TECHNICAL GUIDANCE MATERIALS

VOLUME 2

PART III

AEROMEDICAL

AUTHORISED AVIATION MEDICAL EXAMINER (AAME) GUIDE

Introduction

This Technical Guidance Material is provided for the use of Designees of the Authority referred to as 'Authorised Aviation Medical Examiners (AAMEs)'.

This document called 'Authorised Aviation Medical Examiner (AAME) Guide' provides detail instructions, directions, guidance, information, and procedures for the conduct of medical examination and assessment of aircrew and Air Traffic Controllers.

The AAME guide is publicly available in the interest of transparaency and to provide further advice to the industry in its dealings with the Authority and its designees (AAMEs).

For ease of use, the AAME Guide is divided into Seven (7) chapters with applicable forms provided at the end as appendices.

AUTHORISED AVIATION MEDICAL EXAMINER (AAME) GUIDE

PREFACE

The Authorised Aviation Medical Examiner (AAME) guide has been prepared to assist Authorised Aviation Medical Examiners (hereafter referred to as "AAME") in the efficient and effective performance of their duties and responsibilities as representatives of the Authority. The information and guidance contained in the guide are needed to perform the duties and responsibilities delegated to each AAME by the Authority.

All materials contained in the guide is keyed to the corresponding item number contained on FORM: O-MED 001, Application Form for Medical Certificate. (See Appendices of this guide for examples of Aeromedical Forms.) The medical standards presented here are in compliance with ICAO medical standards contained in Annex 1.

AAME's should be thoroughly familiar with the ICAO DOC 8984, Manual of Civil Aviation Medicine, and ICAO Annex 1. The document is a guide to AAMEs and the NCAA in decisions relating to the medical fitness of licence applicants. It outlines the basic principles for the assessment of an applicant's medical fitness for aviation duties and provides aid in the approach and management of intricate borderline cases.

The Nigeria Civil Aviation Regulations (NIG.CARs) can be obtained from the NCAA website (http://www.ncaa.gov.ng). Nig. CARs Part 2.11 Personnel Licensing addresses the requirements for medical certification.

This AAME guide may be downloaded from the NCAA website at (http://www.ncaa.gov.ng) subsequent changes to the guide will also be available on the NCAA website.

.....

Captain Musa Shuaibu Nuhu

Director General Civil Aviation

LIST OF EFFECTIVE PAGES

AUTHORISED AVIATION MEDICAL EXAMINER (AAME) GUIDE

CHAPTER ONE	11 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023
	3	1st June 2023
	4	1st June 2023
	5	1st June 2023
	6	1st June 2023
	7	1st June 2023
	8	1st June 2023
	9	1st June 2023
	10	1st June 2023
	11	1st June 2023

CHAPTER TWO	8 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023
	3	1st June 2023
	4	1st June 2023
	5	1st June 2023
	6	1st June 2023
	7	1st June 2023
	8	1st June 2023

CHAPTER THREE	47 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023
	3	1st June 2023
	4	1st June 2023
	5	1st June 2023
	6	1st June 2023
	7	1st June 2023
	8	1st June 2023
	9	1st June 2023
	10	1st June 2023
	11	1st June 2023
	12	1st June 2023
	13	1st June 2023
	14	1st June 2023
	15	1st June 2023
	16	1st June 2023
	17	1st June 2023
	18	1st June 2023
	19	1st June 2023
	20	1st June 2023
	21	1st June 2023
	22	1st June 2023
	23	1st June 2023
	24	1st June 2023
	25	1st June 2023
	26	1st June 2023
	27	1st June 2023
	28	1st June 2023
	29	1st June 2023
	30	1st June 2023
	31	1st June 2023
	32	1st June 2023
	33	1st June 2023
	34	1st June 2023
	35	1st June 2023
	36	1st June 2023
	37	1st June 2023
	38	1st June 2023
	39	1st June 2023
	40	1st June 2023
	41	1st June 2023
	42	1st June 2023
	43	1st June 2023
	44	1st June 2023
	45	1st June 2023
	46	1st June 2023
	47	1st June 2023

CHAPTER FOUR	21 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023
	3	1st June 2023
	4	1st June 2023
	5	1st June 2023
	6	1st June 2023
	7	1st June 2023
	8	1st June 2023
	9	1st June 2023
	10	1st June 2023
	11	1st June 2023
	12	1st June 2023
	13	1st June 2023
	14	1st June 2023
	15	1st June 2023
	16	1st June 2023
	17	1st June 2023
	18	1st June 2023
	19	1st June 2023
	20	1st June 2023
	21	1st June 2023

CHAPTER FIVE	20 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023
	3	1st June 2023
	4	1st June 2023
	5	1st June 2023
	6	1st June 2023
	7	1st June 2023
	8	1st June 2023
	9	1st June 2023
	10	1st June 2023
	11	1st June 2023
	12	1st June 2023
	13	1st June 2023
	14	1st June 2023
	15	1st June 2023
	16	1st June 2023
	17	1st June 2023
	18	1st June 2023
	19	1st June 2023

CHAPTER SIX	2 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023

CHAPTER SEVEN	6 PAGES	EFFECTIVE DATE
	1	1st June 2023
	2	1st June 2023
	3	1st June 2023
	4	1st June 2023
	5	1st June 2023
	6	1st June 2023

FORMS

FORM - O - MED 001	-	2 Pages	1st June 2023
FORM - O - MED 002	-	1 Page	1st June 2023
FORM - O - MED 003	-	2 Pages	1st June 2023
FORM - O - MED 004	-	2 Pages	1st June 2023
FORM - O - MED 005	-	2 Pages	1st June 2023
FORM - O - MED 009	-	3 Pages	1st June 2023
FORM - O - MED 015	-	1 Page	1st June 2023
FORM - O - MED 016	-	1 Page	1st June 2023

TABLE OF CONTENT

THE AUTHORISED AVIATION MEDICAL EXAMINER (AAME)

VOLUME 2 PART III

CHAPTER 1

GENERAL INFORMATION

1.0	GENERAL INFORMATION	1
2.0	QUALIFICATION OF AN AUTHORISED AVIATION MEDICAL EXAMINER	1
3.0	THE AAME IS THE DELEGATED AUTHORITY	1
4.0	MEDICAL CERTIFICATE AFFIRMATION	2
5.0	EQUIPMENT REQUIREMENTS	2
6.0	ISSUE OF MEDICAL CERTIFICATES	3
7.0	DEFERRAL OF MEDICAL EXAM	3
8.0	MEDICAL CERTIFICATION DECISION MAKING	4
9.0	DISCRETIONARY ISSUANCE	5
10.0	NO “ALTERNATE” AAMES DESIGNATED	5
11.0	WHO MAY BE CERTIFIED	5
12.0	CLASSES AND VALIDITY OF MEDICAL CERTIFICATES	6
13.0	VALIDITY OF MEDICAL CERTIFICATES	6
14.0	DECREASE IN MEDICAL FITNESS	7
15.0	USE OF PSYCHOACTIVE SUBSTANCES	7
16.0	RE-EXAMINATION OF AN AIRMAN/ATCO	7
17.0	DISPOSITION OF APPLICATIONS AND MEDICAL EXAMINATIONS	7
18.0	PROTECTION AND DESTRUCTION OF APPLICATION FORMS	7
19.0	QUESTIONS OR REQUESTS FOR ASSISTANCE	8
20.0	AIRMAN/ATCO APPEALS AND DISCRETIONARY ISSUANCE	8
21.0	STATEMENT OF DEMONSTRATED ABILITY (SODA)	9
22.0	MEDICAL CONFIDENTIALITY REQUIREMENT OF AUTHORISED AVIATION MEDICAL EXAMINER (AAME)	10
23.0	MEDICAL CONFIDENTIALITY REQUIREMENT OF AUTHORISED AVIATION MEDICAL EXAMINER (AAME)	11

CHAPTER 2

APPLICATION FOR MEDICAL CERTIFICATION

1.0	APPLICATION FOR MEDICAL CERTIFICATION	1
2.0	AAME GUIDANCE FOR POSITIVE IDENTIFICATION OF AIRMEN/ATCO	1
3.0	GUIDANCE FOR THE APPLICANT IN THE COMPLETION OF MODEL FORM: O-MED 001	1
4.0	CLASS OF MEDICAL CERTIFICATE APPLIED FOR (ITEM 2)	2
5.0	IDENTIFICATION (ITEMS 3–17)	2
6.0	HAS YOUR AUTHORITY AIRMAN/ATCO MEDICAL CERTIFICATE EVER BEEN DENIED, SUSPENDED, OR REVOKED? (Item 19)	3
7.0	TOTAL PILOT TIME; DATE OF LAST NCAA MEDICAL APPLICATION (ITEMS 16, 20 - 21)	3
8.0	DO YOU CURRENTLY USE ANY MEDICATION? (ITEM 27)	4
9.0	MEDICAL HISTORY (ITEM 29)	4
10.0	THE AAME'S RESPONSIBILITY TO REVIEW THE APPLICATION	8

CHAPTER 3

EXAMINATION TECHNIQUES AND CRITERIA FOR QUALIFICATION (FORM:O-MED 004 ITEMS 2-49)

1.0	HEIGHT AND WEIGHT (ITEMS 2-3)	1
2.0	EAR, NOSE, AND THROAT (ENT) (ITEMS 9-11)	2
3.0	HEAD, FACE, NECK, AND SCALP (ITEM 8)	5
4.0	EYES (ITEMS 12 - 14)	8
5.0	LUNGS AND CHEST (ITEM 15)	14
6.0	HEART (ITEM 16)	17
7.0	VASCULAR SYSTEM (ITEM 17)	23
8.0	ABDOMEN AND VISCERA (ITEM 18)	24
9.0	ANUS (ITEM 19)	27
10.0	SKIN (ITEM 26)	28
11.0	G-U SYSTEM (ITEM 20)	30
12.0	MUSCULOSKELETAL (ITEMS 22-23)	32
13.0	UPPER AND LOWER EXTREMITIES (ITEM 22)	33
14.0	SPINE, OTHER MUSCULOSKELETAL (ITEM 23)	34
15.0	IDENTIFYING BODY MARKS, SCARS, TATTOOS (ITEM 26)	35

16.0 LYMPHATICS (ITEM 26) 36
17.0 NEUROLOGIC (ITEM 24) 37
18.0 PSYCHIATRIC (ITEM 25) 40
19.0 GENERAL SYSTEMIC (ITEM 27) 45

CHAPTER 4

EXAMINATION TECHNIQUES AND CRITERIA FOR QUALIFICATION

1.0 EXAMINATION TECHNIQUES AND CRITERIA FOR QUALIFICATION 1
2.0 HEARING (ITEM 34 IN FORM: O-MED 004 AND ITEM 419 AND 420 IN FORM: O-MED 003) 1
3.0 VISION (ITEMS 304 – 316 IN FORM: O-MED 005) 5
4.0 BLOOD PRESSURE (ITEM 6 IN FORM: O-MED 004) 13
5.0 PULSE (ITEM 7 IN FORM: O-MED 004) 15
6.0 URINALYSIS (ITEM 35 IN FORM: O-MED 004) 15
7.0 ECG DATE ((ITEM 39 IN FORM: O-MED 004) 16
8.0 OTHER TESTS GIVEN 18
9.0 COMMENTS ON HISTORY AND FINDINGS (ITEM 49 OF FORM: O-MED 004) 18
10.0 HAS BEEN ISSUED (ITEM 48 OF FORM: O-MED 004) 19
11.0 DISQUALIFYING DEFECTS (ITEM 6 OF FORM: O-MED 015) 20
12.0 MEDICAL AAME'S DECLARATION (ITEM 50 OF FORM: O-MED 004) 21

CHAPTER 5

MEDICAL REQUIREMENT

1.0 NIG. CARS 2.11.2.6. CLASS 1 MEDICAL CERTIFICATE 1
2.0 NIG.CARS 2.11.2.7. CLASS 2 MEDICAL CERTIFICATE 7
3.0 NIG.CARS 2.11.2.8.CLASS 3 MEDICAL CERTIFICATE 14

CHAPTER 6

AAME TRAINING REQUIREMENTS

1.0 BASIC TRAINING IN AVIATION MEDICINE 1
2.0 ADVANCED TRAINING IN AVIATION MEDICINE 1

CHAPTER 7

HEALTH PROMOTION

1.0 PURPOSE 1

2.0 REFERENCES 1

3.0 GUIDANCE MATERIAL ON HEALTH PROMOTION 1

AEROMEDICAL FORMS

FORM O – MED 001

APPLICATION FORM FOR A MEDICAL CERTIFICATE 1

FORM O – MED 002

MEDICAL ASSESSMENT REPORT 1

FORM O – MED 003

OTORHINOLARYNGOLOGY REPORT 1

FORM O – MED 004

MEDICAL EXAMINATION REPORT 1

FORM O – MED 005

OPHTHALMOLOGY EXAMINATION REPORT 1

FORM O – MED 009

APPLICATION FORM FOR APPOINTMENT AS AN AUTHORISED AVIATION MEDICAL EXAMINER (AAME) 1

FORM O – MED 015

NOTIFICATION OF DENIAL OF MEDICAL CERTIFICATE 1

FORM O – MED 016

MEDICAL CONFIDENTIALITY STATEMENT 1

CHAPTER 1

GENERAL INFORMATION

1.0 GENERAL INFORMATION

This document prescribes the requirements and procedures for issuing, renewing, and reissuing Class 1, Class 2, and Class 3 medical certificates. It provides information to assist an Authorised Aviation Medical Examiner, otherwise known as the "AAME," in performing his or her duties in an efficient and effective manner.

It also describes the AAME's responsibilities as the Authority's representative in medical certification to determine the fitness of flight crews and air traffic controllers to hold a medical certificate. Each person to be issued a medical certificate must undergo a medical exam based on the physical and mental requirements contained in this guide. Any person who does not meet the medical requirements of this guide may apply for the discretionary issuance of a certificate.

A designated AAME takes on a heavy responsibility. The consequences of a negligent or wrongful certification, which would permit an unqualified person to take the controls of an aircraft or control air traffic, can be serious for the public, for the State, and for the AAME. If the exam is cursory and the AAME fails to find a disqualifying defect that should have been discovered in the course of a thorough and careful examination, a safety hazard may be created.

1.1 Designation of an Authorised Aviation Medical Examiner (AAME)

The NCAA has the responsibility to designate and authorise qualified licensed physicians in the practice of medicine as AAMEs in matters related to the examination, testing, and inspection necessary to issue a medical certificate. AAMEs are delegated the authority to medically examine for fitness applicants for the issue, renewal, or reissue of airman/ATCO medical certificates. AAMEs can be designated outside of Nigeria.

2.0 QUALIFICATION OF AN AUTHORISED AVIATION MEDICAL EXAMINER (AAME)

An AAME must complete the basic training in aviation medicine to perform Class 2 and 3 medical examinations for the subjects listed in Section 6.1 of this guide and advanced training in aviation medicine to perform Class 1 medical examinations on the subjects listed in Section 6.2 of this guide. AAMEs should also acquire knowledge and experience of the conditions in which the holders of licences and ratings carry out their duties.

3.0 THE AAME IS THE DELEGATED AUTHORITY

The AAME is the delegated authority to:

(a) Examine applicants for, and holders of, airman/ATCO medical assessment to determine whether or not they meet the medical standards for the renewal or reissue of an airman/ATCO medical certificate.

(b) Issue or deny airman/ATCO's medical assessment/certificates to applicants or holders of such certificates based upon whether or not they meet the applicable medical standards.

