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## CAM CANDIDATE INFORMATION HANDBOOK

NBAA's Certified Aviation Manager (CAM) program identifies qualified professionals to lead flight departments and companies that use business aircraft. Through certification, these individuals prove their level of expertise and commitment to the aviation industry, enabling them to achieve their professional goals.

The purpose of this CAM Candidate Information Handbook is to familiarize individuals with all aspects of the CAM program, including the exam and its administration, certification and recertification requirements, sample exam questions, and answers to frequently asked questions.

For more information about the CAM program, visit [www.nbaa.org/cam](http://www.nbaa.org/cam) or contact NBAA at [cam@nbaa.org](mailto:cam@nbaa.org).

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# CAM CANDIDATE INFORMATION HANDBOOK

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## About the CAM Program

The National Business Aviation Association (NBAA) mission is to foster an environment that allows business aviation to thrive in the U.S. and around the world. The Certified Aviation Manager (CAM) Program takes the NBAA mission a step further by offering a professional credential that recognizes the knowledge, skills and professional experience exemplified by aviation managers who represent the “gold standard” of leadership in the worldwide business aviation community.

The CAM Program mission is “certifying the future of business aviation,” and certification through the CAM Program allows business aviation professionals to both document their skills and demonstrate their commitment to leadership excellence.

Professional growth does not stop with attainment of the CAM credential. Rather, the CAM designation signifies an ongoing commitment to professional currency and continuing education, thereby ensuring that the CAM credential reflects a commitment to excellence in all aspects of today’s business aviation environment.

### CAM GOVERNING BOARD

The Certified Aviation Manager Governing Board (CAM Governing Board) is an entity that certifies business aviation managers. Its purpose is to raise the standard of professional business aviation managers worldwide.

The CAM Program is built upon the international standards for assessment, as promulgated by the National Commission for Certifying Agencies (NCCA) and others.

The CAM Governing Board is guided in test development by a professional testing company; the CAM Governing Board adheres to the rigorous criteria set forth by these standards regarding the conduct of its credentialing program.

All CAM certification examinations (hereafter “CAM exams”) are constructed and administered in accordance with methodologies and practices recognized by the psychometric and credentialing communities.

### CAM EXAM

The CAM exam is intended to evaluate the knowledge and qualifications of practitioners in business aviation management. The exam addresses content areas defined and validated by subject-matter experts, educators and practitioners.

The exam provides one source of information regarding examinee competence and is used in conjunction with other indicators of experience, licensure and training in the granting of certification.

### CAM PROGRAM FEES

A detailed list of the CAM Program fees can be found at <https://www.nbaa.org/prodev/cam/costs/>.

## Applying for Certification

Members of the CAM Governing Board understand that there are many pathways to competence in business aviation management. The CAM application is designed to capture these pathways by considering a combination of formal education, professional development, licensing and experience.

### THE APPLICATION PROCESS

In order to successfully complete the application and receive approval to take the CAM written exam, candidates should complete the following steps in the application process.

**1. Review** this *CAM Candidate Information Handbook* prior to completing the application. The handbook outlines important information and requirements for applicants.

**2. Access** the current CAM application online at [www.nbaa.org/cam](http://www.nbaa.org/cam) and review the eligibility requirements for certification. Requests for applications may also be directed to the CAM Program administrative director:

Jay Evans  
Administrative Director, CAM Governing Board  
c/o NBAA, 1200 G Street NW, Suite 1100  
Washington, DC 20005  
Email: [cam@nbaa.org](mailto:cam@nbaa.org)

**3. Earn** eligibility points. Eligibility is based upon a combination of the applicant’s formal education, professional development, licensing and professional experience related to the responsibilities of aviation managers. Candidates applying for participation in the CAM Program must:

- Earn a minimum of 100 eligibility points across education, experience, professional development and licensing/certification.
- Have a minimum of two years’ work experience in business aviation.
- Provide two letters of recommendation confirming business aviation background and experience.
- Sign the application.
- Submit the application fee.

Eligibility points are awarded for accomplishments among the following four categories (which are described in greater detail below):

- Employment – 90 points maximum.
- Formal Education – 45 points maximum.
- Licensing and Certification – 30 points maximum.
- Professional Development – 45 points maximum

**4. Complete** the CAM application. When submitting an application, candidates must pay close attention to the documentation required. Moreover, it is the candidate’s

responsibility to remain informed of the progress of the application and to assist in the timely response of references and employers. Candidates should allow sufficient time for application review and processing, and they are encouraged to submit applications and required documentation as early as possible to allow for unanticipated delays.

Applicants applying for special accommodations must submit appropriate documentation as outlined in a subsequent section of this handbook. Application fees are not refundable.

**5. Wait** for written confirmation from the CAM Program administrative director indicating approval to test. When a candidate's application is complete and has been approved by the CAM Program administrative director, an "Authorization to Test" letter will be issued. The correspondence will include all details necessary to schedule the exam administration.

**6. Schedule** the CAM exam as early as possible.

**7. Attend** the exam administration. Detailed information regarding test administration provisions and requirements is provided in this handbook.

**8. Await** exam results. Exam results will be issued by NBAA and the CAM Governing Board by mail normally within 30 days.

## EXPLANATION OF ELIGIBILITY POINTS

Eligibility points are awarded for accomplishments in the following four categories:

**1. Employment History** (90 points maximum) – All CAM candidates must have a minimum of two years' experience in some facet of business aviation. Qualifying experience includes work in any of the following business aviation functions: corporate flight department, aviation management company, aircraft fractional ownership company, Part 91, Part 135 flight operations utilizing business aircraft, consultant, charter, air taxi and other related flight operations involving the business use of business aircraft.

Employment eligibility points are awarded based upon the candidate's level of responsibility, as outlined in Categories A to D below.

