THE REQUIREMENTS, CLASSIFICATION, TRAINING, AND DUTIES OF AIR FORCE PERSONNEL

ARMY AIR FORCES CLASSIFICATION CENTER

NASHVILLE, TENNESSEE

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I. INTRODUCTION -

The primary functions of the Army Air Forces Classification Center are to classify Aviation Cadets for training as Bombardiers, Navigators, and Pilots, and to give them military and physical training to prepare them for the specialized Air Crew schools. The following discussion has been prepared to help each Aviation Cadet to understand the procedures used in classifying cadets and to acquaint him with the requirements, training, and duties of Air Force personnel.

No matter how strong a man's desire to succeed in a particular type of training, he will not be successful if he does not have the necessary abilities. On the other hand, even though a man has the necessary abilities, he will not do his best on the job if he is not keenly interested in it. Consequently, in the classification of cadets, it is the general policy to assign each man to the type of training which he prefers, if he is well qualified for it. Within a few days after his arrival at the Army Air Forces Classification Center, each man is required to make a formal statement of the types of service in the Air Force for which he would like to be trained. This statement of preferences is seriously considered in classifying the Cadet for a particular type of training.

In view of these facts, considerable responsibility rests upon each Aviation Cadet to examine seriously his interests and his qualifications so that he may be able to make a wise and sincere choice of the type of duty in which he will be able to serve his country best.

If a Cadet is to analyze his interests and qualifications adequately, he must be well informed with regard to the qualifications, training and duties of the jobs to which he can be assigned. This manual, orientation lectures, and other sources of information are presented to give the Cadet the necessary facts. It is hoped that each Cadet will seriously consider the information he secures from these sources in formulating his preferences, rather than rely solely on desires acquired before entering the Army Air Forces Classification Center.

The objective of the classification program is two-fold; to serve the best interests of the Army Air Force and to serve the best interests of the Cadet. In order to make the most efficient use of the available man-power, it is necessary to get each man into the type of duty for which he is best adapted. By applying this principle through the classification program, the best interests of the Air Force are served by getting the right man into the right job and the interests of the individual are served by getting him into the type of training in which he is most likely to succeed.

It should be noted that the Army Air Forces Classification Center is concerned solely with the classification of the Air Crew. It does not select nor train men for ground or administrative duties. Only those who actually desire to be Bombardiers, Navigators, and Pilots will be classified at this center. Consequently, the major portion of this discussion deals with the training and duties of the Air Crew. However, in order that the Aviation Cadet may adequately evaluate his qualifications for duty in the Air Force, a discussion is also presented of the duties and requirements of ground officers, administrative officers, and enlisted men in the Air Force.

II. REQUIREMENTS, TRAINING, AND DUTIES OF AIR FORCE PERSONNEL -

A. The Air Crew

The important role that aviation is playing in the present war has made the three flying officers - the Bombardier, Navigator, and Pilot - the "three musketeers" or "three aviateers" of this war. On the long range flights of modern war these three officers are equally important members of a team. The success of any one of the three depends upon the effectiveness of the other two.

Essentially, the duties of the three flying officers are as follows: the Bombardier takes command while in the target area and actually does the bombing; the Navigator directs the course of the plane to and from the area of the objective; the Pilot takes the ship up, puts it on the course designated by the Navigator, and lands it upon its return.

The functional relationship of the three Air Crew members may be shown through the following illustration: Three men set out to kill a mountain lion, known by one of the men to have its lair in a certain spot. One of them took his car and drove it, obviously comparable in function to the Pilot. He did not know where to go and had to follow directions given him by the man who knew the route. When they reached a point near the lair, they left the car and hiked to the location of the lair, again directed by the one who knew the way. The latter's activity in guiding the group while in the car and hiking was comparable to the duties of the Navigator. While enroute the expert shot in the group was busy, checking his ammunition, loading his guns, and keeping watch against a surprise encounter with the lion. In the vicinity of the lair, he took charge of the group and did the actual shooting, completing the Bombardier's job.

