the aerospace education portion of a cadet encampment.
6. Serve at unit, wing, or region level as aerospace education advisor for the Cadet Competition Team.
7. Prepare and submit a Brewer Award nomination package.
8. Recruit and train a senior member through successful completion of the 215T rating.

AEROSPACE EDUCATION OFFICER – TRAINING GUIDE

Master Rating

1. Position Description. The master rating involves implementing aerospace education activities and duties, accepting a leadership role, and providing aerospace education policy recommendations to the commander and developing programs that enhance CAP aerospace education in many communities. It prepares AEOs for positions from the squadron to the region level. This master rating may fulfill one requirement for completing CAP Level IV, Senior Member Training Program.

2. Objectives.

- a. Understand all duties and responsibilities associated with CAP's squadron, group, wing and region aerospace education officer positions.
- b. Understand how to manage all CAP aerospace education programs.

3. Functions and Responsibilities.

- a. Knowledge Requirements. To achieve the master rating, the candidate must have earned the 215 Senior rating, demonstrated in-depth knowledge of CAP's internal and external aerospace education programs, and be prepared to recommend aerospace education policy to commanders, as well as be able to actually present aerospace education material to both internal and external audiences. Knowledge verification will be done by written examination. As a minimum, a 215 Master candidate should know the following:
 - (1) CAP's internal and external aerospace education programs including CAP's educational materials, testing and evaluation forms, award requirements, record keeping, and performance certification procedures.
 - (2) How to develop a comprehensive plan of action for units above the squadron level.
 - (3) How to acquire and maintain a variety of aerospace education materials.
 - (4) Aerospace education staff positions, job descriptions/responsibilities, and staff relationships within CAP.
 - (5) Procedures, responsibilities, and restrictions regarding DOD airlift support for CAP's aerospace education programs.
 - (6) Aerospace Education Membership Program and its importance to the CAP mission.
- b. Performance Requirements. Performance requirements are measured in two categories: (1) activities to be performed and (2) position experience. The unit commander will certify performance verification. The following items fall into these categories and are the minimums for the 215 master rating.

Activities: During the training period, the 215M candidate will: Accomplish the Yeager Award plus a minimum of **four** of the remaining nine listed activities.

1. Successfully complete the Yeager Award (may be accomplished any time before or while in the 215 specialty program).

2. Plan and conduct an Aerospace Day or Weekend.
3. Plan and conduct an aerospace event in conjunction with an airport activity.
4. After consultation with the commander, RDAE, and the wing liaison officer/noncommissioned officer, plan, request, and implement airlift to an aerospace education activity.
5. Prepare and submit Civil Air Patrol Aerospace Education Activity Report.
6. Arrange with an AEM (classroom teacher) to do an aerospace education presentation/activity in an AEM's classroom.
7. Arrange for an AEM to do a presentation/activity in a CAP unit.
8. Attend a minimum of two events from the following aerospace education areas: CAP wing or region aerospace education conferences, aerospace education workshops, or National Congresses on Aviation and Space Education. Any of these events may be attended twice.
9. Conduct an aerospace education presentation at a wing or region conference or at a wing or region aerospace education officer conference.
10. Promote the Aerospace Education Excellence (AEX) Award Program to one or more wing units.

Position Experience: The 215 Master candidate must have either (1) served in one of the listed AEO unit positions and participated in one major aerospace education task listed below, or (2) participated in two of the major aerospace education tasks listed below:

Positions:
four months as:

1. Region DCS/AE or region internal AEO or region external AEO
2. Wing DAE or wing internal AEO or wing external AEO
3. Group AEO or group internal AEO or group external AEO

four months as:

1. Cadet squadron AEO
2. Senior squadron AEO
3. Composite squadron – AEO for cadets or AEO for senior members

Tasks (any of these tasks may be accomplished anytime while in the 215 specialty program):

1. Develop and conduct an instruction program for aerospace education officer training.
2. Develop and implement an aerospace education promotion plan for the local community.
3. Develop and implement an aerospace education mentor and instructor program for cadets in Phases III and IV.
4. Develop and implement an instruction program to prepare an AEO for the aerospace education portion of a higher headquarters conducted inspection.

EVALUATION REQUIREMENTS

The *215 Specialty Track Study Guide* has written examination requirements for all three 215 ratings. CAP Test 46, *Examination for Aerospace Education Officer Phase I - Technician Rating* pertains to the technician rating. CAP Test 47, *Examination for Aerospace Education Officer Phase II - Senior Rating* pertains to the senior rating. CAP Test 48, *Examination for Aerospace Education Officer Phase III - Master Rating* pertains to the master rating. The examinations consist of multiple choice, true or false, and matching questions. Tests are ordered from HQ CAP/MSA using CAP Form 8, *Requisition for Publications and Blank Forms*. Tests are controlled, administered, scored, and results recorded in accordance with CAP Regulation 50-4, *Test Administration and Security*. All examinations are open reference, no time limit with a minimum score 80%, corrected to 100%. The examinations are designed to continue the education and training process of the candidate.