(c) The AAME's authorization is valid for 3 years. The AAME must have completed at least 10 medical examination for a medical assessment every year. Re-authorization will be at the discretion of the Authority.

4.0 MEDICAL CERTIFICATE AFFIRMATION

A medical assessment report issued by an AAME will be evaluated by the Medical Assessor of the Authority before a Medical certificate of fitness is issued.

5.0 EQUIPMENT REQUIREMENTS

AAMEs must have adequate facilities for performing the required examinations and possess or agree to obtain the following equipment prior to conducting any examinations for the Authority.

An applicant's history or current medical status may indicate a need for special evaluations.

The required equipment are as follows:

i. Standard Snellen Test Types for visual acuity (both near and distant). Intermediate visual acuity chart.

ii. Eye muscle test-light. May be a spot of light 0.5cm in diameter, a regular muscle-test light. Or an ophthalmoscope.

iii. Color Vision Test Apparatus. Pseudoisochromatic plates, Ishihara plates (concise 14-, 24-, 38 plate editions.

iv. Visual fields testing equipment or alternatives.

v. Madox rod (may be hand held)

vi. Horizontal prism bar. Hand prism or alternatives.

vii. Standard Physician diagnostic instruments and aids. Including those necessary to perform urinalysis.

viii. Electrocardiographic equipment. Class 1 AAMEs must have access to digital electrocardiographic equipment.

ix. Audiometric equipment. All Examiners must have access to audiometric equipment or a capability of referring applicants to other medical facilities for audiometric testing.

x. Pulmonary function test machine (Spirometry) and Peak expiratory flow rate, these machines should be an available within all the facilities.

xi. Laboratory facility which should be available within the AAME facility or nearby to include

those for routine laboratory investigations namely blood, sugar and urine tests.

xii. All AAMEs must have access to audiometric equipment or the capability of referring applicants to other medical facilities for audiometric testing.

6.0 ISSUE OF MEDICAL CERTIFICATES

(a) Initial issue of medical certificates. A medical certificate will be issued to any person who meets the medical requirements prescribed in this guide, based on medical exam and evaluation of the applicant's history and condition.

1. Initial Class 1 medical certificates must be issued by the Authority.

2. Class 2 and 3 medical certificates issuance may be delegated to an AAME.

(b) Renewal or reissue of medical certificates. The requirements for the renewal or reissue of a medical certificate are the same as those for the initial certificate except where otherwise specifically stated:

1. Renewals of Class 1, 2, and 3 medical certificates can be delegated to the AAME.

2. Reissue of Class 1 medical certificate must be done by the Authority.

3. Reissue of Class 2 and 3 medical certificates may be delegated to the AAME.

(c) Limitations, denials, suspensions, or revocations.

1. The Authority may, for medical reasons justified and notified to the applicant, limit or deny a medical certificate.

2. If it is established that an applicant or a certificate holder has not met or no longer meets the medical requirements, the Authority can suspend or revoke a medical certificate that has been issued.

7.0 DEFERRAL OF MEDICAL EXAMINATION

The prescribed reexamination of a licence holder operating in an area distant from designated medical exam facilities may be deferred at the discretion of the Authority; such deferment must only be made as an exception and must not exceed:

(a) Flight crew members of an aircraft engaged in non-commercial operations. A single period of 6 months.

(b) Flight crew members of an aircraft engaged in commercial operations. Two consecutive periods of 3 months, provided that in each case a favourable medical report is obtained after exam by a designated medical AAME of the area concerned or, if a designated medical AAME is not available, by a physician legally qualified to practice medicine in that area. A report of the medical exam must be sent to the Authority.

(c) Private pilot. A single period not exceeding 24 months where the medical exam is conducted by an AAME designated by the contracting State in which the applicant is temporarily located. A report of

the medical exam must be sent to the Authority.

8.0 MEDICAL CERTIFICATION DECISION MAKING

After reviewing the medical history and completing the examination, AAMEs must:

(a) Issue a medical assessment report/ certificate,

(b) Deny the application, or

(c) Defer the action to the Authority.

(i) AAMEs may issue a fit medical assessment / certificate only if the applicant meets all medical standards, including those pertaining to medical history unless otherwise authorised by the Authority.

(ii) AAMEs may not issue a fit medical assessment /certificate if the applicant fails to meet specified minimum standards or demonstrates any of the findings or diagnoses described in this guide as “disqualifying” or “unfit.”

(iii) The AAME must be aware that an established medical history or clinical diagnosis of any of the following is disqualifying:

(a) Alcoholism

(b) Angina pectoris

(c) Bipolar disorder

(d) Cardiac valve replacement

(e) Coronary heart disease that has required treatment or, if untreated, that has been symptomatic or clinically significant.

(f) Diabetes mellitus requiring insulin or other hypoglycaemic medication

(g) Disturbance of consciousness without satisfactory medical explanation of the cause

(h) Epilepsy

(i) Heart replacement

(j) Myocardial infarction

(k) Permanent cardiac pacemaker

(l) Personality disorder that is severe enough to have repeatedly manifested itself by overt acts

(m) Psychosis

(n) Problematic use of substances

(o) Substance dependence

(p) Transient loss of control of nervous system function(s) without a satisfactory medical explanation of cause

Note: A history of acute toxic psychosis need not be regarded as disqualifying, provided that the applicant has suffered no permanent impairment.

9.0 DISCRETIONARY ISSUANCE

An airman/ATCO who is medically disqualified for any reason may be considered by the Authority for an Authorisation for Special Issuance of a Medical Certificate (Authorisation). For medical defects which are static or non-progressive in nature, a Statement of Demonstrated Ability (SODA) may be granted in lieu of an Authorisation. The Authorisation or SODA would only be issued in cases where the exercise of the privileges of the licence applied for is not likely to jeopardise flight safety.

The AAME always may defer the application to the Authority for action. In the interests of the applicant and of a responsive certification system, however, deferral is appropriate only if:

(a) The standards are not met,

(b) there is an unresolved question about the history, the findings, the standards, or policy,

(c) The examination is incomplete,

(d) Further evaluation is necessary, or

(e) Directed by the Authority.

The AAME may deny certification only when the applicant clearly does not meet the standards. The Authority will use the services of physicians experienced in the practice of aviation medicine to evaluate reports submitted to the Authority by AAMEs.

10.0 NO "ALTERNATE" AAMEs DESIGNATED

The AAME is to conduct all medical examinations at his or her designated address only. An AAME is not permitted to conduct examinations at a temporary address and is not permitted to name an alternate AAME. During an AAME's absence from the permanent office, applicants for airman/ATCO medical certification must be referred to another AAME in the area.

11.0 WHO MAY BE CERTIFIED

(a) Age requirements. There are no age restrictions or aviation experience requirements for medical certification. Any applicant who qualifies medically may be issued Model FORM: O-MED 002.

(b) Language requirements. An applicant for Model FORM: O-MED 002 must be able to speak and

understand the language used for radiotelephony communications.

12.0 CLASSES AND VALIDITY OF MEDICAL CERTIFICATES

An applicant may apply and be granted any class of airman/ATCO medical certificate as long as the applicant meets the required medical standards for that class of medical certificate. However, an applicant must have the appropriate class of medical certificate for the flying duties or ATC duties he or she intends to exercise. For example, an applicant who exercises the privileges of an airline transport pilot certificate must hold a Class 1 medical certificate. That same pilot when holding only a Class 2 medical certificate may only exercise flying activities of a private pilot licence. Listed below are the three classes of airman/ATCO medical certificates, identifying the categories of airman/ATCO licences applicable to each class:

(a) Class 1. Airline transport pilot licence (ATPL), commercial pilot licence (CPL), and multi-crew pilot licence (MPL)

(b) Class 2. Private pilot licence (PPL) and flight engineer (FE), Student Pilot Authorisation (SPA) and Cabin Crew licences

(c) Class 3. Air traffic controller (ATC) licence and Remote Pilot Licences (RPL).

13.0 VALIDITY OF MEDICAL CERTIFICATES

(a) Duration of medical certificate validity.

(1) A Class 1 medical certificate is valid for 12 months until the applicant is age 40 and is then reduced to 6 months thereafter for CPL and ATPL for pilots who are carrying passengers in single-pilot operations. At age 60, the validity period is reduced to 6 months for CPL, MPL, and ATPL holders who are engaged in commercial air transport operations.

(2) A Class 2 medical certificate for PPL is valid for 60 months until the applicant is age 40 years and is then reduced to 24 months thereafter until age 50, when it is reduced to 12 months.

(3) A Class 2 medical certificate for FE licence is valid for 12 months.

(4) A Class 2 medical certificate for Cabin Crew Licence is valid for 24 months until the applicant is 40 years and then it is reduced to 12 months.

(5) A Class 3 medical certificate for ATC licences and RPL is valid for 48 months until the applicant is age 40 and is then reduced to 24 months until age 50, when it is reduced to 12 months.

(b) Determining validity dates of medical certificates.

(1) Initial. Validity begins on the date the medical examination is performed for the initial issuance.

(2) Renewal or reissue. Medical exams conducted not more than 21 days before the current expiry date will use that date as the start date of the new validity period. Medical exams conducted after the current expiry date or earlier than 21 days before expiry date will use the date of the medical exam as the start date of the new validity period.

14.0 DECREASE IN MEDICAL FITNESS

A person who holds a current medical certificate issued by the Authority must not exercise the privileges of their licences and related ratings at any time they are aware of any decrease in their medical fitness which might render them unable to safely and properly exercise these privileges.

A person who is taking medication or receiving other treatment for a medical condition that results in the person being unable to meet the requirements of the medical certificate has experienced a decrease in medical fitness.

15.0 USE OF PSYCHOACTIVE SUBSTANCES

Holders of aircrew and air traffic controller licences must not exercise the privileges of their licences and ratings while under the influence of any psychoactive substance which might render them unable to safely and properly these privileges. Holders of aircrew and air traffic controller licences must not engage in any problematic use of substances.

16.0 RE-EXAMINATION OF AN AIRMAN/ATCO

A medical certificate holder may be required to undergo a re-examination at any time if, in the opinion of the Authority or its authorised representative, there is a reasonable basis to question the airman/ATCO's ability to meet the medical standards. An AAME may not order such reexamination.

17.0 DISPOSITION OF APPLICATIONS AND MEDICAL EXAMINATIONS

All original copies of completed applications and medical examinations, unless otherwise directed by the Authority, must be submitted to the Authority within 5 days after completion. All copies must be signed by the AAME and applicant. In the case of the medical exam being carried out by a constituted group of AAMEs, the Authority will appoint the head of the group responsible for the coordinating the results of the exam and signing the report.

(a) Copies should be sent to: Head of Department Aeromedical Standards Department, Nigeria Civil Aviation Authority, Aeromedical Standards Department, Lagos Regional office, Ikeja, Lagos, Nigeria.

(b) The AAME work copy must be retained by the AAME as their file copy for at least 3 years unless exceeded by State law requirements where the AAME is licensed and performed the examination.

18.0 PROTECTION AND DESTRUCTION OF APPLICATION FORMS

AAMEs are cautioned to provide adequate security for blank medical application and certificate forms to ensure that they do not become available for illegal use. When new or revised medical forms and certificates are issued, AAMEs will be advised of the disposition of the old forms and certificates. The AAME should be prepared to account for the forms if asked. The AAMEs are responsible for making provisions for the return of all unused forms at such time they leave the AAME program (due to resignation, retirement, termination, or death). Forms should not be shared with other AAMEs.

19.0 QUESTIONS OR REQUESTS FOR ASSISTANCE

When an AAME has a question or needs assistance in carrying out his or her responsibilities, the AAME should contact the Medical assessors of the Authority.

20.0 AIRMAN/ATCO APPEALS AND DISCRETIONARY ISSUANCE

(a) Request for reconsideration, special circumstances. An AAME's denial of a medical certificate is not a final denial. An applicant may ask for reconsideration of an AAME's denial by submitting a request in writing to the Authority. Such requests should be sent to: Head of Department Aeromedical Standards Department, Nigeria Civil Aviation Authority, Aeromedical Standards Department, Lagos Regional office, Ikeja, Lagos, Nigeria.

(i) The Authority will use the services of physicians experienced in the practice of aviation medicine to evaluate reports submitted to the Authority by AAMEs.

(b) Authorisation for Special Issuance of a Medical Certificate (Authorisation).
At the discretion of the Authority and in line with Nig. CARs 2.11.1.5 an Authorisation for Special Issuance of a Medical Certificate (Authorisation), valid for a specified period, may be granted to a person who does not meet the established medical standards if that person shows, to the satisfaction of accredited medical authority, that he or she can perform the duties authorised by the class of medical certificate applied for and such performance will not jeopardise flight safety during the period in which the Authorisation would be in force.

The Authority may authorise a special medical flight test (MFT), practical test, or medical evaluation for this purpose. A medical certificate of the appropriate class may be issued to a person who fails to meet one or more of the established medical standards if that person has been issued a valid Authorisation and is otherwise eligible. A Model FORM: O-MED 002 issued in accordance with these special issuance procedures must expire no later than the end of the validity period or upon the withdrawal of the Authorisation upon which it is based.

At the expiry of the Authorisation, an airman/ATCO must again show to the satisfaction of the Authority that the duties authorised by the class of medical certificate applied for can be performed without jeopardising flight safety in order to obtain a new medical certificate and Authorisation. In granting an Authorisation, the Authority may consider the person's relevant ability, skill, operational experience, and any medical facts that may affect his or her ability to perform airman/ATCO duties, including:

(1) The prognosis derived from professional consideration of all available information regarding the person

(2) Operational conditions under which the exercise of the licence will be conducted in granting an Authorisation, the Authority specifies the class of medical certificate to be issued and may do any or all of the following:

i Limit the duration of an Authorisation

ii Condition the granting of a new Authorisation on the results of subsequent medical tests, examinations, or evaluations,

iii State on the Authorisation, and any medical certificate based upon it, any operational limitation needed for safety

An Authorisation granted to a person who does not meet the applicable medical standards may be withdrawn at the discretion of the Authority at any time if:

(1) There is adverse change in the holder's medical condition;

(2) The holder fails to comply with a statement of functional limitations or operational limitations issued as a condition of certification under the special issuance section;

(3) Flight safety would be jeopardised by the holder's exercise of airman/ATCO privileges;

(4) The holder fails to provide medical information reasonably needed by the Authority for certification under the special issuance section; or

(5) A person who has been granted an Authorisation under the special issuance section of this guide, based on a special medical flight or practical test, need not take the test again during later medical examinations unless the Authority determines or has reason to believe that the physical deficiency has or may have degraded to a degree to require another special medical flight test or practical test.

If an Authorisation is withdrawn at any time, the following procedures apply:

i The holder of the Authorisation will be served a letter of withdrawal, stating the reason for the action. A medical certificate rendered invalid pursuant to a withdrawal, in accordance with the special issuance section of this Guide, must be surrendered to the Authority upon request.

21.0 STATEMENT OF DEMONSTRATED ABILITY (SODA)

At the discretion of the Authority, Statement of Demonstrated Ability (SODA), may be granted, instead of an Authorisation, to a person whose disqualifying condition is static or non-progressive and who has been found capable of performing airman/ATCO duties without endangering public safety. A SODA does not expire and authorises an AAME to issue a medical certificate of a specified class if the AAME finds that the condition
described on the SODA has not adversely changed.