This simple anecdote serves to illustrate how each member of the hunting expedition needed to depend on the others to accomplish the purpose of the trip. Of course, one might argue that a sportsman could set out by himself with only a gun and return with the quarry. However, in a bombing plane a mission cannot be accomplished single-handedly. Each of the three chief members of the Air Crew has a full-time job when on a combat mission, and each is of equal and primary importance.

It must be emphasized that all of Air Crew training, from its initial phases to the time the Cadet receives his Wings and commission as an officer in the United States Army Air Force, is of a most rigorous nature. To complete the course successfully requires a high order of intelligence, stamina, and courage. Air Crew has no room for those who lack fortitude or those who are not prepared to accept flying responsibilities in a most serious manner. It is through the adherence to these standards that our Army Air Force is today creating a type of airman that is superior in all phases of combat flying to those of any other nation, and these standards will not be reduced.

There are a few general requirements which apply to all candidates for Air Crew. They must be between the ages of 18 and 36 inclusive, although applications of men under 21 must be accompanied by parents' or guardian's consent in writing. Cadets may be married or single. They must have been citizens of the United States for a period of at least ten years prior to date of application.

The duties of the Bombardier, Navigator and Pilot are very different, and they require different types of abilities and temperaments. No one of the three groups is "more capable" than the other two. For example, many successful Pilots would fail as Navigators and Bombardiers. It is, therefore, important that each candidate for the Air Crew discover what the qualities necessary for each of these positions are, and try to discover the job for which he is best qualified. A more detailed discussion of the work of each member of the Air Crew follows:

1. The Qualifications, Training, and Duties of the Navigator -

The Navigator is usually assigned to bomber planes. The extensive bombing experience of the present war has made clear the extreme difficulty and importance of the Navigator's duties. It is his job, by day or night, to chart the course that the bomber must fly from its base to the objective and back home. The task may be enormously complicated by the need for avoiding enemy aircraft or ground defenses, and the necessity for skirting bad weather areas. Planes are frequently driven long distances off their course over strange territory by enemy action or weather and would be lost completely but for the skill of the Navigator. If the Navigator fails to plot a true course, or if he cannot find the target in enemy territory, he and the entire bomber crew have made a useless trip. Failure of the mission may have serious military consequences.

The Navigator's job is to determine the course the plane will follow and to direct it to its objective. In flight, he constantly checks to see that the plane is following its course. He must be able at any time to determine the exact geographic location of the place, frequently without receiving any clues from the earth itself.

The navigation of any army bomber in combat service is far more complex than navigating a steamship on an ocean, or a transport plane in peacetime. In wartime combat navigation there are no friendly light or radio beacons to help guide the bombing plane because all ground lights are blacked out and all radio signals are silenced.

The army Navigator, therefore, must be an expert in four different types of navigation: pilotage, dead reckoning, radio navigation, and celestial navigation. Pilotage is flying from point to point on the earth's surface through the use of visible landmarks. This method is useless over water, over an overcast, and in most night flying. Dead reckoning is blind navigation, flying from point to point entirely through the use of navigation instruments. This method is useless at night and in inclement weather, as it is necessary to see the ground in order to measure drift. Radio navigation is navigation in which the Navigator remains in contact with the ground at all times through the use of beacons, markers, direction finders, etc.. This method is of little, if any, use in combat aviation. Celestial navigation involves the ability to determine the plane's position, track, and ground speed entirely through the use of heavenly bodies in either the day or night and in all kinds of weather. Celestial navigation is, therefore, of the greatest importance in wartime flying.

The Navigator must have a high level of intelligence. He must enjoy solving complex problems by mental rather than by physical activity. He must be able to use precise scientific instruments accurately and rapidly. He must be able to do these things under pressure without becoming rattled. The Navigator should enjoy solving mathematical problems. It is advantageous, but not essential, to have had training in algebra, geometry, and trigonometry. The prospective Navigator will be taught the necessary mathematical techniques in training, but he should have a high level of interest and ability in mathematics, so that he can master the mathematics in a short time.