To earn points for a position, an applicant must work in that position for a minimum of six months. When calculating employment eligibility points, fractions of a year's experience are awarded as follows:

- Five months or fewer – No points
- Six to 10 months – Half of the points per year for the given job category
- Eleven to 17 months – All of the points per year for the category

Job responsibilities must fall within the following four categories:

*Category A: Supervisory* – Personnel management with direct reports (within or outside of business aviation); aviation department management in business aviation: Directly supervise one or more employees and/or establish and administer policies, procedures and practices consistent with applicable industry standards, and federal, state, local and corporate regulations. Examples of relevant job titles include: director of corporate aviation, director of flight operations, director of maintenance, flight department manager, chief pilot, chief of maintenance, dispatch supervisor, FBO manager, CFO and military commander.

- Supervisory Experience – 10 points per year

*Category B. Non-Supervisory Business Aviation Department Program Management Experience* – Holds responsibility for a major program within a business aviation organization that does not include direct supervision of personnel. Such positions must include responsibility for administrative, operational and budgetary support associated with the program. Examples of acceptable job titles include: safety program manager, standards captain, training program manager, lead scheduler, lead flight attendant, lead technician and marketing manager.

- Non-Supervisory Program Management Experience – 8 points per year

*Category C. Non-Supervisory Business Aviation Department Employment* – Performs aviation-related duties and responsibilities in business aviation. Examples of acceptable job titles include: financial planner, pilot, co-pilot, maintenance technician, flight attendant, scheduler/dispatcher, consultant, FBO staff and airport management staff.

- Non-Supervisory Business Aviation Department Experience – 6 points per year

*Category D. Non-Supervisory Aviation Employment Outside Business Aviation* – Performs aviation-related duties and responsibilities outside business aviation. Examples of acceptable job titles include: pilot, flight instructor, maintenance technician, flight line technician and administrative support personnel.

- Non-Supervisory Aviation Employment (outside business aviation) – 4 points per year

**2. Formal Education** (45 points maximum) – CAM candidates may be given points for formal education, as follows:

- Aviation Trade School – 15 points
- Associate Degree (two-year) – 25 points
- Bachelor's Degree – 35 points
- Graduate Degree – 45 points

Education points are not cumulative and may be claimed only for the highest level of education completed.

**3. Licensing and Certification** (30 points maximum) – Candidates must document currency for any licenses or certificates claimed for eligibility points. Licensing and certification points are not cumulative and may be claimed for the highest level of licensing and certification completed.

- Mechanic Ratings (10 points maximum)
  - Airframe Only – 2 points
  - Powerplant Only – 2 points
  - Airframe and Powerplant (A&P) – 5 points
  - FCC General Radiotelephone Operators License (GROL) – 2 points
  - Inspection Authorization (IA) – 10 points
- Pilot Ratings (10 points maximum)
  - Private Pilot – 2 points
  - Commercial Pilot – 5 points
  - Airline Transport Pilot (ATP) – 10 points
  - Dispatcher License – 10 points

**4. Continuing Education** (45 points maximum) – Continuing education and industry involvement are critical to career growth. The CAM Program grants credit for a number of events provided by a variety of professional development providers, including aircraft manufacturers, universities, NBAA and others. For a complete list, visit [www.nbaa.org/cam/recertification](http://www.nbaa.org/cam/recertification).

### LETTERS OF RECOMMENDATION

All applications must include two letters of recommendation. Recommendations should be from experienced aviation professionals involved in business aviation or other persons with direct knowledge of the applicant and who are competent to comment on the applicant's work history. These letters will not be evaluated for content, but will serve as evidence of the applicant's interest, dedication and involvement in the field of business aviation.

### NON-DISCRIMINATION POLICY

Qualified applicants are considered for certification without regard to gender, race, color, religion, sexual orientation, national origin, age, marital status, medical condition or handicap.

### APPLICATION APPEALS PROCEDURE

Applicants deemed ineligible to take the CAM exam have the opportunity to appeal that decision in one of two ways (please use the appeals form found in the appendix of the *Candidate Information Handbook*):

**Appeal to the Bylaws and Standards Committee** – Applicants deemed ineligible to take the CAM exam have the opportunity to appeal that decision to the CAM Bylaws and Standards Committee. An applicant may appeal the decision of the committee by writing to the committee within

60 days of notification of the decision using the CAM Program Appeals Form provided in the appendix.

The applicant must submit any documentation necessary to support the appeal. The Bylaws and Standards Committee may meet in person or by telephone to discuss the appeal. The committee may speak to the individual by telephone. All of the applicant's expenses pertaining to the appeal will be borne by the applicant. The committee will notify the applicant in writing of its decision within 60 days of receipt of the original written appeal.

**Appeal to the full CAM Governing Board** – Applicants may appeal the decision of the Bylaws and Standards Committee to the full CAM Governing Board by writing to the chairman of the governing board within 60 days of notification of the committee decision. The applicant must submit documentation deemed necessary to support the appeal. The governing board may meet in person or by telephone. The governing board may allow the individual to be present at a personal meeting, if one is held, or may talk to the applicant by phone. All of the applicant's expenses pertaining to the appeal will be borne by the applicant. The governing board will notify the applicant of its decision in writing within 120 days of receipt of the written appeal. The decision of the CAM Governing Board is final.

## Exam Administration

CAM exams are administered in a computer-based testing (CBT) format. Information pertaining to computerized testing, as well as other aspects of exam administration, is presented below.

### COMPUTER-BASED TESTING

All CAM computer-based testing is administered under contract with our current testing provider. Testing centers are available at several hundred locations in the United States. Complete and current information regarding testing can be reviewed at [www.nbaa.org/prodev/cam/schedule](http://www.nbaa.org/prodev/cam/schedule).

**Authorization to Test** – Once a candidate's CAM application is complete and has been officially approved by the CAM Governing Board, as outlined in the policies and procedures and this handbook, an "Authorization to Test" letter is sent to the candidate. At the same time, the CAM administrative director sends our testing provider an electronic authorization, indicating which candidates are eligible for exam.

Upon receipt of the authorization letter, candidates will be provided a link to our current testing provider to logon and schedule their exam. This letter will contain the most up to date contact information for our testing provider.

**Day of the Exam** – Exams are administered as scheduled in advance with our testing provider. Visitors are not permitted in the exam room.