(a) In granting a SODA, the Authority may consider the person's operational experience and any medical facts that may affect the ability of the person to perform airman/ATCO duties including:

(1) The combined effect on the person of failure to meet more than one requirement

(2) The prognosis derived from professional consideration of all available information regarding the person

(b) In granting a SODA under the special issuance section of this guide, the Authority specifies the class of medical certificate to be issued and may do either of the following:

(1) State on the SODA, and on any medical certificate based upon it, any operational limitation needed for safety

(2) Condition the continued effect of a SODA on compliance with a statement of functional limitations issued to the person in coordination with the Authority

(c) A SODA granted to a person who does not meet the applicable standards may be withdrawn at the discretion of the Authority at any time if:

(1) There is adverse change in the holder's medical condition

(2) The holder fails to comply with a statement of functional limitations or operational limitations issued under the special issuance section of this guide

(3) Flight safety would be jeopardised by the holder's exercise of airman/ATCO privileges

(4) The holder fails to provide medical information reasonably needed by the Authority for certification under the special issuance section of this guide.

(d) A person who has been granted a SODA under the special issuance section of this guide, based on a special medical flight or practical test, need not take the test again during later medical examinations unless the Authority determines or has reason to believe that the airman/ATCO's physical deficiency has or may have degraded to a degree to require another special medical flight test or practical test.

(e) If a SODA is withdrawn at any time, the following procedures apply:

(1) The holder of the SODA will be served a letter of withdrawal stating the reason for the action. In accordance with the special issuance section of this guide, a medical certificate rendered invalid pursuant to a withdrawal must be surrendered to the Authority upon request.

22.0 MEDICAL CONFIDENTIALITY REQUIREMENT OF AUTHORISED AVIATION MEDICAL EXAMINER (AAME)

22.1 Maintaining medical confidentiality by AAME

a) The Authorized Aviation Medical Examiner (AAME) shall ensure the confidentiality of all medical records of licenced aviation personnel in his or her custody.

b) The AAME will have a dedicated locker or room where he/she will store all records of licenced aviation personnel.

c) Access to the dedicated locker or room where medical records of licenced aviation personnel are kept shall be restricted to the AAME and AAME staff (those staff that work with the AAME in medical examination of applicants for a medical certificate).

d) The record keeping system of the AAME shall be assessed by the medical assessor during surveillance of AAME facility to ensure strict compliance.

e) If the AAME loses his/her designation for whatsoever reason the Authority will retrieve all medical records of licence aviation personnel in his/her custody.

f) In case of death of the AAME the Authority will retrieve all medical records of licenced aviation personnel from the facility.

g) AAME staff who are non-medical practioners will be required to complete Form 0-MED 016

(Medical Confidentiality statement)

22.2 **Release of Pertinent Medical Information by AAME**

a) Except in compliance with an order of a court of competent jurisdiction, AAMEs will not divulge or release copies of any reports prepared in connection with the medical examination of licence aviation personnel to persons other than the applicant or Authority. Upon receipt of a court subpoena or order,

b) the AAME will notify the Authority.

c) A copy of the medical examination report may be released to the applicant upon request.

d) Other requests for pertinent medical information will be referred by the AAME to the medical assessor of the Authority.

22.3 **Procedures on how to handle breach of medical confidentiality**
Any breach of medical confidentiality either officials of the Authority or AAME shall be handle in line with the compliance and enforcement procedures of the Authority.

a) In the of any suspected breach of medical confidentiality the Authority will issue a letter of investigation to the concern official or AAME.

b) The concern official or AAME will be given seven (7) days to respond in defense of his/her action/inaction.

c) Failure to respond by the concern official or AAME the Authority will process the matter further without recurse to the submission of the concern official or AAME.

d) If the submission by the concern official or AAME is consider by the medical assessor not deliberate act, an administrative action will be carry out (letter of warning or correction is issued).

e) If the case of breach of medical confidentiality is establish by the medical assessor the legal advisor of the Authority will be notify with all relevant information pertaining the case.

f) The legal enforcement action will be carried out against the AAME while disciplinary action will be carried against the Authority personnel

g) The concern licenced aviation personnel (whose medical records were breach may choose to report to the Sierra Leone Medical and Dental Counsel or the court for further action against the AAME.

23.0 SUBMISSION AND RECEIPT OF MEDICAL EXAMINATION REPORTS BY AAME

(a) The Authorized Aviation Medical Examiner (AAME), after completing the medical examination for licenced aviation personnel will submit the signed report to the authority within five (5) working days in a clearly mark sealed envelope addressed to the Medical Assessor either in person a representative (e.g AAME staff) or by courier.

(b) Taking cognisance of the part time nature of the Medical Assessor and the time ATCO medical certifications or renewal will be due, the work plan of the Medical Assessor will be drawn to enable

him/her to be available (onsite) when medical examination are carried out to be

(c) Medical reports submitted to the Authority by the AAME's shall:

i Be received and stamped by the Authority, indicating the date they were received.

CHAPTER 2

APPLICATION FOR MEDICAL CERTIFICATION

1.0 APPLICATION FOR MEDICAL CERTIFICATION

This section contains guidance for completing Items 1–13 of FORM: O-MED 001

2.0 AAME GUIDANCE FOR POSITIVE IDENTIFICATION OF AIRMEN/ATCO

All applicants must show proof of age and identity. On occasion, individuals have attempted to be examined under a false name. The AAME in line with Nig.CARS Part 2.11.1.4 (e) should request evidence of positive identification which is a government-issued photo identification that contains the applicant's photograph, signature, residential address and date of birth. Example of government issued photo identifications are drivers' licence, national ID and Passport.

Verify that the address provided is the same as that given under Item 12. Make a copy of the identification and keep it on file for 3 years with the AAME work copy.

If an airman/ATCO fails to provide identification, the AAME will inform the applicant of the required means of identification.

3.0 GUIDANCE FOR THE APPLICANT IN THE COMPLETION OF MODEL FORM: O-MED 001

The applicant is to fill in Items 1–29 in his or her handwriting using a ballpoint pen, exerting sufficient pressure to make legible imprints upon duplicate copies of the form.

The applicant's identification number is not mandatory. Failure to provide an identification number is not grounds for refusal to issue a medical certificate. (See paragraph 2.4 of this guide.) All other items on the form must be completed.

Applicants are to be encouraged to provide their home address. Applicants may use a private mailing address (e.g., a P.O. Box number or a mail drop) if that is their preferred mailing address.

The applicant must personally enter all data and make all corrections on the form. The applicant should initial all corrections. The application constitutes a legal document and must be completed in the applicant's handwriting. If for any reason someone other than the applicant enters information in Items 1–29 (including any check marks), the person should initial beside that item, and the AAME should add a note in Item 49 on FORM: O-MED 004 to explain the applicant's inability to enter the data.

Any false declaration to the AAME by the applicant will be reported to the Authority for such action as it may deem appropriate.

4.0 CLASS OF MEDICAL CERTIFICATE APPLIED FOR (ITEM 2)

	NIGERIA CIVIL AVIATION AUTHORITY APPLICATION FORM FOR A MEDICAL CERTIFICATE	Reference	FORM O – MED 001
		Date:	

Complete this page fully using a black ball point and in block capitals – Refer to instructions' pages for detail **MEDICAL IN CONFIDENCE**

1. Application Initial ☐ Renewal/Revalidation ☐	2. Class of medical certificate applied for 1st ☐ 2nd ☐ 3rd ☐	
3. Surname:	4. Forename:	5. Previous Surname(s):

The applicant indicates which class of medical certificate he or she is applying for.
The class of medical certificate sought by the applicant is needed so that the appropriate medical standards may be applied. The class of certificate issued must correspond with that for which the applicant has applied.

The applicant may ask for a medical certificate of a higher class than needed for the type of flying or duties currently performed. For example, a student pilot may ask for a Class1 medical certificate to see if he or she qualifies medically before entry into an aviation career.

The AAME applies the standards appropriate to the class sought, not to the airman/ATCO's duties – either performed or anticipated.

5.0 IDENTIFICATION (ITEMS 3–17)

3. Surname:	4. Forename:		5. Previous Surname(s):
6. Place and country of birth:	7. Date of birth/Age:	8. Sex: Male ☐ Female ☐	9. Reference Number:
	10. Nationality		11. Type of licence desired
12. Permanent Address: Country Telephone No:	13. Postal Address (if different) Country Telephone No.:		14. Occupation (principal) 15. Employer 16. Last medical application Date: Place:
17. Aviation licence held (type):	Licence number	Country of issue:	18. Any conditions/Limitations Variations on the Licence/Medical Certificate No ☐ Yes ☐ Details: ☐

The following information is required for identification of the individual who is applying for medical certification:

(a) Name (Item 3-5). The applicant's last name, first name, and middle name (or initial, if appropriate) must be printed. All applicants without a middle name or initial should enter "NMN" or "NONE." Nicknames and abbreviated names must not be used.

(b) Nationality (Item 10). The applicant must indicate the country of his or her citizenship.

(d) Address (12 - 13). The applicant must print a permanent mailing address, including country and postal code. The person must also provide a current daytime telephone number with country and city codes included.

(e) Date of birth (Item 7). The applicant must enter the numbers for the day, month, and year of his or her birth in order (e.g., 31/01/1983 for 31 January 1983). Name and date of birth are the basic identifiers of airmen.

There is a maximum age requirement for certain air carrier pilots.

(f) Sex (Item 8). The applicant should enter either male or female.

(g) Types of licences you currently hold (Item 17). The applicant should write which types of licences he or she currently holds.

6.0 HAS YOUR AUTHORITY AIRMAN/ATCO MEDICAL CERTIFICATE EVER BEEN DENIED, SUSPENDED, OR REVOKED? (Item 19)

19. Have you ever had an aviation medical certificate denied, suspended, or revoked by any AAME? If Yes, discuss with AAME No ☐ Yes ☐ Date: Country Details:

The applicant shall check either the yes or the no box. If the yes box is checked, the applicant should enter the date of action and details.

The AAME may not issue a medical certificate to an applicant who has checked yes. The only exceptions to this prohibition are:

(a) The applicant presents written evidence from the Authority that he or she was subsequently medically certificated and that an AAME is authorised to issue a renewal medical certificate to the person if medically qualified, or

(b) The AAME obtains oral or written authorisation from the Authority to issue a medical certificate to the applicant.

7.0 TOTAL PILOT TIME; DATE OF LAST NCAA MEDICAL APPLICATION (ITEMS 16, 20 - 21)

16. Last medical application Date: Place:	
18. Any conditions/Limitations Variations on the Licence/Medical Certificate No ☐ Yes ☐ Details: ☐	
20. Total flight Time (hours)	21. Flight time (hours) Since last medical:

(a) Total pilot time (Item 20).

(1) To date. The applicant should indicate the total number of civilian flight hours.

(2) Past 6 months. The applicant should provide the number of civilian flight hours in the 6-month period immediately preceding the date of the application (item 21).

(a) Date of last NCAA application (Item 16). If a prior application was made, the applicant should indicate the date of his or her last application, even if it is only an estimate of the year. This item should be completed even if the application was made many years ago or the previous application did not result in the issuance of a medical certificate.

8.0 DO YOU CURRENTLY USE ANY MEDICATION? (ITEM 27)

27. Do you currently use any medication?

No ☐ Yes ☐ State drug, dose, date started and why

If the applicant checks yes, he or she must give the name of the medication(s) and indicate if the medication was listed in a previous medical examination. This includes both prescription and non-prescription medication. For example, any airman/ATCO/ATCO who is undergoing continuous treatment with anticoagulants, antiviral agents, anxiolytics, barbiturates, chemotherapeutic agents, experimental hypoglycaemic drugs, investigational drugs, mood-ameliorating drugs, motion sickness drugs, narcotics, sedating antihistamines, sedatives, steroid drugs, or tranquillisers must be deferred certification unless the treatment has previously been cleared by the Authority. In such an instance, the applicant should provide the AAME with a copy of any Authority correspondence that supports the clearance.

During periods in which the foregoing medications are being used for treatment of acute illnesses, the airman/ATCO is under obligation to refrain from exercising the privileges of his or her airman/ATCO medical certificate unless cleared by the Authority.

9.0 MEDICAL HISTORY (ITEM 29)

29. General & Medical History: Do you have, or have, or have ever had, any of the following? YES or NO (or as indicated) must be ticked after each question.
Elaborate Yes answers in the remarks section (30)

No	Yes	No		Yes	No		Yes	No	FAMILY HISTORY OF:	Yes	No
1. Eye trouble/eye operation			12. Nose, throat, or speech disorder			23. Malaria or other tropical diseases			33. Heart disease		
2. Spectacles &/or contact lenses ever worn			13. Head injury or concussion			24. A positive HIV test			34. High blood pressure		
3. Spectacles/contact lens prescription/change since last medical exam			14. Frequent or severe headaches			25. Sexually transmitted disease			35. High Cholesterol level		
4. Hay fever, other allergy			15. Dizziness or fainting spells			26. Admission to hospital			36. Epilepsy		
5. Asthma, lung disease			16. Unconsciousness for any reason			27. Any other illness or injury			37. Mental illness		
6. Heart or vascular			17. neurological disorders, Stroke, Epilepsy, seizure, paralysis etc.			28. Visit to medical practitioner since last medical examination			38. Diabetes		
7. High or low blood pressure			18. Psychological/psychiatric trouble of any sort			29. Refusal of life insurance			39. Tuberculosis		
8. Kidney stone or blood in urine			19. Alcohol/drug/substance abuse			30. Refusal of flying licence			40. Allergy/asthma/eczema		
9. Diabetes, hormone			20. Attempted suicide			31. Deafness/ear disorder			41. Inherited disorders		
10. Stomach, liver or intestinal trouble			21. Motion sickness requiring medication			32. medical rejection from or for military service			42. Glaucoma		
11. Anaemia/Sickle cell trait/other blood disorders			22. Award of pension or compensation for injury or illness			Females only Gynaecological, menstrual problems. Are you pregnant?			Last menstrual period		

Each item under this heading must be checked either yes or no. For all items checked yes, a description and approximate date of every condition the applicant has ever been diagnosed with, had, or presently has must be given in the Explanations block (item 30). If information has been reported on a previous application for airman/ATCO medical certification and there has been no change in the condition, the applicant may note "PREVIOUSLY REPORTED, NO CHANGE" in the Explanations block, but the applicant must still check yes to the condition.

Of particular importance are conditions that have developed since the last medical examination. If more space is needed, a plain sheet of paper bearing the applicant's full printed name, date of birth, signature, and the date should be used.

The AAME must take the time to review the applicant's responses on the form before starting the applicant's medical examination.

The AAME should ensure that the applicant has checked all of the boxes in Item 29 as either yes or no.
The AAME should use information obtained from this review in asking the applicant pertinent questions during the course of the examination. Certain aspects of the individual's history may need to be elaborated upon. The

AAME should provide an explanation of the nature of items checked yes in Items 29 (1 through 42). An additional sheet may be added if necessary.

Supplementary reports from the applicant's physician(s) should be obtained and forwarded to the Authority, when necessary, to clarify the significance of an item of history. The responsibility for providing such supplementary reports rests with the applicant.

Affirmative answers alone in Item 30, "Medical history," do not constitute a basis for denial of a medical certificate. A decision concerning issuance or denial should be made by applying the medical standards pertinent to the conditions uncovered by the history.
Experience has shown that, when asked direct questions by a physician, applicants are likely to be candid and willing to discuss medical problems.

The AAME should attempt to establish rapport with the applicant and to develop a complete medical history. Further, the AAME should be familiar with the Authority's certification policies and procedures in order to provide the applicant with sound advice.