The Commander's Evaluation and Rating Certification Checklist (Attachment 1 to this pamphlet) provides written verification by the commander of activities performed, tasks accomplished, positions held, knowledge possessed, and program familiarity acquired by the 215 candidate. It is the responsibility of the 215 candidate to inform the commander of achievement of evaluation items and, if required by the commander, to provide proof of performance.

The Commander's Evaluation and Rating Certification Checklist when completed, signed, and dated by the commander will serve as the basis for award of the 215 Technician, Senior, or Master rating when sent to National Headquarters/ET. Upon receipt, National Headquarters personnel will credit the successful candidate with the 215T or S rating in the senior member National Headquarters database and send a specialty track certificate to the nominated individual. Although National Headquarters personnel will update the National Headquarters database to reflect a 215T or 215S for a member if the unit commander submits the change of specialty code on the Specialty Training Report (STR), no certificate will be issued to the successful candidate without submission of Attachment 1 to this pamphlet. All 215M requests must be submitted using Attachment 1 of this pamphlet. Requests for 215M upgrades submitted on the STR will be returned to the unit commander without action. Upon receipt of a 215M request on Attachment 1 of CAPP 215, National Headquarters personnel will confirm the candidate's eligibility (completion of the *Charles E. "Chuck" Yeager Aerospace Education Achievement Award* and holding a 215M specialty track rating), and if qualified, will send the A. Scott Crossfield Award certificate to the individual. If the unit commander desires the A. Scott Crossfield Award certificate to be sent to a unit (such as the squadron or wing for a special presentation), please make this request on Attachment 1 of CAPP 215 in the comments section. A copy of the completed Commander's Evaluation and Rating Certification Checklist will be retained in the member's CAP Form 45b, *Senior Member Training Record*. A copy of the completed, signed, and dated Commander's Evaluation and Rating Certification Checklist will be forwarded to the wing director of aerospace education.

STUDY BIBLIOGRAPHY

Candidates in the 215 specialty track must be familiar with the references listed in this bibliography. Some publications listed here should be read completely; others should be studied to the point where the candidate has a clear idea of where to locate information on appropriate issues. The following publications should be read in their entirety: CAPR 280-2, CAPP 15, CAPP 215, and CAPR 50-4. Both CAPR 52-16 and CAPR 50-17 should be studied in detail in those sections relating to CAP membership participation in aerospace education programs, activities, awards, and achievements. Many of these publications are available for download from the National Headquarters web site.

Regulations, Manuals, and Pamphlets:

CAP INDEX 0-2, Numerical Index of CAP Regulations, Manuals, Pamphlets, and Visual Aids

CAP INDEX 0-9, Numerical Index of CAP Forms, Test Materials, and Certificates

CAPR 5-4, Publications and Blank Forms Management

CAPR 20-1, Organization of Civil Air Patrol

CAPR 39-3, Award of CAP Medals, Ribbons, and Certificates

CAPR 50-4, Test Administration and Security

CAPR 50-17, CAP Senior Member Training Program

CAPR 52-16, CAP Cadet Program Management

CAPR 76-1, Travel of Civil Air Patrol Members via Military Aircraft and Use of Military Facilities and Vehicles

CAPR 190-1 Vols I & II, Guide to CAP Public Affairs

CAPR 280-2, Civil Air Patrol Aerospace Education Mission

CAPM 39-2, Civil Air Patrol Membership

CAPM 50-1, Introduction to Civil Air Patrol (Purchase Item Only)

CAPM 50-20, CAP Model Rocketry Program

CAPP 6, CAP Oral History Self-Study Guide (Purchase Item Only)

CAPP 15, Aerospace Education Officers' Handbook

CAPP 215, 215 Specialty Track Study Guide, Aerospace Education Officer (AEO) (Purchase Item Only)

CAPB 1, Constitution and Bylaws of the Civil Air Patrol (Requisition from GC)

Aerospace: The Journey of Flight (textbook, teacher guide, and other support material)
(Purchase Items Only)

Aerospace Dimensions (six modules, leader guide, student study guide, plus national standards) (Purchase Items Only)

CAP-USAF/IG, CAP Wing Compliance Inspection Guide

Booklets:

CAP Bookstore Catalog

CAP Supply Depot Aerospace Education Classroom Materials Catalog

Aerospace Education Teaching Materials (contact your Regional Director of Aerospace Education for availability of materials or order from the CAP mailroom).