Like the Bombardier and the Pilot, the Navigator receives his classification after he has been at the Army Air Forces Classification Center for approximately two weeks. He is then transferred to the Navigator Pre-Flight School with the next class. After the pre-flight academic course is completed (nine weeks) at an Army Air Force Pre-Flight School (Navigator), the Cadet is then sent to the advanced school and there he will receive an intensive course in Navigation which lasts twelve to fifteen weeks. During this latter training a great deal of time is spent aloft at all altitudes and under all types of weather conditions. These missions range from short runs to 24 hour cross country trips. A graduate of an advanced navigator school can truly be called a finished, expert Navigator.

The training of the Navigator requires a minimum of 21 weeks, or approximately 5 months, including the original period at the Army Air Forces Classification Center.

On successful completion of the course, the Cadet will receive a certificate as a graduate Navigator, his Wings, and a commission as a Second Lieutenant in the United States Army Air Force. His monthly remuneration will be exactly that of the Bombardier or Pilot. He also is sent to an Operational Training Unit where he will meet and work with other members of his Air Crew.

2. The Qualifications, Training, and Duties of the Bombardier.

The Bombardier has achieved a position of prominence in the present war because bombing has become such an important military operation. The military value of the bombing plane is no greater than the ability of its Bombardier to place his bombs on the target, so that no other member of the Air Crew bears as great a responsibility for the final success of the bombing mission as the Bombardier.

While in actual flight the Bombardier takes over the active command of the plane as soon as the target area has been reached, usually about 50 miles before passing over the objective, and completes the bombing, which usually requires several runs, before giving the ship back to the Pilot.

The Bombardier aims bombs by means of a bombsight, which is America's most highly guarded military secret. In the bombing operation, the Bombardier directs the Pilot as to the direction and control of the plane's flight. He takes readings of altitude, air speed, wind velocity, temperature, and similar features, and adjusts the bombsight according to these factors. He may have to do some rapid arithmetic computations in determining these readings. He also has to sight the target visually through the bombsight and at the appropriate instant release the bombs. He may bomb from altitudes ranging up to 30,000 feet. At extremely low altitudes, the bombsight is not used. His task may be made very difficult by anti-aircraft fire, enemy fighter planes, or bad weather.

The operation of the bombsight is only one of many duties of the Bombardier. In preparation for a mission, he may supervise the fusing and loading of the bombs. While in flight, but not actually bombing, he may act as observer, as gunner in the nose of the ship, or perform other duties.

The Bombardier must be cool headed and free from tension under stress, have good vision, have a keen sense of synchronization of hand and eye, to make precise adjustments of dials on the bombsight, be capable of quick action and thought, be capable of accurate interpretation of the plane's instruments, a keen observer, be able to shift his attention very rapidly from one factor to another, and must be intelligent. He should be right handed or truly ambidextrous.

The secrecy of the bombsight must be protected. Consequently, no one can be permitted to enter Bombardier training whose character, citizenship, and loyalty are not above question. Because the Cadet who

takes Bombardier training will work with the bombsight when at the advanced bombardment school, he is required to fill out a special form listing his personal history, references, etc., as soon as he has been classified. This information is then exhaustively checked by the Federal Bureau of Investigation, which requires four or five weeks. In the meantime, the Cadet will have been transferred to the Pre-Flight School (Bombardier).

When his academic work has been completed at the Pre-Flight School (Bombardier), he is sent to a bombardment school, such as the ones at Midland, Texas, Victorville, California, Higley-Chandler, Arizona, Roswell, New Mexico, or Albuquerque, New Mexico, for his complete air training. At this school, which takes him through the entire twelve weeks' course, he flies a number of hours each day in various types of bombing planes. Much work is done with ingenious practice mechanical devices operating on the floor of the training building, which simulate flight bombing conditions.

After the first week or so he makes so-called "dry-runs" simply flying over target areas to learn observation, identification of objectives, etc.. This is progressively followed by bombing with sand bombs, lightly charged bombs used simply to show where the shots land, and finally with fully charged bombs. During the training, bombing missions are carried out from various altitudes. The missions themselves may last several hours.

On completion of the 21 weeks of training the Cadet receives his Wings and his commission as 2nd Lieutenant in the United States Army Air Forces. He is then sent to an Operational Training Unit where he meets the other members of his permanent Air Crew and final training in team work takes place. This usually consists of coastal patrolling and other special missions.