(a) Frequent or severe headaches. If the applicant has experienced headaches, he or she should report their frequency; duration; characteristics; severity; neurologic manifestations; treatment; and side effects, if any. (see item 14).

(b) Dizziness or fainting spells. The applicant should describe the characteristics of any episode of dizziness or fainting (e.g., spinning or light-headedness), including the frequency of such episodes, factors leading up to and surrounding the episode, and associated neurologic symptoms (e.g., headache, nausea, loss of consciousness (LOC), or paraesthesia). Include diagnostic workup and treatment, if any. (see item 15).

(c) Unconsciousness for any reason. The applicant should describe the event(s) to determine the primary organ system responsible for the episode, witness statements, initial treatment, and evidence of recurrence or prior episode. Although the regulation states, "an unexplained disturbance of consciousness is disqualifying," it does not mean to imply that the applicant can be certificated if the aetiology is identified, because the aetiology may also be disqualifying in and of itself. (see item 6).

(d) Eye or vision trouble/eye operation except glasses). The AAME should personally explore the

applicant's history by asking questions concerning any changes in vision, unusual visual experiences (halos, scintillations, etc.), sensitivity to light, injuries, surgery, or current use of medication – for example, Does the applicant report inordinate difficulties with eye fatigue or strain? Is there a history of serious eye disease, such as glaucoma, or other diseases commonly associated with secondary eye changes, such as diabetes? For glaucoma, ocular hypertension or any eye medical condition this should be reported in FORM: O-MED 005. Under all circumstances, the AAME should ask the examining eye specialist to explain why the airman/ATCO is unable to correct to visual acuity of 6/6 or 6/9. (see item 1).

(e) Hay fever or allergy. The applicant should report the frequency and duration of symptoms and whether they have been incapacitating. The applicant should also report treatment and side effects. The AAME should inquire whether the applicant has ever experienced "ear block," barotitis, or any other symptoms that could interfere with aviation safety. Aero-sinusitis is of concern and should also be ruled out. (see item 4).

(f) Asthma or lung disease. The applicant should report the frequency and severity of asthma attacks, the medications taken, and the number of visits he or she made to the hospital and/or emergency room as the result of an attack. For other lung conditions, a detailed description of symptoms, diagnoses, surgical interventions, and medications should be provided. (see item 5).

(g) Heart or vascular trouble. The applicant should describe the condition, dates, symptoms, and treatments and provide medical reports to assist in the certification decision-making process. These reports should include operative reports of coronary intervention that include the original cardiac catheterization report, stress tests, worksheets, and original tracings (or legible copies). When stress tests are provided, the AAME should forward the reports, worksheets, and original tracings (or legible copies) to the Authority. For all classes of medical certificates, an established medical history or clinical diagnosis of myocardial infarction, angina pectoris, cardiac valve replacement, permanent cardiac pacemaker implantation, heart replacement, or coronary heart disease that has required treatment or, if untreated, that has been symptomatic or clinically significant is cause for denial. (see item 6).

(h) High or low blood pressure. The applicant should provide history and treatment. Issuance of a medical certificate to an applicant with high blood pressure may depend on the current blood pressure levels and whether the applicant is taking antihypertensive medication. The AAME should also determine if the applicant has a history of complications, adverse reactions to therapy, hospitalisation, etc). (see items 7 & 26).

(i) Stomach, liver, or intestinal trouble. The applicant should provide history and treatment, pertinent medical records, current status report, and medication. If a surgical procedure was done, the applicant must provide operative and pathology reports. (see item 11).

(j) Kidney stones or blood in urine. The applicant should provide history and treatment, pertinent medical records, current status report, and medication. If a procedure was done, the applicant must provide the report and pathology reports. (See Item 8).

(k) Diabetes. The applicant should describe the condition, including symptoms and treatment. The presence or absence of hyperglycaemic and/or hypoglycaemic episodes should be reported. A medical history or clinical diagnosis of diabetes mellitus requiring insulin or other hypoglycaemic drugs for control are disqualifying. The AAME can help expedite the Authority's review by assisting the applicant in gathering medical records and submitting a current specialty report. (see item 9).

(l) Neurological disorders, epilepsy, seizures, stroke, paralysis, etc. The applicant should provide history and treatment, pertinent medical records, and current status report and medication. The AAME should obtain details about the history and report the results. An established diagnosis of epilepsy, a transient loss of control of nervous system function(s), or a disturbance of consciousness is a basis for denial no matter how remote the history. Like all other conditions of aeromedical concern, the history surrounding

the event is crucial. Certification is possible if a satisfactory explanation can be established. (See Item 17.)

(m) Mental disorders of any sort – depression, anxiety, etc. An affirmative answer requires investigation through supplemental history taking. Dispositions will vary according to the details obtained. An applicant with an established history of a personality disorder that is severe enough to have repeatedly manifested itself by overt acts, a psychosis disorder, or a bipolar disorder must be denied or deferred by the AAME. (see item 18)

(n) Substance abuse or dependence; failed a drug test or used illegal substance(s). “Substance” includes alcohol and other drugs (e.g., PCP, sedatives and hypnotics, anxiolytics, marijuana, cocaine, opioids, amphetamines, hallucinogens, and other psychoactive drugs or chemicals). If an applicant gives a yes answer to this item, the AAME should obtain a detailed description of the history. A history of substance dependence or abuse is disqualifying. The AAME must defer issuance of a certificate if there is doubt concerning an applicant’s substance use. (See Item 19).

(o) Alcohol dependence or abuse; failed an alcohol test. Alcoholism is disqualifying.

(p) Suicide attempt. A history of suicidal attempts or suicidal gestures requires further evaluation. The ultimate decision of whether an applicant with such a history is eligible for medical certification rests with the Authority. The AAME should take a supplemental history as indicated; assist in the gathering of medical records related to the incident(s); and if the applicant agrees, assist in obtaining psychiatric and/or psychological examinations. (See Item 20.)

(q) Motion sickness medication required. A careful history concerning the nature of the sickness, its frequency, and the applicant’s need for medication is indicated when the applicant responds affirmatively to this item. Because motion sickness varies with the nature of the stimulus, it is most helpful to know if the problem has occurred in flight or under similar circumstances. (See Item 21.)

(r) Military medical discharge. If the person has received a military medical discharge, the AAME should take additional history and record it in the Explanations block. It is helpful to know the circumstances surrounding the discharge, including dates, and whether the individual is receiving disability compensation. If the applicant is receiving veteran’s disability benefits, the claim number and service number are helpful in obtaining copies of pertinent medical records. The fact that the applicant is receiving disability benefits does not necessarily mean that the application should be denied.

(s) Medical rejection by military service. The AAME should inquire about the place, cause, and date of rejection and enter the information in the Explanations block. It is of great assistance to the applicant and the Authority if the AAME can help obtain copies of military documents for attachment to the application form. If a delay of more than 14 calendar days is expected, the AAME should transmit the form to the Authority with a note specifying what documents will be forwarded later under separate cover. Disposition will depend upon whether the medical condition still exists or whether a history of such a condition requires denial or deferral under the State’s medical standards (see item 32).

(t) Rejection for life or health insurance. The AAME should inquire regarding the circumstances of rejection. The supplemental history should be recorded in the Explanations block. Disposition will depend upon whether the medical condition still exists or whether a history of such a condition requires denial or deferral under the State’s medical standards (see item 29).

(u) Admission to hospital. For each admission, the applicant should list the dates, diagnoses, duration of stay, treatment, name of the attending physician, and complete address of the hospital or clinic. If previously reported, the applicant may enter “PREVIOUSLY REPORTED, NO CHANGE.” A history of hospitalisation does not disqualify an applicant, although the medical condition that resulted in hospitalisation may. (see item 26).

10.0 THE AAME'S RESPONSIBILITY TO REVIEW THE APPLICATION

The AAME must ensure completeness and review all Items 1 through 30. A medical certificate must never be issued to an applicant who refuses to answer Item 19, Items 16 and 27, Item 29, or Item 29(26) or to an applicant who refuses to sign the form (Item 31). The date for Item 16 may be estimated if the applicant does not recall the actual date of the last examination.

CHAPTER 3

EXAMINATION TECHNIQUES AND CRITERIA FOR QUALIFICATION (FORM: O-MED 004 ITEMS 2–49)

The AAME must personally conduct the physical examination. This chapter provides guidance for completion of Items 2-35 **FORM: O-MED 004**
The AAME must carefully read the applicant's history page on the front page of the application form before conducting the physical examination and completing the Report of Medical Examination. This alerts the AAME to possible pathological findings.

The AAME must note in Item 49 of the **FORM: O-MED 004** any condition found in the course of the examination. The AAME must list the facts, such as dates, frequency, and severity of occurrence. When a question arises, the Authority encourages AAMEs first to check this Guide and other informational documents. If the question remains unresolved, the AAME should seek advice from the Authority.

1.0 HEIGHT AND WEIGHT (ITEMS 2-3)

(2) Height (cm)	(3) Weight (Kg)
Body Mass Index (BMI) =	

(a) **Height** (Item 2). Record the applicant's height in centimetres. Although there are no medical standards for height, exceptionally short individuals may not be able to effectively reach all flight controls and must fly specially modified aircraft. If required, the Authority will place operational limitations on the pilot certificate.

(b) **Weight** (Item 3). Record the applicant's weight in kilograms.

(c) **Body Mass Index (BMI)**
Formula for Calculation of BMI: weight (kg) / [height (m)]2 With the metric system, the formula for BMI is weight in kilograms divided by height in meters squared. Since height is commonly measured in centimeters, divide height in centimeters by 100 to obtain height in meters. Example: Weight = 68 kg, Height = 165 cm (1.65 m) Calculation: 68 ÷ (1.65)2 = 24.98.

BMI Ranges:

i. BMI Below 18.5 – Underweight

ii. BMI 18.5 – 24.9 – Normal

iii. BMI 25 – 30 – Overweight

iv. BMI 30 and above – Obesity

AAME and the Authority will carry out the following based om Airman/ATCO's BMI:

i. BMI Below 18.5 – AAME to advise airman/ATCO to gain weight and undergo a haemogram.

ii. BMI 18.5 – 24.9 – AAME to advise airman/ATCO to maintain the BMI through exercise and dieting

iii. BMI 25 – 30 – AAME to advise airman/ATCO to reduce weight and avoid further weight gain through exercise and dieting.

iv. BMI 30 – 32 - AAME to advise airman/ATCO to reduce weight and avoid further weight gain through exercise and dieting. Authority to monitor airman's weight/BMI at his or her next medical examination.

v. BMI 32 -35 - AAME to advise airman/ATCO to reduce weight and avoid further weight gain through exercise and dieting. Authority to monitor airman's weight/BMI at his or her next medical examination and send advisory letter to airman/ATCO to commence a weight reduction program.

vi. BMI Above 35 - AAME to advise airman/ATCO to reduce weight and avoid further weight gain through exercise and dieting. Authority to monitor airman's weight/BMI at his or her next medical examination and send advisory letter to airman/ATCO to commence a weight reduction program. AAME or Authority to require airman/ATCO to carry out a Cardiac Risk Assessment (CRA) to include the following investigations:

a. Stress Electrocardiogram

b. Fasting Lipid Profile

c. Fasting Blood Sugar (FBS) and

d. Serum Electrolytes, Urea and Creatinine estimation and

2.0 EAR, NOSE, AND THROAT (ENT) (ITEMS 9-11)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) All classes.

(1) No disease or condition of the middle or internal ear, nose, oral cavity, pharynx, or larynx that:

i Interferes with, or is aggravated by, flying or may reasonably be expected to do so,

or

ii Interferes with, or may reasonably be expected to interfere with, clear and effective speech communication.

(2) No disease or condition manifested by, or that may reasonably be expected to be manifested by, vertigo or a disturbance of equilibrium.

(b) Examination techniques.

(1) Head and neck. The head and neck should be examined to determine the presence of any significant defects such as:

i Bony defects of the skull

ii Gross deformities

iii Fistulas

iv Evidence of recent blows or trauma to the head

v Limited motion of the head and neck

vi Surgical scars

(2) Ears. The external ear is seldom a major problem in the medical certification of applicants. Otitis externa or a furuncle may call for temporary disqualification. Obstruction of the canal by impacted cerumen or cellular debris may indicate a need for referral to an ENT. specialist for examination.

(i) The tympanic membranes should be examined for scars or perforations. Discharge or granulation tissue may be the only observable indication of perforation. Middle ear disease may be revealed by retraction, fluid levels, or discolouration. The normal tympanic membrane is movable and pearly grey in colour. Mobility should be demonstrated by watching the drum through the otoscope during a valsalva manoeuvre.

(ii) Pathology of the middle ear may be demonstrated by changes in the appearance and mobility of the tympanic membrane. The applicant may only complain of stuffiness of the ears and/or loss of hearing. An upper respiratory infection greatly increases the risk of aerotitis media with pain, deafness, tinnitus, and vertigo due to lessened aeration of the middle ear from Eustachian tube dysfunction. There can be no permanent obstruction of the Eustachian tubes.

(iii) When the applicant is taking medication for an ENT condition, it is important that the AAME become fully aware of the underlying pathology, present status, and the length of time the medication has been used. If the condition is not a threat to aviation safety, the treatment consists solely of antibiotics, and the antibiotics have been taken over a sufficient period to rule out the likelihood of adverse side effects, the AAME may make the certification decision.

(iv) The same approach should be taken when considering the significance of prior surgery such as myringotomy, mastoidectomy, or tympanoplasty. Simple perforation without associated symptoms or pathology is not disqualifying. When in doubt, the AAME

should not hesitate to defer issuance and refer the matter to the Authority. The services of consultant ENT specialists will be available to the Authority to help in determining the safety implications of complicated conditions.

(3) Nose. The nose should be examined for the presence of polyps; blood; or signs of infection, allergy, or substance abuse. The AAME should determine if there is a history of epistaxis with exposure to high altitudes and if there is any indication of loss of sense of smell (anosmia). Polyps may cause airway obstruction or sinus blockage. Infection or allergy may be cause for obtaining additional history. Anosmia is at least noteworthy in that the airman/ATCO should be made fully aware of the significance of the handicap in flying (e.g., inability to receive early warning of gas spills, oil leaks, or smoke). Further evaluation may be warranted. There must be free nasal air entry on both sides. There must be neither serious malformation nor serious, acute, or chronic affection of the buccal cavity or upper respiratory tract.

(4) Sinuses. Evidence of sinus disease must be carefully evaluated by a specialist because of the risk of sudden and severe incapacitation from barotrauma.

(5) Mouth and throat. The mouth and throat should be examined to determine the presence of active disease that is progressive or may interfere with voice communications. Gross abnormalities that could interfere with the use of personal equipment such as oxygen equipment should be identified.

(6) Larynx. The larynx should be visualised if the applicant's voice is rough or husky. Acute laryngitis is temporarily disqualifying. Chronic laryngitis requires further diagnostic workup. Any applicant seeking certification for the first time with a functioning tracheostomy following laryngectomy or who uses an artificial voice-producing device should be denied or deferred and carefully assessed.

(c) Medical disposition. The following table lists the most common conditions of aeromedical significance and courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the tables that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Some conditions may have several possible causes or exhibit multiple symptomatologies. Episodic disorders of dizziness or disequilibrium require careful evaluation and consideration by the Authority. Transient processes, such as those associated with acute labyrinthitis or benign positional vertigo, may not disqualify an applicant when fully recovered. (Also see Item 47 for a discussion of syncope and vertigo.)