Examinees are expected to be at the administration site at least 30 minutes prior to the scheduled exam time, to allow for check-in. Examinees arriving late may be refused admittance by the proctor. Should this occur, the candidate will be required to pay a rescheduling fee and schedule another testing appointment.

During the registration process at the test site, candidates must sign the test roster and present two forms of identification bearing name and signature; one of these must bear a recent photo. Candidates must present one of the following as the primary form of identification:

- Government-issued ID, such as a passport, photo-bearing driver's license with signature or a military/government ID.
- A secondary form of identification may include employee identification cards, a second government-issued ID or a credit card.

Examinees unable to provide acceptable identification will be refused admittance to the exam site and will be required to pay a rescheduling fee and schedule another testing appointment.

**Rescheduling and Cancellation Policies** – If an issue arises that prohibits a candidate from attending a scheduled exam, exam appointments may be rescheduled or cancelled without fee by contacting our testing provider no later than five calendar days prior to the scheduled appointment.

If a reschedule is requested fewer than five calendar days before the administration date, candidates may be required to pay a rescheduling fee. Candidates will not be allowed to cancel or reschedule the exam without penalty unless one of the following four situations has occurred: jury duty, death in the immediate family, military deployment or sickness. Candidates requesting a reschedule under the four exceptions must provide our testing provider with documentation before being rescheduled to a new date.

## QUESTIONABLE TEST-TAKING BEHAVIOR

Proctors follow rigorous policies regarding questionable test-taking behavior or "cheating." Such behavior includes but is not limited to: examinees copying from one another, examinees speaking to one another during the administration or examinees copying from notes. Proctors have been instructed to immediately terminate the exam and collect all materials from those individuals in question. Exams terminated under such circumstances will be invalidated and the examinee will be subject to the related policies outlined in this handbook.

## TEST ENVIRONMENT STANDARDIZATION AND SECURITY

To ensure that all CAM candidates are examined under comparable conditions, employing fair and accurate testing methods, it is essential that testing environments be standardized. In addition to other provisions outlined in this

handbook, the requirements below seek to achieve test standardization and augment test security. No cellular devices, beepers, pagers, cameras, photographic or video equipment, transmitters, or electronic equipment of any type are allowed in the testing room. No papers, books, textbooks, notebooks, notes, unauthorized scratch paper, tobacco or food are permitted in the testing room. Any violation of the testing policies and procedures may result in dismissal from the testing center, invalidation of exam results, and forfeiture of eligibility to test, as well as associated fees.

## TEST SCORE CANCELLATIONS AND CONFIDENTIALITY

By applying for and completing a CAM exam, all candidates agree to the following policies:

**1. Validity Assurance and Score Cancellation** – The CAM Governing Board reserves the right to cancel any exam score if, in the CAM Governing Board's sole professional judgment, there is any reason to question the score's validity. Circumstances warranting score cancellation may include, but are not limited to: copying from notes or from another examinee's answers; speaking or otherwise communicating with others during the test administration; aiding or receiving aid from other examinees; consulting study aids of any type during the exam; copying, transcribing, or otherwise reproducing test materials; removing test materials from the exam room; or having improper access to CAM exam content prior to the exam administration. Statistically significant score increases upon retesting may also be investigated to ensure the authenticity of results. Proven misconduct may disqualify the applicant from all future exam attempts and from CAM certification.

**2. Exam Confidentiality and Non-Disclosure Agreement** – The content of all CAM exams is copyrighted and is the property of the CAM Governing Board. Exam materials are provided to applicants on a temporary basis for the sole purpose of testing their knowledge in the discipline for which they seek certification. Applicants are required to return scratch paper to the test administrator immediately after completing the exam, and applicants are prohibited from using or possessing CAM exam content for any other purpose or at any other time. Applicants agree not to disclose, publish, copy, reproduce, transmit or distribute exam content, in whole or in part, in any form or by any means, for any purpose, without the expressed prior written authorization of the CAM administrative director. The unauthorized disclosure, publication, copying, reproduction, transmission, distribution or possession of exam content or materials in any form is a crime and may subject violators of these policies to civil liability and/or criminal prosecution.

## SPECIAL ACCOMMODATIONS FOR TESTING

The CAM Governing Board is committed to ensuring that no individual is deprived of the opportunity to take an exam solely by reason of a disability. Special accommodations may be provided for candidates with documented disabilities. Candidates requesting special provisions must state

their needs in writing when applying to take the exam. Requests must include (but are not limited to):

- Documentation of the disability by a recognized professional (e.g. psychiatrist, psychologist, physician, learning specialist, social worker).
- Accommodations requested for the exam.
- Descriptions of past accommodations provided to the applicant in similar testing situations.

Whenever possible, the CAM Governing Board will determine applicant eligibility for special provisions, while preserving the security of the exam. Candidates should allow the CAM administrative director reasonable time to review the request, and if warranted, make provisions to provide an accommodation. The exam administration staff will be notified when special considerations are granted.

Candidates can file an appeal to the response by NBAA and the CAM Governing Board using the form found in the appendix of this publication.

## Exam Results

All computerized exams are scored by the testing contractor. Scores are verified and transmitted to the CAM Governing Board for release to candidates.

### EXAM SCORING

The CAM program uses scaled scores from 200 to 800, like the SATs, and anchors the passing point at 500. This is determined by a method of analysis of each question and how it relates to the overall view of the exam. The required score to pass the exam was determined using the Angoff Method, the most widely used and highly defensible criterion-referenced method. In implementing this method, NBAA worked under the guidance of our testing provider.

The method has two phases: data collection and decision. Data for determining the score were collected when the test was assembled. A group of subject matter experts (SMEs) determine the passing score by estimating the percentage of minimally competent candidates that would answer each question correctly. The passing score is the average of the sums of these SMEs' probability estimates. The resulting exam score is based upon the total number of correct responses that represent competency.

### SCORES AND SCORE REPORTS

Following exam scoring, examinees receive verbal notification from NBAA about their exam performance. Passing examinees receive a letter indicating that they have passed the exam: they do not receive a scaled score.