3. The Qualifications, Training, and Duties of the Pilot.

The work of the Pilot is so well known that no detailed discussion of it is necessary. However, the work of the Army Pilot flying on military operations differs in many ways from ordinary peacetime flying. One important difference is that the job of the military Pilot is to fight, not merely to fly. A lifelong desire to fly may prove to be inadequate as motivation for military flying. The military Pilot must have a strong desire to be a flying fighter. Analogously, many persons who like to drive an automobile would not be so anxious to drive if they had to duel opposing autos by means of machine guns mounted on the fenders.

A second way in which military flying differs from peacetime piloting is that war activity requires greater maneuvering of the plane. The Pilot will do considerably more turning, diving, looping, etc. then he would do in peacetime flying. A third difference is that considerable flying may be done at altitudes requiring use of oxygen masks - much military flying is done between elevations of 20,000 to 30,000 feet. In peacetime, commercial Pilots rarely fly above 10,000 feet elevation.

A fourth way in which military flying differs from peacetime flying is in the extent to which the military Pilot must cooperate with others. The Pilot of the bombing plane must follow the course laid out by the Navigator, and while over the target must fly as directed by the Bombardier. The fighter Pilot, too, although alone in his plane, must fight as a member of a team of planes, or with land or sea forces. The individual dog-fight dramatized by the movies, is giving way to the need for unified squadron attacks.

Pilots are usually assigned to duty as fighter Pilots or as bomber Pilots. The fighter Pilot may fight in action supporting the advance of ground troops, and in such operations his activities must be coordinated with ground troop movements. Or he may be assigned to the defense of friendly military objectives from enemy air attack. On such operations, it is his duty to intercept and repulse the offensive air power of the enemy. This interception involves systematic patrol of the probable routes of enemy attack and may be routine. Fighter Pilots also accompany bombing planes on their missions in order to protect the bombers from enemy planes, so that they can successfully complete their task. All three of these types of assignments illustrate the fact that the fighter Pilot must subordinate himself to the cooperate efforts of the squadron or other military forces.

The bomber Pilot flies larger ships than the fighter. A considerable part of his flying may be done by night. The course which he flies is planned by the Navigator. While over the target, he flies as directed by the Bombardier, but must keep the plane on a smooth level course so that the Bombardier can drop the bombs accurately. Examples of missions of bombing planes are (1) those in which the plane sets out with a definite military objective to be bombed, and (2) patrol duty such as anti-submarine duty on which the bomber hunts for enemy subs and bombs then wherever he finds them.

In Air Crew work the Pilot's essential duties are to fly the ship, taking it off the ground and landing it at the completion of the mission. He is theoretically flying the ship at all times, but, actually, much of the "stick work" is done by his companions who also become capable and experienced flyers by virtue of the tremendous number of flying hours they spend in the air. The Pilot functions as crew captain, particularly if there is an aerial engagement with enemy forces, except at such times when the movements of the ship are carried out under direction of the Bombardier or Navigator.

To be qualified for Pilot training, the Cadet must have a temperament which permits him to accept readily the type of duty to which military pilots are assigned. Although he should have a "burning desire" to fly, he must also want to be a flying fighter. In addition to this motivation, he must have certain abilities. He must be capable of learning new skills very rapidly. Many Cadets are eliminated from military training who can learn to fly, but cannot learn fast enough to meet army requirements. He must be capable of fast, accurate thinking, be able to pay attention to several factors at once, shifting his attention rapidly from one factor to another; have a keen sensitivity to variations in movement in space and to intensities of sound; have good

practical judgment; be well adjusted emotionally, free from tension; and be congenial, cooperative, and obedient. He must be able to co-ordinate his movements, but not in the way we ordinarily think of coordination - he may need, for example, automatically and simultaneously to push his right foot forward and pull his left foot back, push his left hand forward and pull his right hand back and to the right. It must be remembered that if the Pilot is sent on a mission by himself, he must act as his own Navigator and Bombardier and must, therefore, have some of the abilities necessary for those two types of duties.