3.0 HEAD, FACE, NECK, AND SCALP (ITEM 8)

Disease/Condition	Class	Evaluation Data	Disposition
HEAD, FACE, NECK, AND SCALP			
Active fistula of neck, either congenital or acquired, Including tracheostomy	All	Submit all pertinent medical information and current status report	Unfit
Loss of bony substance involving the two tables of the cranial vault	All	Unfit	Unfit
Deformities of the face or head that would interfere with the proper fitting and wearing of an oxygen mask	1, 2	Submit all pertinent medical information and current status report	Unfit
	3	Submit all pertinent medical information	If deformity does not interfere with administration of supplemental O^2, issue certificate

Nose (Item 10)

Disease/Condition	Class	Evaluation Data	Disposition
NOSE			
Evidence of severe allergic rhinitis1	All	Submit all pertinent medical information and current status report	Unfit
Obstruction of sinus ostia, including polyps, that would be likely to result in complete obstruction	1, 2	Submit all pertinent medical information and current status report	Unfit

Sinuses (Item 10)

Disease/Condition	Class	Evaluation Data	Disposition
SINUSES – ACUTE OR CHRONIC			
Sinusitis, intermittent use of topical or non-sedating medication	All	Document medication, dose and absence of side effects	Responds to treatment without any side effects, issue certificate
Severe – requiring continuous use of medication or effected by barometric changes	All	Submit all pertinent medical information and current status report	Unfit
SINUS TUMOUR			
Benign – cysts/polyps	1, 2	If no physiologic effects, submit documentation	Asymptomatic, no observable

			growth over a 12-month period, no potential for sinus block, issue certificate
Malignant	1, 2	Submit all pertinent medical information and current status report	Unfit

Mouth and Throat (Item 9)

Disease/Condition	Class	Evaluation Data	Disposition
MOUTH AND THROAT			
Any malformation or condition, including speech defect and stuttering, that would impair voice communication	All	Submit all pertinent medical information and current status report	Responds to treatment without any side effects, issue certificate
Palate: extensive adhesion of the soft palate to the pharynx	All	Submit all pertinent medical information and current status report	Unfit

Ears, General (Item 11)

Disease/Condition	Class	Evaluation Data	Disposition
INNER EAR			
Acoustic neuroma	All	Submit all pertinent medical information and current status report	Unfit
Acute or chronic disease without disturbance of equilibrium and successful myringotomy, if applicable	All	Submit all pertinent medical information	If no physiological effects, issue certificate
Acute or chronic disease that may disturb equilibrium	All	Submit all pertinent medical information and current status report	Requires NCAA decision
Motion sickness	All	Submit all pertinent medical information and current status report	If occurred during flight training and resolved, issue certificate If condition requires medication, requires Authority decision
MASTOIDS			
Mastoid fistula	All	Submit all pertinent medical information and current status report	Unfit
Mastoiditis, acute or chronic	All	Submit all pertinent medical information and current status report.	Unfit

MIDDLE EAR			
No active pathological process, acute or chronic conditions	All		Unfit
Impaired aeration	All	Submit all pertinent medical information and current status report	Unfit
Otitis media	All	Submit all pertinent medical information and current status report	If acute and resolved, issue Certificate If active or chronic, unfit
OUTER EAR			
Impacted cerumen	1, 2	Submit all pertinent medical information and current status report	If asymptomatic and hearing is unaffected, issue certificate Otherwise, unfit
Otitis externa that may progress to impaired hearing or become incapacitating	All	Submit all pertinent medical information and current status report	Unfit

Ear Drums (Item 11)

Disease/Condition	Class	Evaluation Data	Disposition
EAR DRUMS			
Perforation that has associated pathology	All		Unfit
Perforation which has resolved without any other clinical symptoms	All	Submit all pertinent medical information	If no physiologic effects, issue certificate

(d) Otologic surgery. A history of otologic surgery is not necessarily disqualifying for medical certification.

The Authority evaluates each case on an individual basis following review of the otologist's report of surgery. The type of prosthesis used, the person's adaptability and progress following surgery, and the extent of hearing acuity attained are all major factors to be considered.

AAMEs should defer issuance to an applicant presenting a history of otologic surgery for the first time, sending the completed report of medical examination, with all available supplementary information, to the Authority. Some conditions may have several possible causes or exhibit multiple symptomatology. Episodic disorders of dizziness or disequilibrium require careful evaluation and consideration. Transient processes, such as those associated with acute labyrinthitis or benign positional vertigo, may not disqualify an applicant when fully recovered.

4.0 EYES (ITEMS 12 - 14)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) Examination techniques. For guidance regarding the conduction of visual acuity, field of vision, heterophoria, and colour vision tests, please refer to items 11 – 14 of FORM: O-MED 004 and FORM:O-MED 005.

The function of the eyes and their adnexa must be normal. There must be neither active pathological condition, acute or chronic, nor any sequelae of surgery or trauma of the eyes or their adnexa that is likely to reduce proper vision that would interfere with the safe exercise of the privileges of the applicant's licence and rating. The examination of the eyes should be directed towards the discovery of diseases or defects that may cause a failure in visual function while flying or discomfort sufficient to interfere with safely performing airman/ATCO's duties.

The AAME should personally explore the applicant's history by asking questions concerning any changes in vision, unusual visual experiences (halos, scintillations, etc.), sensitivity to light, injuries, surgery, or current use of medication. Does the applicant report inordinate difficulties with eye fatigue or strain? Is there a history of serious eye disease, such as glaucoma, or other disease commonly associated with secondary eye changes, such as diabetes?

(1) Screening. It is recommended that the AAME consider the following signs during the course of the eye examination:

(i) Colour. Look for redness or suffusion due to allergy, drug use, glaucoma, infection, or trauma; evidence of jaundice; ciliary flush of iritis; and the green or brown Kayser-Fleischer ring that indicates Wilson's disease

(ii) Swelling. Look for abscesses, evidence of allergy, cysts, exophthalmos, myxoedema, or tumours.

(iii) Other. Look for clarity, discharge, dryness, ptosis, proptosis, spasm (tic), tropion, or ulcers.

(2) Examinations to aid in the conduct of a comprehensive eye assessment. Routine use of a mydriatic is not recommended.

(i) Cornea. Observe for abrasions, calcium deposits, contact lenses, dystrophy, keratoconus, pterygium, scars, or ulceration. Contact lenses should be removed several hours before examination of the eye. (See Item 51, “Distant vision.”)

(ii) Pupil and iris. Check for the presence of synechiae and uveitis. Size, shape, and reaction to light should be evaluated during the ophthalmoscopic examination. Observe for coloboma, reaction to light, or disparity in size.

(iii) Aqueous. Look for hyphema or iridocyclitis.

(iv) Lens. Observe for aphakia, discolouration, dislocation, cataract, or an implanted lens.

(v) Vitreous. Note discolouration, hyaloid artery, floaters, or strands.

(vi) Optic nerve. Observe for atrophy, haemorrhage, cupping, or papilledema.

(vii) Retina and choroid. Examine for evidence of coloboma, choroiditis, detachment of the retina, diabetic retinopathy, retinitis, retinitis pigmentosa, retinal tumour, macular or other degeneration, toxoplasmosis, etc.

(3) Ocular motility. Motility may be assessed by having the applicant follow a point light source with both eyes, as the AAME moving the light into right and left upper and lower quadrants while observing the individual and the conjugate motions of each eye. The AAME then brings the light to centre front and advances it towards the nose observing for convergence. End point nystagmus is a physiologic nystagmus and is not considered to be significant. It need not be reported. (See Item 29, “Distant vision,” for further consideration of nystagmus.)

(4) Monocular vision. An applicant will be considered monocular when there is only one eye or when the best corrected distant visual acuity in the poorer eye is no better than 6/60. An individual with one eye, or effective visual acuity equivalent to monocular, may be considered for medical certification, any class, through the special issuance section of this guide.

In amblyopia exanopsia, the visual acuity loss is simply recorded On item 29, “Distant vision,” and visual standards are applied as usual. Although it has been repeatedly demonstrated that binocular vision is not a prerequisite for flying, some aspects of depth perception, either by stereopsis or by monocular cues, are necessary. It takes time for the monocular airman/ATCO to develop the techniques to interpret the monocular cues that substitute for stereopsis, such as the interposition of objects, convergence, geometrical perspective, distribution of light and shade, size of known objects, aerial perspective, and motion parallax.

In addition, it takes time for the monocular airman/ATCO to compensate for his or her decrease in effective visual field. A monocular airman/ATCO’s effective visual field is reduced by as much as 30 percent. This is especially important because of speed smear (i.e., the effect of speed diminishes the effective visual field such that normal visual field is decreased from 180 degrees to as narrow as 42 degrees or less as speed increases). A monocular airman/ATCO’s reduced effective visual field would be reduced even further than 42 degrees by speed smear. For the above reasons, a waiting period of 6 months is recommended to permit an adequate adjustment period for learning techniques to interpret monocular cues and accommodations to the reduction in the effective visual field.

Applicants who have had monovision secondary to refractive surgery may be certificated,

providing they have corrective vision available that would provide binocular vision in accordance with the vision standards, while exercising the privileges of the certificate. The certificate issued must have the appropriate vision limitations statement.

(5) Contact lenses. The use of a contact lens in one eye for distant visual acuity (monovision) and another in the other eye for near or intermediate visual acuity is not acceptable for aviation duties. Experience has indicated no significant risk to aviation safety in the use of contact lenses for distant vision correction. As a consequence, no special evaluation is routinely required before the use of contact lenses is authorised, and no SODA is required or issued to a contact lens wearer who meets the standards and has no complications.

Designer contact lenses that introduce colour (tinted lenses), restrict the field of vision, or significantly diminish transmitted light are not acceptable.

Bifocal contact lenses or contact lenses that correct for near and/or intermediate vision only are not considered acceptable for aviation duties.

Contact lens wearers must keep a pair of suitable correcting spectacles readily available during the exercise of the licence.

(6) Orthokeratology. Orthokeratology is acceptable for medical certification purposes, provided the airman/ATCO can demonstrate corrected visual acuity in accordance with medical standards defined in this guide. When corrective contact lenses are required to meet vision standards, the medical certificate must have the appropriate limitation annotated. Advise airmen that they must follow the prescribed or proper use of orthokeratology lenses to ensure compliance with this guide. Airmen should consider possible rotation, changes, or extensions of their work schedules when deciding on orthokeratology retainer lens use.

(7) Glaucoma. The AAME should deny or defer issuance of a medical certificate to an applicant if there is a loss of visual fields, a significant change in visual acuity, a diagnosis of or treatment for glaucoma, or newly diagnosed intraocular hypertension. The Authority may grant an Authorisation under the special issuance section of this guide on an individual basis. The AAME can facilitate Authority review by obtaining a detailed medical report a treating or evaluating ophthalmologist. Because secondary glaucoma is caused by known pathology, such as uveitis or trauma, eligibility must largely depend upon that pathology. Secondary glaucoma is often unilateral, and if the cause or disease process is no longer active and the other eye remains normal, certification is likely.

Applicants with primary or secondary narrow angle glaucoma are usually denied because of the risk of an attack of angle closure that might result in such incapacitating symptoms as severe pain, nausea, transitory loss of accommodative power, blurred vision, halos, epiphora, or iridoparesis. Central venous occlusion can occur with catastrophic loss of vision. However, when surgery such as iridectomy or iridencleisis has been performed satisfactorily more than 3 months before the application, the likelihood of difficulties is considerably more remote, and applicants in that situation may be favourably considered by the Authority.

An applicant with unilateral or bilateral open angle glaucoma may be certified by the Authority (with follow-up required) when a current ophthalmological report substantiates that pressures

are under adequate control, there is little or no visual field loss or other complications, and the person tolerates small to moderate doses of allowable medications.

Individuals who have had filter surgery for their glaucoma, or combined glaucoma/cataract

surgery, can be considered when stable and without complications. A few applicants have been certified following their demonstration of adequate control with oral medication. Neither miotics nor mydriatics are necessarily medically disqualifying.

However, miotics such as pilocarpine cause pupillary constriction and could conceivably interfere with night vision. If considerable disturbance in night vision is documented, the Authority may limit the medical certificate: “Not Valid for Night Flying.”

(8) Sunglasses. Sunglasses are not acceptable as the only means of correction to meet visual standards, but they may be used for backup purposes if they provide the necessary correction. Airmen should be encouraged to use sunglasses in bright daylight but must be cautioned that, under conditions of low illumination, they may compromise vision. Mention should be made that sunglasses do not protect the eyes from the effects of ultraviolet radiation without special glass or coatings and that photosensitive lenses are unsuitable for aviation purposes because they respond to changes in light intensity too slowly. The so called blue blockers may not be suitable since they block the blue light used in many current panel displays. Polarised sunglasses are unacceptable if the windscreen is also polarised.

(9) Refractive surgery. An applicant who has been treated with refractive surgery may be issued a medical certificate by the AAME if he or she meets the visual acuity standards and detailed Ophthalmologist report indicates that healing is complete, visual acuity remains stable, and the applicant does not suffer sequela such as glare intolerance, halos, rings, impaired night vision, or any other complications. There should be no other pathology of the affected eye(s). This state of recovery is usually reached within 6–12 weeks after surgery. The AAME may, of course, defer issuance and forward the ophthalmology report to the Authority.

(i) Refractive procedures include:

a. Radial keratotomy (RK)

b. Epikeratophakia

c. Laser-assisted in situ keratomileusis (LASIK), including wavefront-guided LASIK

d. Photorefractive keratectomy (PRK)

e. Conductive keratoplasty (CK)

(ii) Refractive procedures have potential adverse effects that could be incompatible with flying duties, including corneal scarring or opacities, worsening or variability of vision, and night-glare. Medical certificate holders should not resume their airman/ATCO duties until their treating health care professional determines that their postoperative vision has stabilized and that there are no significant adverse effects or complications. When this determination is made, the treating health care professional should document it in the medical certificate holder’s health care record, a copy of which should be forwarded to the Authority before resumption of airman/ATCO’s duties. If the health care professional’s determination is favourable and after consultation and review by an AAME, the applicant may resume airman/ATCO duties. If the procedure was done 2 years ago or longer, the NCAA may accept the AAME’s eye evaluation and an applicant or medical certificate hold statement regarding the absence of adverse sequelae.

(iii) CK is used for correction of farsightedness. As this procedure is not considered

permanent and there is expected regression of visual acuity in time, the NCAA may grant an Authorisation for special issuance of a medical certificate to an applicant who has had CK. The NCAA evaluates CK procedures on an individual basis following a waiting period of 6 months. The waiting period is required to permit adequate adjustment period for fluctuating visual acuity. The AAME can facilitate a NCAA review by obtaining all pre- and post-operative medical records and detailed report from a treating or evaluating eye specialist with comments regarding any adverse effects or complications related to the procedure.

(b) **Medical disposition**. Applicants with many visual conditions may be found qualified for Authority certification following the receipt and review of specialty evaluations and pertinent medical records. Examples include retinal detachment with surgical correction, open angle glaucoma under adequate control with medication, and narrow angle glaucoma following surgical correction. The AAME may not issue a certificate under such circumstances for the initial application, except in the case of applicants following cataract surgery. The AAME may issue a certificate after cataract surgery for applicants who have undergone cataract surgery with or without lens implants. If pertinent medical records and a current ophthalmologic evaluation indicate that the applicant meets the standards, the Authority may delegate authority to the AAME to issue subsequent certificates.