Failing examinees receive a letter indicating that they have failed the exam, their scaled score and information regarding performance in each of the exam domains. Examinees may wish to consider these areas of weakness in preparation for retesting.

### PROCESSING TIME

Exam results are generally available within 30 days of the exam administration.

### EXAM APPEALS PROCEDURE

Examinees have the right to appeal exam results within the following specified criteria established by the CAM Bylaws and Standards Committee.

**Grounds for Appeal** – Examinees may appeal exam results in situations restricted to extraordinary circumstances that:

- Arise coincidentally with the exam administration;
- Are outside the control of the appellant;
- Made the examinee's experience different from other others' (related to the exam administration) and/or affected the examinee's ability to receive credit for a test question (related to the exam content);
- Were significant enough to account for exam failure; and
- Were properly reported to the administrative director and the CAM Governing Board.

Unless all of the above circumstances are met, no circumstance will be considered grounds for appeal.

If written documentation of the extraordinary circumstances is not received by the CAM Governing Board within 72 hours of a computer-administered exam, an examinee will forfeit the right to appeal. The appeal form can be found in the appendix of this handbook.

**Method of Appeal** – Appeals shall:

- Be set out in writing;
- Include the name of the grievant;
- Detail the nature of the appeal and all particulars necessary for the appeal to be adjudicated;
- Be mailed or emailed to the CAM Governing Board; and
- Include a non-refundable fee of \$100.

An appeal form may be found in the appendix to this document and online at [www.nbaa.org/cam](http://www.nbaa.org/cam).

**Initial Review** – The CAM administrative director, a CAM Governing Board Executive Committee member (not including the vice chair), and a qualified and current CAM shall:

- Review an appeal within 15 business days after receiving it.
- Determine the validity of the appeal based upon the submitted documentation, as to the existence of extraordinary circumstances described in the "Grounds for Appeal" section above.
- The CAM administrative director shall notify the appellant by mail within 20 business days of receipt of the appeal whether the appeal has been accepted or denied. Accepted appeals will be brought to the consideration of the CAM Bylaws and Standards Committee.

**Full Review** – The CAM Bylaws and Standards Committee will only review accepted appeals brought forth by the initial review process. The committee will:

- Review the appellant’s statement of appeal within 90 business days of receipt of the appellant’s appeal by the CAM Governing Board. Documents reviewed will include the proctor report, exam contractor report and comments submitted by the appellant at the time of the exam.
- Notify the appellant of its decision in writing within 15 business days after the final review of the appeal.

No member of the CAM Bylaws and Standards Committee will communicate directly with an appellant. Communication concerning the appeal will be made between the CAM administrative director and the appellant.

### **CAM BYLAWS AND STANDARDS COMMITTEE DECISIONS**

The CAM Bylaws and Standards Committee may put forth the following decisions based upon evidence presented by the appellant and by the CAM Governing Board:

- Grant the appeal.
- Deny the appeal.
- Deny the appeal and grant the appellant an attempt at the next exam administration without cost to the appellant.

All decisions of the CAM Bylaws and Standards Committee are final.

### **RE-TESTING**

Because performance is evaluated with respect to all content areas, failing candidates who choose to retake the test must retake the entire exam. After a 90-day waiting period, candidates may retake the exam two additional times without filing a new application. However, candidates must file a new application prior to attempting the exam a fourth time.

## **Exam Format and Scoring**

The CAM exam consists of 150 scored and 25 pretest (unscored) four-option, multiple-choice items. Examinees are required to select the single best answer from among four alternatives. Multiple answers for a single item are scored as incorrect, and items with no answer chosen will be marked as incorrect; there is no penalty for guessing. Test items may require examinees to recall facts, interpret graphic illustrations, interpret information presented in case studies, analyze situations and/or solve problems. It is a closed book exam. Examinees will have 3.5 hours to complete the exam. Sample exam questions are included in a subsequent section of this handbook. The CAM exam is administered in English only, as English is the international language of aviation.

## **EXAM PERFORMANCE STANDARDS**

CAM exams are competency-based, criterion-referenced exams. As such, they may be different from typical tests that many examinees may have taken.

Traditionally, many tests are scored or graded “on the curve.” To obtain an “A” grade, an examinee is only required to perform at a level sufficiently “higher” than the rest of the people in the group who take the test.

Criterion-referenced exams, including those employed by the CAM Program, do not use the group for determining performance, but rather an external standard called the “criterion.” Examinee performance is evaluated against this standard to determine whether an individual’s score is sufficiently high to indicate competence as a professional aviation manager recognized by the CAM Governing Board.

### **SETTING THE CUT SCORE (PASSING SCORE)**

Setting the cut (passing) score for the CAM exam is a critical step in the test development process because it has implications for both the validity and the legal defensibility of the certification program. The CAM exam is prepared by the CAM Governing Board Testing Committee with the support of our testing provider.

Because the passing point is the critical delineation between being certified and non-certified, CAM and our testing provider take great care to establish the base cut-score or passing point. A professional workshop facilitator trains a group of subject matter experts (SMEs) to assist in the cut-score deliberation process (the Modified Angoff V procedure). The SME group is asked to identify and define the level of minimum competence for the practitioner, review items and provide ratings as to the proportion of minimally competent applicants who will answer the given item correctly. These values are averaged and aggregated across all exam form items and evaluated to arrive at a defensible passing point.

After obtaining the ratings, our testing provider further analyzes the data and uses appropriate statistical techniques and expert recommendations to arrive at a defensible raw cut-score for each exam form. The raw scores are placed on a scale of 0 to 800, with 500 reported as a passing score for all exams. Score scaling is a common psychometric practice, used on many exams, including the SAT, ACT and many federal and state licensing exams.