Cadets classified for further training as Pilots receive a preliminary course of nine weeks at the Pre-Flight School (Pilot). At the completion of this, they are sent to one of the many primary training schools which are located in the Southeast Army Air Forces Training Center. Here, after an orientation period of two or three days, they begin to get actual flying instruction in aeroplanes of the PT (primary trainer) type. When they have demonstrated sufficient skill to satisfy the instructor, they are allowed to start "solo" flying. They are given a total training of nine weeks at the primary school during which they will receive approximately 60 hours of flying time, and are, of course, given daily classes in all of the ground subjects necessary. This classroom schedule is carried on throughout the time spent in basic and advanced flying schools.

On completion of the nine-weeks course at primary school, the Cadet is then sent to a basic school for a period of similar duration, where he begins to fly faster ships, learns the rudiments of formation flying, etc.. When this course has been successfully completed he is taken to an advanced school for the final nine-weeks of training during which he learns to fly still faster ships and perform more complicated maneuvers. This final period of instruction will make him an expert and when he is graduated, he will receive his Wings and be commissioned as a Second Lieutenant in the United States Army Air Forces.

Having successfully completed the entire Pilot training, a man may receive any of many different assignments. If, however, he is designated as a bombardment Pilot, he is sent to a technical training unit where he meets and flies with the other men who will be associated with him as an Air Crew. It is during this final period that the priceless teamwork is developed which is so completely essential in successful bombardment missions.

B. Ground Officers

In addition to the three commissioned flying officers, there are five commissioned ground positions open to Cadets who can qualify. These ground officers are: armament officer, communications officer, engineering officer, meteorologist, and photographer. They Army Air Forces Classification Center is not directly concerned with these ground duties, but classifies Cadets for Air Crew only. A Cadet who desires ground duty training, and who seems to meet the qualifications, is transfered to a Replacement Training Center (Technical) in the grade of private, to await reappointment for ground duty officer training.

An official transcript of college work is required from men applying for training to become ground officers. At least two years of college work are required for admission to training as armament or communications officer, while at least three years are required for engineering, meteorology, or photography officer. In each case, the college training must include certain specialized courses as noted below. In addition, candidates must meet the usual physical requirements for a reserve officer commission, which are not as high as for Air Crew duty.

Upon completion of the training for any of these five types of service, the Cadet is commissioned a Second Lieutenant in the Air Force Reserve and assigned to active duty.

The armament officer is charged with the supervision and maintenance of all armament, machine guns, bomb racks, flares, etc.. He must understand thoroughly the structure and installation of all armament equipment used in planes.

Civilians who wish to qualify for this service must have at least two years of college credits in an accepted engineering course. Former aviation cadets who have been eliminated from further training because of flying deficiency may be accepted with two years of college credits (not necessarily engineering credits) including one year of college physics, providing they did not fail any ground school subjects and are recommended by their Commanding Officer.

It is recommended that the college training of applicants for armament officer should include shop courses, physics, chemistry, mathematics, mechanical drawing, and any available courses in ballistics or ordnance.

The training period at the Armament School at Lowry Field, Denver, Colorado, is twelve weeks. The curriculum includes metal work, soldering, electrical armament control, explosives and ammunition, chemical warfare, small arms, aircraft machine guns, synchronizers, and installations, tow targets, field exercises, etc..

The communications officer is in charge of maintenance and operation of radio, telegraph, and teletype, and directional equipment including radio compass.

The applicant for training in this field must have at least two years of college credits including a year of college physics. Holders of amateur or commercial radio licenses may substitute this experience for physics credits. Mathematics is desirable, as are courses in electronics and the National Defense Radio Course or its equivalent. College courses recommended are electrical engineering subjects, physics, general or specialized radio theory, mathematics, chemistry, mechanical drawing, electronics, shop courses.

The training period is for sixteen weeks at Scott Field, Illinois. The curriculum includes: AC and DC circuits, transmitters, receivers, circuit analysis, communications sets, liaison sets, compass sets, etc..

The engineering officer is responsible for all mechanical details of the plane while on the ground. Under his supervision technical enlisted men "keep 'em flying."

A minimum of three years of engineering training in an accredited college are required for admission to training in this field. It is highly desirable that applicants should have had training in aerodynamics, airplane construction and instruments, and aeronautical engineering subjects as well as courses in thermodynamics, internal combustion engines, hydraulics, electrical engineering subjects, analytical mechanics, stress analysis and metallurgy.