The following tables list the most common conditions of aeromedical significance and the courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Eyes, General (Item 11)

Disease/Condition	Class	Evaluation Data	Disposition
EYES, GENERAL			
Amblyopia2	All	Provide completed Model Form O-MED 005 *Note: applicant should be at best corrected visual acuity before evaluation*	If applicant does not correct to standards request a medical flight test
Congenital or acquired conditions (whether acute or chronic) of either eye or adnexa, that may interfere with visual functions, may progress to that degree, or may be aggravated by flying (tumours and ptosis obscuring the pupil, acute inflammatory disease of the eyes and lids, cataracts, or keratoconus)	All	Provide completed Model Form O-MED 005 Submit all pertinent medical information and current status report For keratoconus, include if available results of imaging studies such as ketatometry, videoderatography, etc., with clinical correlation. *Note: applicant should be at best corrected visual acuity before evaluation*	Requires Authority decision
Any ophthalmic pathology reflecting a serious systemic disease (e.g., diabetic and	All	Submit all pertinent medical information and current status report.	Requires Authority decision

hypertensive retinopathy)			
Diplopia	All	If applicant provides written evidence that the Authority has previously considered and determined that thiscondition is not adverse toflight safety, a medical flight test may be requested.	Requires Authority decision
Hereditary, acquired conditions or congenital	All	Provide completed Model Form O-MED 005 *Note: applicant should be at best corrected visual acuity before evaluation*	Unfit
Pterygium	All	Document findings	If less than 50 percent of the cornea and not effecting central vision, issue certificate Otherwise, unfit
EYES, PROCEDURES			
Aphakia/lens implants	All	Submit all pertinent medical information and current status report (see additional disease dependent requirements)	If visual acuity meets standards, issue certificate Otherwise, unfit
Intraocular devices	All		
Refractive surgery, other than CK	All	Provide completed Model Form O-MED 005, type and date of procedure, statement as to any complications (halo, glare, haze, rings, etc.)	If visual acuity meets standards, is stable, and no complications exist, issue certificate Otherwise, unfit
Conductive keratoplasty – farsightedness (CK)	All	Provide completed Model Form MD-L06	

Ophthalmoscopic (Item 12)

Disease/Condition	Class	Evaluation Data	Disposition
OPHTHALMOSCOPIC			
Chorioretinitis, coloboma, corneal ulcer or dystrophy, optic atrophy or neuritis, retinal degeneration or detachment, retinitis pigmentosa, papilledema, or uveitis	All	Submit all pertinent medical information and current status report	Unfit
Glaucoma (treated or untreated)	All	Submit all pertinent medical information and current status report	Unfit
Macular degeneration, macular detachment	All	Submit all pertinent medical information and current status	Unfit

		report	
Tumours	All	Submit all pertinent medical information and current status report	Unfit
Vascular occlusion, retinopathy	All	Submit all pertinent medical information and current status report	Unfit

Pupils (Item 13)

Disease/Condition	Class	Evaluation Data	Disposition
PUPILS			
Disparity in size or reaction to light (afferent pupillary defect) requires clarification and/or further evaluation	All	Submit all pertinent medical information and current status report	Unfit
Nonreaction to light in either eye acute or chronic	All	Submit all pertinent medical information and current status report	Unfit
Nystagmus	All	Submit all pertinent medical information and current status report	Unfit
Synechiae, anterior or posterior	All	Submit all pertinent medical information and current status report	Unfit

Ocular Motility (Item 14)

Disease/Condition	Class	Evaluation Data	Disposition
OCULAR MOTILITY			
Absence of conjugate alignment in any quadrant	All	Submit all pertinent medical information and current status report	Requires Authority decision
Inability to converge on a near object	All	Submit all pertinent medical information and current status report	Unfit
Paralysis with loss of ocular motion in any direction	All	Submit all pertinent medical information and current status report	Unfit

5.0 LUNGS AND CHEST (ITEM 15)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) Examination techniques.

(1) Breast examination. The breast examination is performed only at the applicant's discretion or if indicated by specific history or physical findings. If a breast examination is performed, the results are to be recorded in item 28 of the Medical Examination Report (Form: O-MED 004) The applicant should be advised of any abnormality that is detected and then deferred for further evaluation.

(b) Medical dispositions. The following is a table that lists the most common conditions of aeromedical significance and the courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO's medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
ALLERGIES			
Allergies, severe	All	Submit all pertinent medical information and current status report, include duration of symptoms, name and dosage of drugs and side effects	Requires Authority decision
Hay fever controlled solely by desensitization without antihistamines or other medications	All	Submit all pertinent medical information and current status report, include duration of symptoms, name and dosage of drugs and side effects	If responds to treatment and without side effects, issue certificate Otherwise, unfit
ASTHMA			
Mild or seasonal asthmatic symptoms8	All	Review all pertinent medical information and current status report, include pulmonary function tests, duration of	If attacks are infrequent and no symptoms in flight, issue certificate

		symptoms, name and dosage of drugs, and side effects	
Frequent severe asthmatic symptoms	All	Submit all pertinent medical information and current status report, include pulmonary function test PFTs, duration of symptoms, name and dosage of drugs and side effects	Unfit
CHRONIC OBSTRUCTIVE PULMONARY DISEASE (COPD)			
Chronic bronchitis, emphysema, or COPD	All	Submit all pertinent medical information and current status report; include an FVC/FEV1 ratio	Unfit
INFECTIOUS DISEASE OF THE LUNGS, PLEURA, OR MEDIASTINUM			
Abscesses, active mycotic disease, active tuberculosis	All	Submit all pertinent medical information and current status report	Unfit
Fistula, bronchopleural, to include thoracostomy	All	Submit all pertinent medical information and current status report	Unfit
Lobectomy	All	Submit all pertinent medical information and current status report, including PFT	Requires Authority decision
Pulmonary fibrosis	All	Submit all pertinent medical information, current status report, including PFTs with diffusion capacity	If more than 75 percent predicted and no impairment, issue certificate. Otherwise, requires Authority decision
SLEEP APNOEA			
Obstructive sleep apnoea	All	Requires risk evaluation	Unfit
Periodic limb movement, etc.	All	Submit all pertinent medical information and current status report, including a sleep study with a polysomnogram, use of medications and titration study results, and a statement regarding restless leg syndrome	Requires Authority decision
PLEURA AND PLEURAL CAVITY			
Acute fibrinous pleurisy, empyema, pleurisy with effusion, or pneumonectomy	All	Submit all pertinent medical information and current status report, and PFTs	Unfit
Malignant tumours or cysts of the lung, pleura, mediastinum, or the breast	All	Submit all pertinent medical information and current status report	Unfit

Other diseases or defects of the lungs or chest wall that require use of medication or that could adversely affect flying or endanger the applicant's well-being if permitted to fly	All	Submit all pertinent medical information and current status report	Unfit
Pneumothorax – traumatic	All	Submit all pertinent medical information and current status report	If 3 months after resolution, issue certificate
Sarcoid, if more than minimal involvement or if symptomatic	All	Submit all pertinent medical information and current status report	Unfit
Spontaneous pneumothorax10	All	Submit all pertinent medical information and current status report	Unfit
PULMONARY			
Bronchiectasis	All	Submit all pertinent medical information and current status report	If moderate to severe, unfit

6.0 HEART (ITEM 16)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) Examination techniques.

(1) **General physical examination.**

(i) A brief description of any comment-worthy personal characteristics as well as height, weight, representative blood pressure readings in both arms, funduscopic examination, condition of peripheral arteries, carotid artery auscultation, heart size, heart rate, heart rhythm, description of murmurs (location, intensity, timing, and opinion as to significance), and other findings of consequence must be provided.

(ii) The AAME should keep in mind some of the special cardiopulmonary demands of flight, such as changes in heart rates at take-off and landing. High G-forces of aerobatics or agricultural flying may stress both systems considerably. are often insidious and may produce subtle performance decrements that may require special investigative techniques Degenerative changes.

A. **Inspection.** Observe and report any thoracic deformity (e.g., pectus excavatum), signs of surgery or other trauma, and clues to ventricular hypertrophy. Check the hematopoietic and vascular system by observing for pallor, oedema, varicosities, stasis ulcers, and venous distention.
Check the nail beds for capillary pulsation and colour.

B. **Palpation.** Check for thrills and the vascular system for arteriosclerotic changes, shunts, or arterio-venous anastomoses. The pulses should be examined to determine their character, to note if they are diminished or absent, and to observe for synchronicity. The medical standards do not specify pulse rates that, per se, are disqualifying for medical certification.

These tests are used, however, to determine the status and responsiveness of the cardiovascular system. Abnormal pulse rates may be reason to conduct additional cardiovascular system evaluations.

✓ Bradycardia of less than 50 beats per minute, any episode of tachycardia during the course of the examination, and any other irregularities of pulse other

than an occasional ectopic beat or sinus arrhythmia must be noted and reported. If there is bradycardia, tachycardia, or arrhythmia, further evaluation may be warranted and deferral may be indicated.

✓ A cardiac evaluation may be needed to determine the applicant's qualifications. Temporary stresses or fever may, at times, result in abnormal results from these tests. If the AAME believes this to be the case, the applicant should be given a few days to recover and then be retested. If this is not possible, the AAME should defer issuance, pending further evaluation.

C. **Percussion.** Determine heart size, diaphragmatic elevation/excursion, abnormal densities in the pulmonary fields, and mediastinal shift.

D. **Auscultation.** Check for resonance, asthmatic wheezing, rhonchi, rales, cavernous breathing of emphysema, pulmonary or pericardial friction rubs, quality of the heart sounds, murmurs, heart rate, and rhythm. If a murmur is discovered during the course of conducting a routine Authority examination, report its character, loudness, timing, transmission, and change with respiration. It should be noted whether it is functional or organic and if a special examination is needed. If the latter is indicated, the AAME should defer issuance of the medical certificate and transmit the completed Model Forms FORM: O-MED 001 and FORM: O-MED 004 to the Authority for further consideration. Listen to the neck for bruits.

It is recommended that the AAME conduct the auscultation of the heart with the applicant both in a sitting and in a recumbent position. Aside from murmur, irregular rhythm, and enlargement, the AAME should be careful to observe for specific signs that are pathognomonic for specific disease entities or for serious generalised heart disease.

Examples of such evidence are:

i. The opening snap at the apex or fourth left intercostal space signifying mitral stenosis;

ii. Gallop rhythm indicating serious impairment of cardiac function; and

iii. The middiastolic rumble of mitral stenosis.

(2) **When general examinations reveal heart problems.** These specifications have been developed by the Authority to determine an applicant's eligibility for airman/ATCO medical certification. Standardisation of examination methods and reporting is essential to provide sufficient basis for making determinations and the prompt processing of applications. This cardiovascular evaluation, therefore, must be reported in sufficient detail to permit a clear and objective evaluation of the cardiovascular disorder(s) with emphasis on the degree of functional recovery and prognosis. It should be forwarded to the Authority immediately upon completion. Inadequate evaluation, reporting, or failure to promptly submit the report to the Authority may delay the certification decision.

(i) Medical history. Particular reference should be given to cardiovascular abnormalities – cerebral, visceral, and/or peripheral. A statement must be included as to whether medications are currently or have been recently used, and if so, the type, purpose, dosage, duration of use, and other pertinent details must be provided. A specific history of any anticoagulant drug therapy is required. In addition, any history of hypertension must be fully developed and if thiazide diuretics are being taken, values for serum potassium should be reported, as well as any important or unusual dietary programs.

(ii) Family, personal, and social history. A statement of the ages and health status of parents and siblings is required; if deceased, cause and age at death should be included. Also, any indication of whether any near blood relative has had a "heart attack," hypertension, diabetes, or known disorder of lipid metabolism must be provided. Smoking, drinking, and recreational habits of the applicant are pertinent as well as whether a program of physical fitness is being maintained. Comments on the level of physical activities, functional limitations, occupational, and avocational pursuits are essential.

(iii) Records of previous medical care. If not previously furnished to the Authority, a copy of pertinent hospital records as well as out-patient treatment records with clinical data, x ray, laboratory observations, and originals or copies of all electrocardiographic (ECG) tracings should be provided. Detailed reports of surgical procedures as well as cerebral and coronary arteriography and other major diagnostic studies are of prime importance.

(iv) Surgery. The presence of an aneurysm or obstruction of a major vessel of the body is disqualifying for medical certification of any class. Following successful surgical intervention and correction, the applicant may ask for Authority consideration. The Authority recommends that the applicant recover for at least 3 months for air traffic controllers and 6 months for airmen.

A history of coronary artery bypass surgery is disqualifying for certification. Such surgery does not negate a past history of coronary heart disease. The presence of permanent cardiac pacemakers and artificial heart valves is also disqualifying for certification.

The Authority will consider an Authorisation for a Special Issuance of a Medical

Certificate (Authorisation) for most cardiac conditions. Applicants seeking further Authority consideration should be prepared to submit all past records and a report of a complete current cardiovascular evaluation in accordance with Authority specifications.

(3) **Medication**

(i) Medications acceptable to the Authority for treatment of hypertension in applicants include all – approved diuretics, alphaadrenergic, blocking agents, beta-adrenergic blocking agents, calcium channel blocking agents, angiotension converting enzyme (ACE inhibitors) agents, and direct vasodilators. Centrally acting agents (such as reserpine, guanethidine, guanadrel, guanabenz, and methyldopa) are usually not acceptable to the Authority. Dosage levels should be the minimum necessary to obtain optimal clinical control and should not be modified to influence the certification decision.

(ii) The AAME may submit for the Authority's review requests for Authorisation under the special issuance section of this guide in cases in which these or other usually unacceptable medications are used. Specialty evaluations are required in such cases and must provide information on why the specific drug is required. The AAME's own recommendation should be included. The AAME must defer issuance of a medical certificate to any applicant whose hypertension is being treated with unacceptable medications. The use of nitrates for the treatment for coronary artery disease or to modify hemodynamics is unacceptable.

(iii) The use of flecainide is unacceptable when there is evidence of left ventricular dysfunction or recent myocardial infarction.

(b) **Medical disposition.** The following is a table that lists the most common conditions of aeromedical significance and the courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
ARRHYTHMIAS			
Bradycardia (less than 50 bpm)	All	Document history and findings and submit any tests deemed appropriate	If no evidence of structural, functional, or coronary heart disease, issue certificate Otherwise, requires Authority decision
Left bundle branch block	All	Radionuclide graded exercise test (GXT) scan	If no evidence of structural, functional, or coronary heart disease, issue certificate Otherwise, requires Authority decision
Acquired right bundle branch block	All		Requires Authority decision
History of implanted pacemakers	All	Requires evaluation (e.g., check for mitral valve prolapse (MVP), caffeine,	If no evidence of structural, functional, or coronary heart disease, issue certificate

		pulmonary disease, thyroid, etc.)	Otherwise, requires Authority decision
Premature arterial contractions (PAC) (two or more on electrocardiogram (ECG)	All	Max GXT – to include a baseline ECG	If no evidence of structural, functional, or coronary heart disease and PVCs resolve with exercise, issue certificate. Otherwise, requires Authority decision
Premature ventricular contractions (PVCs) (two or more on standard ECG)	All	Document history and findings and submit any tests deemed appropriate	If no evidence of structural, functional, or coronary heart disease, issue certificate Otherwise, unfit
1st degree atrioventricular (AV) block	All	Document history and findings and submit any tests deemed appropriate	If no evidence of structural, functional, or coronary heart disease, issue certificate Otherwise, unfit
2nd degree AV block Mobitz II	All	24-hour Holter	Unfit
3rd degree AV block	All	24-hour Holter	Unfit
Pre-excitation	All	GXT and 24-hour Holter	Unfit
Radio frequency ablation	All	3-month wait, then 24-hour Holter	If Holter negative for arrhythmia, no recurrence, issue certificate Otherwise, unfit
Supraventricular tachycardia	All	ECHO and 24-hour Holter	Unfit
Atrial Fibrillation			
Atrial fibrillation: Chronis Paroxysmal/Lone	All	EST, ECHO, and 24-hour Holter.	Unfit
History of atrial fibrillation more than 5 years ago	All	Document previous workup for CAD and structural heart disease	If no ischemia, no history of emboli, no structural or functional heart disease, issue certificate Otherwise, unfit

Note: Syncope not satisfactorily explained or recurrent requires deferral (even though the syncope episode may be medically explained, an aeromedical certification decision may still be precluded). Syncope may involve cardiovascular, neurological, and psychiatric factors.