### **PASSING THE EXAM AND RE-EXAMINATION**

The minimum passing score for an exam is translated into a number of correct responses. To pass the exam, a candidate must obtain the minimum passing scaled score of 500. Although the exam consists of several distinct content areas, evaluation of test performance is based on the total score that a candidate obtains, combined across all content sections. Because performance is evaluated with respect to all content areas, failing candidates who choose to retake the test are required to complete the entire exam. After the

first failure, candidates may retake the exam two additional times without filing a new application. However, candidates must file a new application prior to attempting the exam a fourth time.

## Maintenance of Exam Quality and Test Security

### COLLECTION AND REVIEW OF STATISTICAL INDICES

Periodically, statistical reports are generated by the CAM test development partner that show how each question in the test performed. The results of these analyses are reviewed by members of the Testing Committee, who, with support from the NBAA Testing Provider, make a final determination regarding the suitability of each question for continued use.

### EXAM DEVELOPMENT

Test items retained in the CAM item bank, also maintained by the NBAA Testing Provider, are regularly reviewed and evaluated by the Testing Committee and subject-matter experts. Necessary changes or deletions are made to update content and relevance. New items added to the bank proceed through numerous reviews and evaluations before approval and acceptance. Certification exam development is the direct responsibility of the Testing Committee with support of our testing provider.

In constructing different forms of a test, a change in an individual item does not alter the balance of the complete exam. The test specifications for each exam are standardized, ensuring all exams are equivalent. This provides all examinees with consistent, comprehensive and standardized exams. Test validation research and job analyses are periodically conducted to ensure that the content of exams is current and relevant. Furthermore, comprehensive statistical summaries are prepared periodically to assess the performance outcomes of all exams administered.

### EXAM SECURITY

All exams administered by the CAM Governing Board are processed with the highest degree of security available. All exam administrations are conducted under strict direction of proctors.

## CAM Credential

Candidates who meet all application requirements, pass the certification exam, and comply with CAM policies and provisions may become certified by the CAM Governing Board. Recertification requirements, CAM professional principles and values, and the disciplinary policy are defined below. CAMs in good standing must abide by these tenets. As a Certified Aviation Manager, you shall be permitted to use this designation and the CAM logo in accordance with the CAM Governing Board bylaws and policies.

## RECERTIFICATION REQUIREMENTS

The purpose of CAM recertification is to ensure that a CAM demonstrates and maintains proficiency and competency in their profession. Further, the CAM program defines continuing competence of an aviation manager as remaining current and proficient with the rules and regulations, being up-to-date on best practices, and gaining knowledge on new concepts within the field.

In order to maintain their certification, the CAM Program requires all certificants to participate in and document activities supporting the continuation of their CAM certification every three years. Recertification supports the CAM requirement that the professional commit to ongoing maintenance of professional competence over time. To meet this requirement, certificants must accrue a combination of continuing education and professional leadership experience during the relevant timeframe.

Certificants must apply for recertification or lose their certification upon expiration of the then-current certificate. Download the CAM Recertification form used for assessing compliance with the program at [www.nbaa.org/cam](http://www.nbaa.org/cam).

## CAM PROFESSIONAL PRINCIPLES AND VALUES

CAM certificants will adhere to and agree to follow the CAM professional principles and values statement:

I will seek to support efforts within my profession that enhance the safety, security, efficiency and acceptance of business aviation worldwide. I will seek to support and encourage all members of my profession and the business aviation industry. I will strive to maintain the highest levels of service while in my role as a CAM professional in the business aviation industry. I will strive to achieve and practice the eight CAM values. The first letters of each CAM value together spell SERVICES.

- Safety: I will maintain the highest standards for safety of personnel and equipment at all times.
- Efficiency: I will strive to achieve the most efficient and cost-effective means of accomplishing my employer's mission.
- Relevance: I will seek to maintain the most relevant expertise needed by my employer and reach the highest standards possible.
- Vision: I will maintain a vision that supports the highest standards of accomplishment for my company and industry.
- Integrity: I will strive for the highest level of integrity without compromise while accomplishing my duties.
- Commitment: I will demonstrate the highest level of commitment to fulfilling my job duties with distinction.
- Excellence: I will seek excellence in all aspects of mission accomplishment within my realm of responsibility.

- Security: I will maintain the highest levels of security and comfort for all involved in my sphere of influence.

## DISCIPLINARY POLICY

CAM certificants will be disciplined, if necessary, under the standing disciplinary policy approved by the CAM Governing Board at [www.nbaa.org/cam](http://www.nbaa.org/cam).

## Confidentiality and Privacy Policy

The Certified Aviation Manager Governing Board shall:

- Not disclose confidential information related to or verbally discussed during CAM Governing Board meetings or other verbal or written information identified as confidential CAM Governing Board business.
- Not divulge the specific contents of CAM applications and related documents or any information about an applicant received verbally or in writing.
- Not disclose confidential information related to certification or application challenges, appeals or other actions being considered by the CAM Governing Board.
- Not disclose any information related to individual certification renewal materials, challenges, appeals or other action in connection with individual renewal cases.
- Maintain all certification materials sent for review in a secure area at all times and return these materials to CAM/NBAA staff at the next meeting unless specifically instructed to do otherwise by the CAM Governing Board Chair or CAM Administrative Director.
- Not disclose any written or oral information that has been identified as confidential.

## PRIVACY POLICY

The CAM Governing Board has created this privacy policy in order to demonstrate our firm commitment to privacy for all stakeholders. The following discloses information gathering and dissemination practices for the Certified Aviation Manager (CAM) program.

The CAM Governing Board reserves the right to change this policy at any time by notifying users of a new privacy statement.

## COLLECTION OF DATA

The CAM Governing Board does not collect personal data about individuals except when such individuals specifically provide such information on a voluntary basis. Users should also be aware that non-personal information and data may be automatically collected through the standard operation of NBAA's programs.

In certain limited circumstances (for instance in the Examination Registration Form), the Governing Board may

ask candidates to provide information regarding any prior criminal convictions to assess their suitability to become a CAM. Additionally, candidates may be asked to provide information regarding any disabilities or health conditions so that suitable arrangements may be made to accommodate candidates at examinations, seminars and other events. Such sensitive information will be kept strictly confidential and be used only by the Governing Board for the limited purposes for which it was collected.