The training period for engineering officer is 19 weeks. The curriculum includes airplane mechanics, airplane structure, hydraulic equipment, propellors, instruments, engines, electrical systems, etc..

The meteorologist must observe and record actual weather conditions and must predict the weather. His work is very important because the successful accomplishment of military missions depends upon his accurate forecasting of weather conditions.

Applicants for meteorological training must have completed at least three years of college, specializing in engineering or in the sciences. They should have completed differential and integral calculus, and physics to include heat and thermodynamics. Throughout their college course, they must have been in the upper third of their class.

Successful applicants receive thirty weeks of training in one of the five universities cooperating with the Army in this training program. Courses studied include: synoptic meteorology, dynamic meteorology, meteorological instruments and laboratory.

The photography officer takes charge of the operation of mobile and fixed photographic laboratories. He supervises or does the photographing done for military purposes.

Applicants for training in this branch of the service must have completed at least three years of chemistry or geology, including physiography, at an accredited college. They must also have had amateur or professional photographic experience. Men with extensive technical photographic experience may not be required to present the college credits.

Successful applicants will be sent to Lowry Field, Denver, Colorado, where they will receive instruction in administration, basic theory of photography, assembly and interpretation of aerial photographs, map reading, etc.. The course covers twelve weeks.

C. Air Force Administrative Officers

Aviation Cadets and enlisted men in the Air Forces are eligible for appointment to officer training for administrative work in the Air Force. The administrative work will include various positions such as finance officer, supply officer, etc.. Much of the administrative work does not require technical knowledge of any phase of aviation. The administrative work will involve considerable desk work.

No college training is required for admission to officer training. The candidate must be between 18 and 36 years of age, must be a citizen of the United States, must have ninety days of active military service, and a score of 120 or better on the Army General Classification Test. He must pass a special qualifying examination, also, which is different from the Cadet qualifying examination.

Aviation Cadets are not permitted to take the qualifying examination for Air Force administrative work until they have been officially eliminated from cadet status by a Faculty Board, either as a result of failure to meet a mental or physical requirement for Air Crew training or as a result of failure in a training school for Air Crew duty.

The training and duties of the Bombardier, Navigator, and Pilot require a combination of abilities, temperaments, and courage that is indeed rare in the general population. Consequently, it is the obvious duty of every man who possesses the qualifications for any of the three Air Crew positions to seek assignment to Air Crew duty and to leave the administrative work mentioned above to those who lack his special talents.

D. Enlisted Men in the Air Force

Enlisted men in the Air Force are assigned to a variety of duties, but they may be grouped into three classes: flying, technical, and administrative. Enlisted flying personnel are enrolled as "aviation students" and are given pilot training in enlisted status. They are not eligible for commissions but, on successful completion of their training, are given their Wings and appointed "flying sergeants" with the grade of Staff Sergeant and flying pay which is 50% above the base pay for that grade.

The technical duties are a very direct and important part of military aviation operations. The gunners who man the guns of large bombers, and consequently get considerable flying time, are enlisted men. The enlisted mechanics keep the plane, its motors, and instruments in satisfactory operating condition. The enlisted radio operator may fly with the plane, keeping contact with the ground base or other planes, or he may operate on the ground. There are many other types of technical duty to which enlisted men are assigned. For each of these technical jobs, the man is trained in special schools conducted by the Army Air Force.

Many of the positions to which enlisted men are assigned in the Air Force are with the administrative staff of the Air Force. These duties involve office work in personnel offices, finance offices, etc..

III. THE CLASSIFICATION PROCEDURE -

The process of classification usually requires a period of two weeks beginning immediately after the Cadet arrives at the Army Air Forces Classification Center.

Classification is based primarily on three factors: the Cadet's abilities, traits, and skills as measured by a series of psychological tests, his physical qualifications, and his preferences. Data on these factors are secured during the first week. Their interpretation and the final classification of the Cadet are completed generally in the second week.