Disease/Condition	Class	Evaluation Data	Disposition
CORONARY HEART DISEASE			
Angina pectoris	All		Issue
Myocardial infarction	1, 2		Unfit
Myocardial infarction	3	Satisfactory recovery reported by accredited medical conclusion	
Atherectomy, coronary bypass grafting, myocardial infarction, angioplasty;	All		Unfit

rotoblation, or stent insertion			
HYPERTENSION			
Hypertension requiring medication	All	Medications are compatible with the safe exercise of the applicant's licence and ratings	If controlled and no complications, issue certificate Otherwise, unfit
VALVULAR DISEASE			
All other valvular disease	All		Unfit
Aortic and mitral insufficiency	All		Unfit
Valve replacement	All		Unfit
Valvuloplasty	All		Unfit

(c) **Other cardiac conditions.**

(1) The following conditions must be deferred:

(i) Heart transplant. At the present time, due to the unpredictability of segmental coronary artery disease, certification is not being granted.

(ii) Cardiac decompensation.

(iii) Congenital heart disease accompanied by cardiac enlargement, ECG abnormality, or evidence of inadequate oxygenation.

(iv) Hypertrophy or dilatation of the heart as evidenced by clinical examination and supported by diagnostic studies.

(v) Pericarditis, endocarditis, or myocarditis.

(vi) When cardiac enlargement or other evidence of cardiovascular abnormality is found, the decision is deferred to Authority. If the applicant wishes further consideration, a consultation will be required "preferably" from the applicant's treating physician. It must include a narrative report of evaluation and be accompanied by an ECG with report and appropriate laboratory test results which may include, as appropriate, 24-hour Holter monitoring, thyroid function studies, ECHO, and an assessment of coronary artery status. The report and accompanying materials should be forwarded to the Authority.

(vii) Anti-tachycardia devices or implantable defibrillators.

(viii) With the possible exceptions of aspirin and dipyridamole taken for their effect on blood platelets, the use of anticoagulants or other drugs for treatment or prophylaxis of fibrillation may preclude medical certification.

(ix) A history of cardioversion or drug treatment, per se, does not rule out certification. A current, complete cardiovascular evaluation will be required. A 3-month observation period must elapse after the procedure before consideration for certification.

(x) Any other cardiac disorder not otherwise covered in this section.

(2) For all classes, certification decisions will be based on the applicant's medical history and current clinical findings. Certification is unlikely unless the information is highly favourable to

the applicant. Evidence of extensive multi-vessel disease, impaired cardiac functioning, precarious coronary circulation, etc., will preclude certification. Before an applicant undergoes coronary angiography, it is recommended that all records and the report of a current cardiovascular evaluation, including a maximal electrocardiographic exercise stress test, be submitted to the Authority for preliminary review. Based upon this information, it may be possible to advise an applicant of the likelihood of favourable consideration.

(3) A history of low blood pressure requires elaboration. If the AAME is in doubt, it is usually better to defer issuance rather than to deny certification for such a history.

7.0 VASCULAR SYSTEM (ITEM 17)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) Examination techniques.

(1) Inspection. Observe and report any thoracic deformity (e.g., pectus excavatum), signs of surgery or other trauma, and clues to ventricular hypertrophy. Check the hematopoietic and vascular system by observing for pallor, oedema, varicosities, stasis ulcers, venous distention, nail beds for capillary pulsation, and colour.

(2) Palpation. Check for thrills and the vascular system for arteriosclerotic changes, shunts, or AV anastomoses. The pulses should be examined to determine their character, to note if they are diminished or absent and to observe for synchronicity.

(3) Percussion. N/A.

(4) Auscultation. Check for bruits and thrills.

(b) **Medical disposition**. The following is a table that lists the most common conditions of aeromedical significance, and course of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority.

Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
VASCULAR CONDITIONS			
Aneurysm (abdominal or thoracic)	All	Submit all available medical documentation	Unfit
Aneurysm (status post repair)	All	Submit all documentation and include a GXT	Requires Authority decision
Arteriosclerotic vascular disease with evidence of circulatory obstruction	All	Submit all documentation and include a GXT	Unfit
Buerger's disease	All	Document history and findings	If no impairment and no symptoms in flight, issue certificate Otherwise, unfit
Peripheral oedema		The underlying medical condition must not be disqualifying	If findings can be explained by normal physiologic response or secondary to medication(s), issue certificate Otherwise, unfit
Raynaud's disease	All	Document history and findings	If no impairment, issue certificate Otherwise, unfit
Phlebothrombosis or thrombophlebitis	All		
		Document history and Findings. Document history and findings	A single episode resolved, not currently treated with anticoagulants, and a negative evaluation, issue certificate If history of multiple episodes, unfit

8.0 ABDOMEN AND VISCERA (ITEM 18)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

Note: The digital rectal examination is performed only at the applicant's discretion or if indicated by specific history or physical findings. If a digital examination is performed, the results are to be recorded in item 28 of the Medical Examination Report (Form: O-MED 004)

(a) Examination techniques.

(1) **Observation**. The AAME should note any unusual shape or contour, skin colour, moisture, temperature, and presence of scars. Hernias, haemorrhoids, and fissure should be noted and recorded. A history of acute gastrointestinal disorders is usually not disqualifying once recovery is achieved (e.g., acute appendicitis). Many chronic gastrointestinal diseases may preclude issuance of a medical certificate (e.g., cirrhosis, chronic hepatitis, malignancy, ulcerative colitis). Colostomy following surgery for cancer may be allowed by the Authority with special follow-up reports. The AAME should not issue a medical certificate if the applicant has a recent history of bleeding ulcers or haemorrhagic colitis. Otherwise, ulcers must not have been active within the past 3 months. In the case of a history of bowel obstruction, a report on the cause and present status of the condition must be obtained from the treating physician.

(2) **Palpation**. The AAME should check for and note enlargement of organs, unexplained masses, tenderness, guarding, and rigidity.

(3) **Medical disposition**. The following is a table that lists the most common conditions of aeromedical significance and the courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or

for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted.

Disease/Condition	Class	Evaluation Data	Disposition
ABDOMEN AND VISCERA AND ANUS CONDITIONS			
Cholelithiasis	All	Document history and findings	If asymptomatic, issue certificate Otherwise, unfit
Cirrhosis (alcoholic)	All	See Substance Abuse/Dependence Disposition in Item 48	Unfit
Cirrhosis (non-alcoholic)	All	Submit all pertinent medical records, current status report, to include history of encephalopathy, PT/PTT, albumin, liver enzymes, bilirubin, CBC, and other testing deemed necessary	Unfit
Hepatitis	All	Submit all pertinent medical records, current status report to include any other testing deemed necessary	If disease is resolved without sequelae, issue certificate Otherwise, unfit
Hepatitis C		Submit all pertinent medical information and current status report, including duration of symptoms, name and dosage of drugs and side effects	Unfit
Severe and moderate enlargement of the spleen persistently below the costal margin	All	Submit all pertinent medical information and current status report.	Unfit
Inguinal, ventral, or hiatal hernia	All	Document history and findings	If symptomatic or likely to cause any degree of obstruction, unfit Otherwise, issue certificate
Liver transplant	All	Submit all pertinent medical information and current status report, include duration of symptoms, name and dosage of drugs and side effects.	Unfit
Splenomegaly	All	Provide hematologic workup	Unfit
Disease or surgical intervention of any part of the digestive tract or its adnexae, particularly any obstructions due to structure or compression	All		If likely to cause incapacity in flight, unfit
Major surgery on the biliary passages or the digestive tract or its adnexae, which involved a total or partial excision or diversion of any of these organs	All	Provide details of the operation.	Unfit until the Authority considers that the effects of the operation are not likely to cause incapacity in the air
MALIGNANCIES			
Colitis (ulcerative, regional enteritis, or Crohn's disease)	All	Submit all pertinent medical information and current status report, include duration of symptoms, name and dosage of drugs	Unfit

		and side effects	
Colon/rectal cancer	All	Submit all pertinent medical records, operative/pathology reports, current oncological status report; and current CEA and CBC	Unfit
Other malignancies	All	Submit all pertinent medical records, operative/pathology reports, current oncological status report, including tumour markers, and any other testing deemed necessary	Unfit
Peptic ulcer	All		Unfit

An applicant with an ileostomy or colostomy may also receive Authority consideration. A report is necessary to confirm that the applicant has fully recovered from the surgery and is completely asymptomatic.

In the case of a history of bowel obstruction, a report on the cause and present status of the condition must be obtained from the treating physician.

9.0 ANUS (ITEM 19)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) Examination techniques.

(1) A digital rectal examination is performed only at the applicant's discretion unless indicated by specific history or physical findings. When performed, the following should be noted and recorded in item 28 of the Medical Examination Report (FORM: O-MED 004).

(2) If the digital rectal examination is not performed, the response to Item 19 may be based on direct observation or history.

10.0 SKIN (ITEM 26)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) **Examination techniques.**

(1) A careful examination of the skin may reveal underlying systemic disorders of clinical importance. For example, thyroid disease may produce changes in the skin and fingernails. Cushing's disease may produce abdominal striae, and abnormal pigmentation of the skin occurs with Addison's disease.

(2) Needle marks that suggest drug abuse should be noted, and body marks and scars should be described and correlated with known history. Further history should be obtained as needed to explain findings.

(b) **Medical disposition.** The following is a table that lists the most common conditions of aeromedical significance, and course of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
CUTANEOUS			
Dermatomyositis, deep mycotic infections, eruptive xanthomas, Hansen's disease, lupus erythematosus, Raynaud's phenomenon, sarcoid, or scleroderma	All	Submit all pertinent medical information and current status report	Unfit
Kaposi's sarcoma	All	Submit all pertinent medical information and current status report	Unfit
MALIGNANT MELANOMA			
Melanoma with a Breslow level greater than .75 mm with/without any metastasis	All	Submit all pertinent medical records, operative/pathology reports, current oncological status report, and current MRI of the brain	Unfit
Melanoma of unknown primary origin	All	Submit all pertinent medical records, operative/pathology reports, current oncological status report, and current MRI of the brain; submit PET scan if primary origin is unknown	Unfit
Neurofibromatosis with central nervous system involvement	All	Submit all pertinent medical information and current status medical report	Unfit
URTICARIAL ERUPTIONS			
Angioneurotic oedema	All	Submit all pertinent medical records and a current status report to include treatment	Unfit
Chronic urticaria	All	Submit all records and a current status report to include treatment	Unfit

11.0 G-U SYSTEM (ITEM 20)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

G-U system (not including pelvic examination).

Note: The pelvic examination is performed only at the applicant's discretion or if indicated by specific history or physical findings. If a pelvic examination is performed, the results are to be recorded in item 28 of the Medical Examination Report (FORM: O-MED 004).

(a) Examination techniques.

(1) The AAME should observe for discharge, inflammation, skin lesions, scars, strictures, tumours, and secondary sexual characteristics. Palpation for masses and areas of tenderness should be performed. The pelvic examination is performed only at the applicant's discretion or if indicated by specific history or physical findings. If a pelvic examination is performed, the results are to be recorded in Item 28 of the Medical Examination Report form.

(2) Disorders such as sterility and menstrual irregularity are not usually of importance in qualification for medical certification. Specialty evaluations may be indicated by history or by physical findings on the routine examination. A personal history of urinary symptoms is important; such as:

(i) Pain or burning upon urination

(ii) Dribbling or incontinence

(iii) Polyuria, frequency, or nocturia

(iv) Haematuria, pyuria, or glycosuria

(3) Special procedures for evaluation of the G-U system should best be left to the discretion of an urologist, nephrologist, or gynaecologist.

(b) Medical disposition.

(1) The following is a table that lists the most common conditions of aeromedical significance, and course of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
CUTANEOUS			
Dermatomyositis, deep mycotic infections, eruptive xanthomas, Hansen's disease, lupus erythematosus, Raynaud's phenomenon, sarcoid, or scleroderma	All	Submit all pertinent medical information and current status report	Unfit
Kaposi's sarcoma	All	Submit all pertinent medical information and current status report	Unfit
MALIGNANT MELANOMA			
Melanoma with a Breslow level greater than .75 mm with/without any metastasis	All	Submit all pertinent medical records, operative/pathology reports, current oncological status report, and current MRI of the brain	Unfit
Melanoma of unknown primary origin	All	Submit all pertinent medical records, operative/pathology reports, current oncological status report, and current MRI of the brain; submit PET scan if primary origin is unknown	Unfit
Neurofibromatosis with central nervous system involvement	All	Submit all pertinent medical information and current status medical report	Unfit
URTICARIAL ERUPTIONS			
Angioneurotic oedema	All	Submit all pertinent medical records and a current status report to include treatment	Unfit
Chronic urticaria	All	Submit all records and a current status report to include treatment	Unfit

The use of oral or repository contraceptives or hormonal replacement therapy is not disqualifying for medical certification. If the applicant is experiencing no adverse symptoms or reactions to cyclic hormones and is otherwise qualified, the AAME may issue the desired certificate.

Gender dysphoria and gender reassignment are not disqualifying, but a complete review of the medical history and records is indicated to determine that there is no medical, psychiatric, or psychological condition that is considered disqualifying. Medical disqualification is considered appropriate during the time of hormonal

manipulation until such time where there is a stabilization of the dose administered and the physiologic response. Defer and submit a current status report and all pertinent medical reports to the Authority.