## PURPOSE OF PROCESSING

The personal data collected is used by the CAM Governing Board and third parties acting on its behalf for customer administration and marketing-related purposes so we can effectively:

- Process applications received by the CAM Governing Board.
- Manage the CAM Governing Board's relationship with existing members.
- Send marketing communications on the CAM Governing Board's behalf and on behalf of other selected vendors.

In some cases, such as a request for a *CAM Study Guide* and CAM Application, the CAM Governing Board does require the collection of home addresses and telephone numbers. It has been the governing board's experience that residential contact information is more constant than business contact information because of the mobility of professionals through their careers. This information is only used to contact individuals about upcoming examinations and training seminars.

The CAM Governing Board will occasionally perform statistical analyses of user behavior and characteristics in order to measure interest in and use of the various areas of the website. The CAM Governing Board will provide only aggregated data from analyses to affiliated third parties.

As the CAM Governing Board is an organization based in the United States, your personal data will be collected and processed in the United States by the CAM Governing Board and third parties acting on its behalf in accordance with and for the purposes set out in this privacy policy. If candidates do not wish for their personal data to be handled in this way, they should email [cam@nbaa.org](mailto:cam@nbaa.org).

## RELEASE OF INFORMATION

Unless specifically requested to keep CAM certification private, the individual applicant or certificant authorizes the CAM Governing Board and its agents to communicate all information relating to the application, certification, and review thereof to state and federal authorities, employers, other applicants and certificants, educational programs and others by means of newsletter or otherwise.

The individual releases, discharges and exonerates the CAM Governing Board, its officers, directors, employees,

committee members, agents and any person furnishing documents, records and other information relating to eligibility, certification or recertification from any and all liability of any nature and kind arising out of the furnishing or inspection of documents, records and other information and any investigation, evaluation and communication made by the CAM Governing Board once certified.

Examination scores are confidential and will not be disclosed unless the CAM Governing Board receives a written and signed request to do so by subpoena or court order. The candidate also must indicate in writing which particular scores may be disclosed and identify specifically the person or organization to which the scores should be revealed.

### **OPT-OUT**

The CAM Program is a membership organization and, as such, must maintain contact information on its members to communicate relational or transactional information. The certificant may elect to opt-out of release of his/her specific information by contacting the CAM Governing Board at **cam@nbaa.org**. Once a certificant self-selects to opt-out of information release, he/she must approve any requests for release of data. CAM staff members retain a secure database of all past and active CAMs that includes a complete, closed-roster of certificants. The roster includes the date of certification, due date for recertification and methods for documentation of recertification points for each CAM. These data are stored and archived according to the CAM Program Records Retention policy to ensure data security.

NBAA also sends promotional material promoting its conferences, training opportunities or other offerings. If, at any time, you do not wish to receive marketing material, every marketing email will include an opt-out link at the bottom or you may notify the CAM Governing Board in writing at **cam@nbaa.org**. This does not include opting-out of CAM program relational (constituent meetings, newsletters, recertification notices and CAM Governing Board functions) or transactional notices. If you possess CAM certification, you may not opt-out of any CAM Program relational or transactional notice.

## **Professional Practice and Disciplinary Policy and Procedures**

The Professional Practice and Disciplinary Policy and Procedures of the CAM Governing Board are intended to assist and inform certificants and candidates for certification as to professional conduct and disciplinary procedures. The CAM Governing Board conducts a certification program for business aviation professionals and has established recertification requirements. The CAM Governing Board affirms that, after a candidate has successfully passed the certification examination, the standards for entry into business aviation professions have been satisfied. The CAM Governing Board does not express an opinion on the competence or warrant

the job performance of certificants. However, it is expected that a certificant or candidate for certification agree to comply at all times with the professional principles of behavior of a Certified Aviation Manager.

Persons concerned with possible violations of CAM Governing Board standards shall identify in a written statement to the CAM Governing Board the persons alleged to be involved and the facts concerning the alleged conduct in as much detail and specificity as possible, with available documentation. The statement must include the name, address and telephone number of the person making the statement and others who may have knowledge or facts concerning the alleged violation.

### **DISCIPLINARY STANDARDS**

The CAM Governing Board may suspend, revoke or otherwise take action with regard to the application or certification of an individual in the case of:

- Ineligibility for certification.
- Irregularity in connection with any certification examination.
- Unauthorized possession, use, access or distribution of certification examinations, score reports, answer sheets, certificates, certificant or applicant files, documents or other materials.
- Fraud or misrepresentation in the application or maintenance of association membership, professional accreditation or other professional recognition or credential.
- Any physical and/or drug condition, habitual use of alcohol or any other drug or substance to a degree which impairs objective professional performance.
- Gross or repeated negligence in professional work, willful misconduct in the performance of professional services, or other unethical or unprofessional conduct based on demonstrable and serious violations of the code of conduct.
- Not adhering to the certification eligibility requirements, continuing education requirements or professional standards of practice.

### **DISCIPLINARY PANELS**

The CAM Governing Board Chair may appoint a review panel. This panel will consider alleged violations of any application or certification standard set forth in these procedures as reported in the CAM Governing Board Appeals Form, provided in the appendix. This panel may be established as a standing panel.

### **DISCIPLINARY REVIEW PROCEDURES**

Whenever the CAM Governing Board receives allegations that raise an issue under the disciplinary review procedures, the CAM Governing Board shall transmit such allegations to the chair of the review panel. Use of the CAM Governing Board Appeals Form (see appendix) is encouraged.

If the review panel determines that no good cause exists to question eligibility or compliance with the standards, no adverse action shall be taken.

However, if the review panel determines by majority vote that good cause does exist, it shall direct communication to the applicant or certificant by certified mail, return receipt requested. The review panel shall state the factual allegations constituting the alleged violation and disciplinary standard allegedly violated and shall include the following recitation of rights and procedures:

- That the applicant or certificant has the right to an oral review if he or she disputes the truthfulness of the allegations and the applicant or certificant must bear his or her own expenses in connection with any such review.
- That the applicant or certificant shall have 15 days to notify the review panel whether he or she disputes the allegations, requests a review and/or has comments regarding appropriate sanctions.
- That sanctions may be imposed if the allegations are determined to be true by a disciplinary panel or if the applicant or certificant fails to submit a timely response.
- That the applicant or certificant will be deemed to consent to the imposition of sanctions by the review panel if he or she does not dispute the truthfulness of the allegations.