During their stay at the Classification Center, the Cadet begins his military training with daily drill. He also participates in regular calisthenics and sports to whip him into peak physical shape. Inoculations for tetenus and infectious diseases are also started during this period. The Cadet also attends various lectures. After being classified, the Cadets continue their military and physical training until assigned to a class at an appropriate Pre-Flight School. At the pre-flight school the Cadet takes ground courses and continues with military and physical training. This course lasts approximately nine weeks. If not assigned to Air Crew, other arrangements are made for him.

The phases of the classification processes mentioned above are discussed in detail below.

A. The Physical Examination

A physical examination is given to each Cadet soon after his arrival at the Army Air Forces Classification Center. This is the physical examination for flying, or "Form 64" examination, and is more thorough and rigid than the preliminary examination given before arrival at the Classification Center. It is conducted by experienced Flight Surgeons and Aviation Medical Examiners and governed by regulations that have been developed through years of research, experimentation, and experience, dating from the founding of the Army Air Forces. In order to classify as many Cadets as possible in Air Crew, certain minor physical defects are corrected by the hospital and before any Cadet is eliminated from Air Crew because of these physical reasons his case is carefully investigated and he may be examined repeatedly. As a result of the physical examination, Cadets may be classified "Class I" which qualifies them physically for any Air Crew duty, or Class II or III" which qualifies them for training in Navigation only. The principal difference is that Navigators are permitted to have slightly less acute vision than either Pilots or Bombardiers.

If a Cadet is physically disqualified from Air Crew duty, he may still be qualified for ground duty or administrative officer training, or for technical service in an enlisted capacity. It is obviously the desire of the Flight Surgeon's office to qualify as many Cadets as possible for Air Crew; and only those cases are eliminated from flying training who cannot possibly meet the physical standards.

B. Statement of Preferences

The second factor that determines a Cadet's classification is his preference for various types of Air Crew training. On the day that he takes his psychological classification tests, each Cadet is required to express his first, second, and third choice among the three Air Crew duties of Bombardier, Navigator, and Pilot.

These preferences will affect the Cadet's classification for his first assignment. This statement of preferences also becomes a part of his official record and will follow him throughout his training. In the event that he is eliminated from the training to which he is first assigned, this statement of his preferences will influence his reclassification at that time. It is therefore vitally important that the Cadet give as much serious consideration to the type of training which he lists as his second or third choice as he gives to his first choice.

This manual, and other sources of information regarding the qualifications and duties involved in the various jobs in the Air Force are presented so that the Cadet will be able to analyze and evaluate his interests and qualifications intelligently.

It must be emphasized that the Army does not want to classify any man for flight duty if he expresses the desire to stay on the ground. The duties during missions aloft are far too important and too exacting to allow any man to be a Pilot, Navigator, or Bombardier whose whole heart is not in the job. Only those who are thoroughly qualified and have expressed a sincere desire for the training will be selected for Air Crew assignment. Only by adhering vigorously to this rule can the Army Air Forces expect to maintain a position of prominence.

C. The Psychological Classification Tests

Each Cadet will take a series of psychological classification tests which measure the abilities, traits, and skills required of Bombardiers, Navigators, and Pilots. These tests have been scientifically constructed by psychologists in the Army Air Force, working in cooperation with Air Crew personnel. The obvious purpose is to determine the Air Crew positions for which a Cadet is best qualified.

It is as important to the Cadet himself as it is to the Army that he try to do his best on all of the tests in order that his abilities and skills may be evaluated accurately by the tests. The Cadet should note that in the event that he is eliminated from the training to which he is first assigned, he will not retake the tests, but his previous scores on the tests will be a major factor in determining his eligibility and classification for other Air Crew training.

Every effort is made to assign a Cadet to that position in Air Crew for which he has designated a preference, provided his natural aptitudes are such that he can be expected to fill that position satisfactorily. If, on the other hand, his test results indicate clearly and beyond doubt that he is better suited for one of the other positions, he will be so classified, and in this respect the decision of the Faculty Board is final. The reason for this should be obvious to anyone, but the following case will illustrate why it is necessary to classify a man contrary to his expressed desires.