Educators' Guide to DoD Aerospace Resources

Aerospace Education Excellence (AEX) Award Program Activity Books, (available only if the unit signs up for the annual program).

CAP Certificates (refer to CAP INDEX 0-9):

CAPC 15, A. Scott Crossfield Award

CAPC 17, Senior Member Certificate of Proficiency

CAPC 20, Charles E. "Chuck" Yeager Aerospace Education Achievement Award

CAPC 28, Carl A. Spaatz Award

CAPC 30, Amelia Earhart Award

CAPC 31, Billy Mitchell Award

CAPC-32, Ira C. Eaker Award

CAP Forms:

CAP Form 8, Requisition for Publications and Blank Forms

CAP Form 13, CAP Aerospace Education Membership Application

CAP Form 17, Application for Senior Member Activities

CAP Form 23, Civil Air Patrol General Purpose Answer Sheet

CAP Form 24, Application for Senior Program Awards

CAP Form 31, Application for CAP Encampment or Special Activity

CAP Form 45, Senior Member Master Record

CAP Form 45b, Senior Member Training Record

CAP Form 55a, Request for Examinations

CAP Form 66, Cadet Master Record

CAP Form 95, Application for Civil Air Patrol Scholarships

CAP Forms 124, 126, 127, forms related to the Yeager AE Examination Program

Test Materials:

CAPT 46, Examination for Aerospace Education Officer, Phase I – Technician Rating (with answer key)

CAPT 47, Examination for Aerospace Education Officer, Phase II – Senior Rating (with answer key)

CAPT 48, Examination for Aerospace Education Officer, Phase III – Master Rating (with answer key)

CAPT 61, Aerospace Education Achievement Tests – Aerospace Dimensions

CAPT 63, Aerospace Education Achievement Tests and answers – *Aerospace: The Journey of Flight* (with answer key)

CAPT 64, Test for the General Billy Mitchell Award (with answer key)

CAPT 65, Test for the Amelia Earhart Award (with answer key)

Yeager: Aerospace Education (Test A) with Answer Key

Yeager: Aerospace Education (Test B) with Answer Key

Visual Aids:

CAPVA 52-1, Civil Air Patrol Cadet Program Achievement Specifications and Awards

CAPVA 52-2, Cadet Progress Chart through Mitchell

CAPVA 52-3, Cadet Officer Progress Chart through Spaatz

CAPVA 176, Senior Member Progress Chart

Miscellaneous Publications:

Current aviation and space periodicals and journals

Home-state laws or rules of the Department of Education relating to aerospace education teacher certification, and aerospace education course initiation and approval

State's public and private school curricula as relates to aerospace education

COMMANDER'S EVALUATION AND RATING CERTIFICATION CHECKLIST

Candidate for _____ Candidate's Name _____
 (Rating) (Last, First, M.I.)

CAP Grade _____ CAPID _____ Unit Charter No. _____

Current Position Title: _____ (Refer to CAPR 20-1)

Evaluation Items	Date Start & End	CC's Initials
1. Familiar (at appropriate level) with CAP squadron, group, wing, region Aerospace education positions and programs		
2. Familiar (at appropriate level) with aerospace education teaching materials made available to educators and organizations by CAP		
3. Familiar (at appropriate level) with Aerospace Education Member Program		
4. "Knowledge" requirements have been achieved through successful completion of written examination		
5. "Activities" performance requirements have been successfully accomplished		
6. "Position" and/or "Task" requirements have been successfully completed		
7. *Yeager Examination successfully completed (any time prior to award of 215 Master rating)		

* CANDIDATE MUST COMPLETE EVALUATION ITEMS 1 THRU 6 BEFORE 215 T OR S RATING CAN BE AWARDED. CANDIDATE MUST COMPLETE EVALUATION ITEMS 1 THRU 7 BEFORE 215M RATING CAN BE AWARDED. SEND THIS COMPLETED CHECKLIST TO NATIONAL HEADQUARTERS, CAP/ET, 105 S. HANSELL STREET, BLDG 714, MAXWELL AFB, AL 36112-6332 SO A CERTIFICATE CAN BE SENT TO THE SUCCESSFUL CANDIDATE. THIS FORM IS REQUIRED TO BE SENT TO NATIONAL HEADQUARTERS FOR PROPER CREDIT AND FOR A CERTIFICATE FOR THE 215-M RATING.

Commander comments:

 Commander's Signature
 (Use back of checklist for additional commander comments.)
 (This checklist may be reproduced locally.)

 Date