Whenever the review panel determines that there is cause to believe that a threat of immediate and irreparable damage exists, it shall determine the appropriate sanctions.

### **DISCIPLINARY REVIEW**

If an applicant or certificant disputes the sanctions of the review panel then the following procedures should be used:

The chair of the review panel shall:

- Forward the allegations and the applicant or certificant's response to the CAM Governing Board using the appeals form provided in the appendix.
- The CAM Governing Board shall maintain documentation of the meetings.
- The CAM Governing Board and the applicant or certificant may make opening statements and present written briefs as scheduled by the CAM Governing Board.
- The CAM Governing Board shall determine all matters relating to this review.

### **SANCTIONS**

Sanctions for violation of any CAM Governing Board standard(s) may include one or more of the following:

- Denial or suspension of eligibility
- Revocation
- Non-renewal
- Censure

- Reprimand
- Suspension
- Training or other corrective action
- Reports
- Conditions relating to the above

### **DISCIPLINARY DECISION**

The decision of the review panel and/or CAM Governing Board shall be rendered in writing. The decision shall contain factual findings, conclusions of law and any sanctions applied. It shall be transmitted to the applicant or certificant by certified mail, return receipt requested.

As prescribed, the individual gives up certain rights to privacy as a condition of application for, or granting of, certification.

### **RESIGNATION**

If a certificant, who is the subject of a complaint, voluntarily surrenders his or her certification at any time during the pendency of a complaint under these procedures, the complaint is dismissed without any further action by the review panel or CAM Governing Board. The CAM Governing Board may authorize the Chair to communicate the fact and date of the resignation and the fact and general nature of the complaint that was pending at the time of the resignation. Similarly, in the event of such resignation, the person or entity who submitted the complaint is notified of the fact and date of resignation and has dismissed the complaint as a result. In the event of such resignation, the certificant shall not be eligible to re-apply for certification for five years from the date of the resignation.

## **Exam Content Outline**

The CAM exam subject matter comprises the following five domains: Leadership, Human Resources, Operations, Aircraft Maintenance and Facilities Operations, and Business Management. For a full breakdown of the CAM content, visit [www.nbaa.org/cam/domains](http://www.nbaa.org/cam/domains).

### **DOMAIN I: LEADERSHIP**

As 23 percent of the exam, the Leadership domain consists of 34 items and tests knowledge of:

- Components of vision, mission and values statements
- Strategies for writing vision, mission and values statements
- Corporate mission and goals
- Strategies for aligning the department with corporate goals
- Strategies for writing goals
- Components of goal statements
- Industry standards and trends

- Corporate business plan, goals and objectives
- Time management
- Qualities of good leaders
- Leadership styles and strategies
- Motivation theory
- Team-building strategies
- Communication strategies, techniques and tools
- Industry resources
- Safety management system (SMS) principles
- Human factors principles

### **DOMAIN II: HUMAN RESOURCES**

As 18 percent of the exam, the Human Resources domain consists of 27 items and tests knowledge of:

- Corporate personnel policies and industry practices
- Training programs
- Strategies for measuring the effectiveness of training
- Strategies for forecasting needs
- Training gaps and skill gaps
- Performance evaluations
- Strategies for summarizing performance
- Strategies for setting appropriate goals
- Compensation norms in the industry
- Employee rewards programs
- Human resource issues and regulatory requirements
- Documentation systems
- Interviewing practices
- Background checks
- Environmental influences on human factors

### **DOMAIN III: OPERATIONS**

As 21 percent of the exam, the Operations domain consists of 33 items and tests knowledge of:

- Flight department standard operating procedures
- Flight department regulatory requirements
- Basic principles required for an effective flight operations manual
- Original equipment manufacturer operating requirements
- Crew resource management
- Domestic/international operations requirements
- Safety programs

- Risk assessment
- Cost-effectiveness analysis
- Human factors in operations
- Disaster-recovery plans and emergency planning
- Crew and aircraft certifications
- Dispatch concepts for scheduling
- Customer (passenger) service and satisfaction
- Recordkeeping techniques and systems
- Data analysis techniques
- Audit requirements
- OSHA requirements
- Hazardous materials procedures

### **DOMAIN IV: AIRCRAFT MAINTENANCE AND FACILITIES OPERATIONS**

As 19 percent of the exam, the Aircraft Maintenance and Facilities Operations domain consists of 28 items and tests knowledge of:

- General aircraft systems knowledge
- Manufacturer specifications and practices
- Manufacturer product-information systems and methods
- Applicable airworthiness programs
- Facility emergency plans
- Emergency equipment and systems
- Passenger service components
- Aircraft maintenance requirements
- Inventory-control packages, systems and tools
- Procurement practices
- Security requirements and systems for passengers, aircraft and airport
- Vendor selection and contract negotiation
- Maintenance resource management
- Assessing and managing risk

### **DOMAIN V: BUSINESS MANAGEMENT**

As 19 percent of the exam, the Business Management domain consists of 29 items and tests knowledge of:

- Methods of corporate travel analysis
- Aircraft ownership and utilization options
- Public relations
- Marketing

- Proposal presentation
- Communication techniques
- Corporate culture
- Components of an aviation budget
- Budget analysis and forecasting
- Financial management information systems
- Taxation and its impact on flight department budgeting
- Aircraft evaluation and acquisition
- Generally accepted accounting principles
- Cost recovery plan (e.g., chargeback)
- Strategies for monitoring and controlling revenues and expenses
- Aviation insurance strategy and requirements
- Tax ramifications for aircraft ownership, leasing, operating and sales
- Project management
- Confidentiality requirements
- Ethics requirements and guidelines
- Environmental impact of aviation
- Community planning and ordinance strategies
- Airport planning
- Airport user groups
- Mediation strategies

### ACRONYMS USED ON THE EXAM

The following list of acronyms and their extensions are used on the CAM exam. Candidates are expected to be familiar with the meaning of all acronyms listed.