John Jones wanted to be a Pilot and for years has had his heart set on this objective. He is a fine physical speciman, and has had a good education. He doesn't know the meaning of the word fear. He has, at his own expense and considerable sacrifice, learned to fly and has accumulated a number of solo hours. However, his physical and psychological tests show clearly that he is poor in coordination and is slower than average in his reactions, but is excellent in mental calculations. It is evident that John Jones is much better suited to be a Navigator than a Pilot. If he were a Pilot, his lack of coordination might result in a crash in formation flying or death to himself and his comrades in combat because he was unable to react skillfully enough in a sky filled with enemy planes. His slowness of reaction could very easily result in inability to meet a quick emergency. In any case, he would be jeopardizing the lives of himself and other members of his crew and a ship worth thousands of dollars which are desperately needed for the winning of the war. It is clear that John Jones represents a hazard as a Pilot whereas his mental agility will qualify him admirably as a Navigator. He is, therefore, classified in the latter category and is thus placed in a position where he can serve his country to the best advantage.

Hundreds of examples of this sort can be shown to demonstrate the soundness of the methods of classification which are now standard with the Army Air Force. It has been found that deviations from these basic methods have, in the past, resulted in tragic accidents, and so it is sometimes impossible for the Faculty Board to give a man the Air Crew position for which he has voiced preference. Although a Cadet who is not assigned to his choice of Air Crew duty may be disappointed temporarily, these tests actually help him by preventing injury or death which might otherwise result from a blind attempt to carry out his own misguided ambitions.

These psychological classification tests occupy approximately a day and a half of each Cadet's time. The tests are administered, scored, and interpreted by the Psychological Unit. On the basis of his performance on the tests each Cadet is given a rating as to his aptitude for Bombardier, Navigator, and Pilot training. The rating for Pilot training is based on an average of the Cadet's scores on a certain group of tests. The rating for Bombardier and Navigator are based on an average of his scores on other groups of tests. No one test either determines a Cadet's classification or eliminates him from any of the Air Crew positions.

In many cases Cadets are called to the Psychological Unit for an interview to secure further information which may be helpful in evaluating his performance on the tests. Failure to report for his conference on schedule will greatly delay the Cadet's classification.

Cadets whose Classification Test scores are consistently low are given recheck tests by the Psychological Unit, and then may be sent to the Flight Surgeon for a further examination and interview to determine their Adaptability Rating for Military Aeronautics. If the Flight Surgeon finds that such Cadets are unsatisfactory in their Adaptability Ratings, they will not be assigned to Air Crew duties. The Psychological Unit does not disqualify any new Cadets who are physically qualified. All disqualifications are based on that final judgment of the Flight Surgeon.

D. The Classification Procedure

The Cadet's preferences, the result of his physical examination, and his Classification Test scores are coordinated by the Psychological Unit, which recommends each Cadet's classification to the Faculty Board. This Board bears the final responsibility for the classification of Cadets. The Faculty Board consists of the Commanding Officer of the Classification Center, the Executive Officer, the Senior Flight Surgeon, the Director of the Psychological Unit, the Commandant of Cadets, and the Personnel Officer, or their representatives.

The recommendations for classification are based on a procedure that may be described as follows: If a Cadet is physically and psychologically qualified for the type of training that is his first preference, he is classified. If a Cadet is not qualified for his first preference, he is recommended for the type of duty for which he has the highest relative ability. Recommendations are also made as to the additional types of duty for which the Cadet is qualified in the event of his elimination from the training to which he is first assigned.

When a Cadet's classification has been recommended he is notified of it by a Special Order. If he feels that he has a just and important reason for desiring a different classification, a Cadet may report to the Secretary of the Faculty Board within 48 hours, and may then be permitted to appear before the Faculty Board in person to request reclassification. The Faculty Board will always consider the Cadet's statement carefully, but he will not necessarily be reclassified for some other duty.

In addition to hearing Cadets who desire a change of classification, the Faculty Board meets every Cadet who is disqualified from Air Crew training, whether his disqualification is due to physical reasons, insufficient aptitude, lack of desire to fly, disciplinary reasons, or any other cause. In all cases every effort is made to see that the Cadets receive fair and unprejudiced treatment according to the regulations of the service.

The entire classification procedure has only one objective--------- to further the prosecution of the war by selecting equally well qualified specialists for these three equally important jobs of Bombardier, Navigator, and Pilot.