- AC – Advisory Circular
- AD – Airworthiness Directive
- AOPA – Aircraft Owners and Pilots Association
- ATC – Air Traffic Control
- ATP – Airline Transport Pilot
- CAM – Certified Aviation Manager
- CEO – Chief Executive Officer
- CFO – Chief Financial Officer
- FAA – Federal Aviation Administration
- FAR – Federal Aviation Regulations
- FCC – Federal Communications Commission

- FPM – Feet per Minute
- FSDO – Flight Standards District Office
- GPS – Global Positioning System
- HR – Human Resources
- IBAC – International Business Aviation Council
- ICAO – International Civil Aviation Council
- IFR – Instrument Flight Rules
- ILS – Instrument Landing System
- IS-BAO – International Standard for Business Aircraft Operators
- NASA – National Aeronautics and Space Administration
- NBAA – National Business Aviation Association
- NTSB – National Transportation Safety Board
- OSHA – Occupational Safety and Health Administration
- PIC – Pilot-in-Command
- SIC – Second-in-Command
- SM – Statute Miles
- TCAS – Traffic Collision Avoidance System
- U.S. – United States
- USA – United States of America
- UTC – Coordinated Universal Time
- VFR – Visual Flight Rules

### SUGGESTED REFERENCE LIST

The CAM Governing Board provides a suggested reference list as a resource that may be useful to supplement the education, training and experience related to competent performance as a business aviation manager. Candidates are encouraged to review resources and information in content areas where skills or knowledge may be weak, keeping in mind that some questions on the exams will be pulled from each content area. The CAM Governing Board does not recommend that candidates memorize all recommended references. The information tested on the exam pertains to the common body of knowledge that is delineated in the “Exam Content Outline” section above. All exam items and tasks are confirmed by one or more of the references on the list. Additional information about obtaining recommended texts and study guides may be found at [www.nbaa.org/cam](http://www.nbaa.org/cam).

The CAM Governing Board does not endorse any particular text or author. This list is not intended to be inclusive, but reflects references used to support the test development process. Use of the references does not guarantee successful performance on the exam.

## Sample Exam Questions

Sample exam questions are provided in this section to assist applicants in understanding the exam subject matter and in preparing for the test. The following five questions are intended to give the applicant an idea of the structure and format of the exam. (See answers at end of section.)

### SAMPLE LEADERSHIP QUESTION

Which of the following statements is most consistent with strategic planning?

- A. Set quotas, standards and schedules.
- B. Establish a chain of command.
- C. Guide current and near-term activities.
- D. Establish overall objectives.

Reference: *Contemporary Business 2000*, Louis E. Boone and David L. Kurtz, 2007.

### SAMPLE HUMAN RESOURCES QUESTION

A former maintenance technician is hired to perform cleaning and refueling operations on the ramp and given the job title of Ramp Manager. The position is classified as exempt from overtime pay. Is this classification correct?

- A. No, the employee works different shifts during the day or night and is therefore non-exempt.
- B. No, the job title alone does not determine whether the employee is exempt.
- C. Yes, aircraft refueler job descriptions can meet the general test for professional exemption.
- D. Yes, as a manager the employee has to exercise discretion regularly and is therefore exempt.

Reference: *Employer's Legal Handbook*. Steingold. 8th edition. Berkeley. 2007. page 58.

### SAMPLE OPERATIONS QUESTION

An aviation department manager wants to gather and analyze quantitative data to evaluate whether the department is operating in a safe manner. Which of the following can be measured and analyzed?

- A. Risk
- B. Safety
- C. Budget for the last 10 years
- D. Operating costs for the last 10 years

Reference: *Aviation Safety Programs: A Management Handbook*, Richard Wood, 2003.

### SAMPLE AIRCRAFT MAINTENANCE AND FACILITIES OPERATIONS QUESTION

Which statement BEST characterizes a quality maintenance training program that helps to ensure dispatch reliability and cost control?

- A. The training program addresses all budgeting and scheduling constraints.
- B. The training program emphasizes line diagnostic and maintenance troubleshooting techniques.
- C. The training program uses the manufacturer's online publication and courses.
- D. The training program includes recurrent training every 48 months for maintenance personnel.

Reference: *NBAA Management Guide*, pages 4-3 and 4-4.

### SAMPLE BUSINESS MANAGEMENT QUESTION

What major consideration should be emphasized when marketing corporate aviation?

- A. Cost of jet fuel
- B. Creation of shareholder value
- C. Amenities of corporate aircraft
- D. Convenience of corporate aircraft

Reference: *Business and Corporate Aviation Management: On-Demand Air Travel*, John J. Sheehan, 2003.

### ADDITIONAL OPPORTUNITIES FOR STUDY

NBAA offers workshops and review courses independent of the CAM Governing Board. The CAM Governing Board provides no training nor educational materials, and candidates for the CAM credential are not required to purchase training or education materials from NBAA in order to pass the exam.

Attendance at NBAA-sponsored courses is not a prerequisite to sitting for the exam, the courses are not designed to serve as exam preparation classes, nor do they serve any ancillary exam-related purposes. The course curricula are designed specifically to review broad concepts and offer high-level overviews of NBAA-relevant topics. The education/training courses are neither designed nor marketed to provide the level of detailed review of technical knowledge required for exam preparation. More information about NBAA's educational opportunities may be found online at [www.nbaa.org/education](http://www.nbaa.org/education).

Answers to Sample Exam Questions: D, B, A, B, B.

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## **ABOUT NBAA**

Founded in 1947 and based in Washington, DC, the National Business Aviation Association (NBAA) is the leading organization for companies that rely on general aviation aircraft to help make their businesses more efficient, productive and successful. Join today by visiting [www.nbaa.org/join/cam](http://www.nbaa.org/join/cam).