12.0 MUSCULOSKELETAL (ITEMS 22-23)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) **Examination techniques.** Standard examination procedures should be used to make a gross evaluation of the integrity of the applicant's musculoskeletal system. The AAME should note:

(1) Pain: neuralgia, myalgia, paraesthesia, and related circulatory and neurological findings

(2) Weakness: local or generalised; degree and amount of functional loss

(3) Paralysis: atrophy, contractures, and related dysfunctions

(4) Motion coordination, tremors, loss or restriction of joint motions, and performance degradation

(5) Deformity: extent and cause

(6) Amputation: level, stump healing, and phantom pain

(7) Prostheses: comfort and ability to use effectively

(b) **Medical disposition.** The following table lists the most common conditions of aeromedical significance, and course of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

13.0 UPPER AND LOWER EXTREMITIES (ITEM 22)

Disease/Condition	Class	Evaluation Data	Disposition
UPPER AND LOWER EXTREMITIES			
Amputations	All	Submit a current status report to include functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports	If applicant has a SODA issued on the basis of the amputation, issue certificate Otherwise, requires Authority decision; after reviewing all medical data, the Authority may authorise a special medical flight test
Atrophy of any muscles that is progressive; deformities, either congenital or acquired; or limitation of motion of a major joint that is sufficient to interfere with the performance of airman duties	All	Submit a current status report to include functional status (degree of impairment as measured by strength, range of motion, and pain), medication with side effects, and all pertinent medical reports	Unfit
Neuralgia orneuropathy, chronic or acute, particularly ciatica, if sufficient to interfere with function or is likely to become incapacitating	All	Submit a current status report to include functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports	Unfit
Osteomyelitis, acute or chronic, with or without draining fistula(e)	All	Submit a current status report to include functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports	Unfit
Tremors, if sufficient to interfere with the performance of airman duties12	All	Submit a current status report to include functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports	Unfit

(a) For all the above conditions: if the applicant is otherwise qualified, the Authority may issue a limited certificate. This certificate will permit the applicant to proceed with flight training until ready for a MFT. At that time, at the applicant's request, the Authority will authorize the applicant to take a MFT in conjunction with the regular flight test. The MFT and regular private pilot flight test are conducted by a Aviation Safety Inspector (ASI). This affords the applicant an opportunity to demonstrate the ability to control the aircraft despite the handicap. The ASI prepares a written report and indicates whether there is a safety problem. A medical certificate and SODA may be provided to the ASI for issuance to the applicant, or the ASI may be required to send the report to the Head of Department Aeromedical Standards Department who Authorised the test.

(b) When prostheses are used or additional control devices are installed in an aircraft to assist the amputee, those found qualified by special certification procedures will have their certificates limited to require that the devices (and, if necessary, even the specific aircraft) must always be used when exercising the privileges of the airman/ATCO certificate.

14.0 SPINE, OTHER MUSCULOSKELETAL (ITEM 23)

Disease/Condition	Class	Evaluation Data	Disposition
ARTHRITIS			
Osteoarthritis13	All	Submit a current status report, including functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports	If mild and controlled with small doses of non-prescription agents, issue certificate If symptomatic or requires medication, unfit
Rheumatoid arthritis And variants	All	Submit a current status report, including functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports	Requires Authority decision
COLLAGEN DISEASE			
Acute polymyositis, dermatomyositis, lupus erythematosus, or periarteritis nodosa	All	Submit a current status report, including functional status, frequency and severity of episodes, organ systems effected, medications with side effects, and all pertinent medical reports.	Requires Authority decision
SPINE, OTHER MUSCULOSKELETAL			
Active disease of bones and joints	All	Submit a current status report, including functional status (degree of impairment as measured by strength, range of motion, and pain), medications with side effects, and all pertinent medical reports.	Unfit
Ankylosis, curvature, or other marked deformity of the spinal column sufficient to interfere with the performance of airman duties	All	Submit a current status report, including functional status (degree of impairment as measured by strength, range of motion, pain), medications with side effects and all pertinent medical reports	Requires Authority decision
Other disturbances of Musculoskeletalfunction, acquired or congenital, sufficient to interfere with the performance of airman duties or likely to progress to that degree	All	Submit a current status report, including functional status (degree of impairment as measured by strength, range of motion, pain), medications with side effects, and all pertinent medical reports	Unfit
Symptomatic herniation of intervertebral disc	All	Submit a current status report, including functional status (degree of impairment as measured by strength, range of	Unfit

		motion, and pain), medications with side effects, and all pertinent medical reports	

15.0 IDENTIFYING BODY MARKS, SCARS, TATTOOS (ITEM 26)

{Identifying body marks, scars, tattoos (size and location)}

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) **Examination techniques.** A careful examination for surgical and other scars should be made, and those that are significant (the result of surgery or that could be useful as identifying marks) should be described. Tattoos should be recorded because they may be useful for identification.

(b) **Medical disposition.** The AAME should question the applicant about any surgical scars that have not been previously addressed and document the findings in item 28 of the Medical Examination Report (FORM: O-MED 004).

Medical certificates must not be issued to applicants with medical conditions that require deferral without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of a medical certificate.

(c) **Disqualifying condition.** The following condition is disqualifying: scar tissue that involves the loss of function, which may interfere with the safe performance of airman/ATCO duties.

16.0 LYMPHATICS (ITEM 26)

(a) **Examination techniques.** A careful examination of the lymphatic system may reveal underlying systemic disorders of clinical importance. Further history should be obtained as needed to explain findings.

(b) **Medical disposition**. The following is a table that lists the most common conditions of aeromedical significance and courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical

documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
HODGKIN'S DISEASE – LYMPHOMA			
Hodgkin's disease – lymphoma	All	Submit a current status report and all pertinent medical reports; include past and present treatment(s)	Unfit
LEUKAEMIA, ACUTE AND CHRONIC			
Leukaemia, acute and chronic – all types	All	Submit a current status report and all pertinent medical reports	Unfit
Chronic lymphocytic leukaemia	All	Submit a current status report and all pertinent medical reports	Unfit
LYMPHATICS			
Adenopathy secondary to systemic disease or metastasis	All	Submit a current status report and all pertinent medical reports	Unfit
HODGKIN'S DISEASE – LYMPHOMA			
Lymphedema	All	Submit a current status report and all pertinent medical reports Note if there are any motion restrictions of the involved extremity	Unfit
Possession of sickle cell trait	1, 2	Submit a current status report and all pertinent medical reports Include past and present treatment(s)	Issue unless there is positive medical evidence to the contrary If due to a transient condition, applicant should be only temporarily unfit

17.0 NEUROLOGIC (ITEM 24)

Neurologic (tendon reflexes, equilibrium, senses, cranial nerves, coordination, etc.)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) **Examination techniques**. A neurologic evaluation should consist of a thorough review of the applicant's history prior to the neurological examination. The AAME should specifically inquire about a history of weakness or paralysis, disturbance of sensation, loss of coordination, or loss of bowel or bladder control. Certain laboratory studies, such as scans and imaging procedures of the head or spine, electroencephalograms, or spinal paracentesis may suggest significant medical history. The AAME should note conditions identified in Item 28 on the FORM: O-MED 004 with facts, such as dates, frequency, and severity of occurrence.

A history of simple headaches without sequelae is not disqualifying. Some require only temporary disqualification during periods when the headaches are likely to occur or require treatment. Other types of headaches may preclude certification by the AAME and require special evaluation and consideration (e.g., migraine and cluster headaches). One or two episodes of dizziness or even fainting may not be disqualifying. For example, dizziness upon suddenly arising when ill is not a true dysfunction. Likewise, the orthostatic faint associated with moderate anaemia is no threat to aviation safety as long as the individual is temporarily disqualified until the anaemia is corrected.

An unexplained disturbance of consciousness is disqualifying under the medical standards.
Because a disturbance of consciousness may be expected to be totally incapacitating, individuals with such histories pose a high risk to safety and must be denied or deferred by the AAME. If the cause of the disturbance is explained and a loss of consciousness is not likely to recur, then medical certification may be possible.

The basic neurological examination consists of an examination of the 12 cranial nerves, motor strength, superficial reflexes, deep tendon reflexes, sensation, coordination, and mental status, and includes the Babinski reflex and Romberg sign. The AAME should be aware of any asymmetry in responses because this may be evidence of mild or early abnormalities. The AAME should evaluate the visual field

by direct confrontation or, preferably, by one of the perimetry procedures, especially if there is a suggestion of neurological deficiency.

(b) **Medical disposition**. A history or the presence of any neurological condition or disease that potentially may incapacitate an individual should be regarded as initially disqualifying. Issuance of a medical certificate to an applicant in such cases should be denied or deferred, pending further evaluation. A convalescence period following illness or injury may be advisable to permit adequate stabilisation of an individual's condition and to reduce the risk of an adverse event.

Applications from individuals with potentially disqualifying conditions should be forwarded to the Authority. Processing such applications can be expedited by including hospital records, consultation reports, and appropriate laboratory and imaging studies, if available. Symptoms or disturbances that are secondary to the underlying condition and that may be acutely incapacitating include pain, weakness, vertigo or loss of coordination, seizures or a disturbance of consciousness, visual disturbance, or mental confusion. Chronic conditions may be incompatible with safety in aircraft operation because of long-term unpredictability, severe neurologic deficit, or psychological impairment.

The following is a table that lists the most common conditions of aeromedical significance and courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
CEREBROVASCULAR DISEASE (INCLUDING THE BRAIN STEM)15			
Cerebral thrombosis, intracerebral or subarachnoid haemorrhage, transient ischemic attack (TIA)	All	Submit all pertinent medical records and a current neurologic report, including CHD Protocol, brain MRI, Bilat Carotid ultrasound, name and dosage of medication(s) and side effects	Unfit
Intracranial aneurysm or arteriovenous malformation	All	Submit all pertinent medical records, current neurologic report, name and dosage of medication(s) and side effects	Unfit
Intracranial tumour14	All	Submit all pertinent medical records, current neurologic report, name and dosage of medication(s), and side effects	Unfit
Pseudotumour cerebri (benign intracranial hypertension)	All	Submit all pertinent medical records, current neurologic report, name and dosage of medication(s), and side effects	Unfit
DEMYELINATING DISEASE			
Acute optic neuritis, allergic encephalomyelitis, Landry-Guillain-Barre syndrome, myasthenia gravis, or multiple sclerosis	All	Submit all pertinent medical records, current neurologic report, comments on involvement and persisting deficit, period of stability without symptoms, name and dosage of medication(s) and side effects	Unfit

EXTRAPYRAMIDAL, HEREDITARY, AND DEGENERATIVE DISEASES OF THE NERVOUS SYSTEM			
Dystonia musculorum deformans, Huntington's disease, Parkinson's disease, Wilson's disease, Gilles de la Tourette syndrome, Alzheimer's disease, dementia (unspecified), or slow viral diseases (i.e., Creutzfeldt–Jakob disease)	All	Obtain medical recordsand current neurological status, complete neurological evaluation with appropriate laboratory and imaging studies, as indicated. May consider neuropsychological testing	Unfit
HEADACHES			
A typical facial pain	All	Submit all pertinent medical records and a current neurologic report, including name and dosage of medication(s) and side effects	Unfit
Chronic tension or cluster headaches	All	Submit all pertinent medical records and a current neurologic report, including characteristics, frequency, severity, associated with neurologic phenomena, name and dosage of medication(s) and side effects	Unfit
Migraines	All	Submit all pertinent medical records and a current neurologic report, including characteristics, frequency, severity, associated with neurologic phenomena, and name and dosage of medication(s) and side effects	Unfit
Post-traumatic headache	All	Submit all pertinent medical records, current neurologic report, name and dosage of medication(s) and side effects	Unfit
HYDROCEPHALUS AND SHUNTS			
Hydrocephalus, secondary to a known injury or disease process, or normal pressure	All	Submit all pertinent medical records and a current neurologic report, including name and dosage of medication(s) and side effects	Unfit
INFECTIONS OF THE NERVOUS SYSTEM			
Brain abscess, encephalitis, meningitis, and neurosyphilis	All	Complete neurological evaluation with appropriate laboratory and imaging studies	Unfit
NEUROLOGIC CONDITIONS			
A disturbance of consciousness without satisfactory medical explanation of the cause	All	Submit all pertinent medical records and a current neurologic report, including name and dosage of medication(s) and side effects	Unfit
Epilepsy	All	Submit all pertinent medical records and a current status report, including name and dosage of medication(s) and side effects	Unfit
Febrile seizure (single episode)	All	Submit all pertinent medical records and a current status report	If occurred prior to age 5, without recurrence and off

			medications for 4 years, issue certificate Otherwise, unfit
Transient loss of nervous system function(s) without satisfactory medical explanation of the cause – e.g., transient global amnesia	All	Submit all pertinent medical records and a current status report, including name and dosage of medication(s) and side effects	Unfit
OTHER CONDITIONS			
Trigeminal neuralgia	All	Submit all pertinent medical records, current neurologic report, name and dosage of medication(s) and side effects	Unfit
PRESENCE OF ANY NEUROLOGICAL CONDITION OR DISEASE THAT POTENTIALLY MAY INCAPACITATE AN INDIVIDUAL			
Head trauma associated with epidural or subdural hematoma, focal neurologic deficit, depressed skull fracture, or unconsciousness or disorientation of more than 1 hour following injury	All	Submit all pertinent medical records and a current status report, including pre-hospital and emergency department records, operative reports, neurosurgical evaluation, name and dosage of medication(s) and side effects	Unfit
SPASTICITY, WEAKNESS, OR PARALYSIS OF THE EXTREMITIES			
Conditions that are stable and non-progressive may be considered for medical certification	All	Submit all pertinent medical records and a current neurologic report, including aetiology, degree of involvement, period of stability, appropriate laboratory and imaging studies	Requires Authority decision
VERTIGO OR DISEQUILIBRIUM22			
Alternobaric vertigo, hyperventilation syndrome, Meniere's disease and acute peripheral vestibulopathy, non-functioning labyrinths, or orthostatic hypotension	All	Submit all pertinent medical records, current neurologic report, name and dosage of medication(s) and side effects	Unfit

18.0 PSYCHIATRIC (ITEM 25)

Psychiatric (appearance, behaviour, mood, communication, and memory)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) Examination techniques.

(1) The Authority does not expect the AAME to perform a formal psychiatric examination. However, the AAME should form a general impression of the emotional stability and mental state of the applicant. There is a need for discretion in the AAME-applicant relationship consonant with the Authority's aviation safety mission and the concerns of all applicants regarding disclosure to a public agency of sensitive information that may not be pertinent to aviation safety. AAMEs must be sensitive to this need while, at the same time, collecting what is necessary for a certification decision. When a question arises, the documents. If the question remains unresolved, the AAME should seek advice from the Authority's Medical Assessor.

(2) Review of the applicant's history as provided on the application form may alert the AAME to gather further important factual information. Information about the applicant may be found in items related to age, pilot time, and class of certificate for which the applicant applied. Information about the present occupation and employer also may be helpful. If any psychotropic drugs are prescribed or have been used, follow-up questions are appropriate. Previous medical denials or aircraft accidents may be related to psychiatric problems.

(3) Psychiatric information can be derived from the individual items in medical history (Item18). Any affirmative answers to "Mental disorders of any sort; depression, anxiety, etc." or "Suicide attempt" are significant. Any disclosure of current or previous alcohol or drug problems requires further clarification. A record of traffic

violations may reflect certain personality problems or indicate an alcohol problem. Affirmative answers related to rejection by military service or a military medical discharge requires elaboration. Reporting symptoms such as headaches or dizziness, or even heart or stomach trouble, may reflect a history of anxiety rather than a primary medical problem in these areas. Sometimes, the information applicants give about their previous diagnoses is incorrect, either because the applicant is unsure of the correct information or because the applicant chooses to minimise past difficulties. If there was a hospital admission for any emotionally related problem,

it will be necessary to obtain the entire record.

(4) Valuable information can be derived from the casual conversation that occurs during the physical examination. Some of this conversation will reveal information about the applicant's family, job, and special interests. Even some personal troubles may be revealed at this time. The AAME's questions should not be stilted or follow a regular pattern; instead, they should be a natural extension of the AAME's curiosity about the person being examined. Information about the motivation for medical certification and interest in flying may be revealing. A formal Mental Status Examination may not be necessary. Information about associations, mood, and memory is generally available from the usual interactions during the examination. Indication of cognitive problems may become apparent during the examination. Problems with concentration, attention, or confusion during the examination or slower, vague responses should be noted and may be cause for deferral.

(5) The AAME should make observations about the following specific elements and should note on the form any gross or notable deviations from normal:

(i) Appearance (abnormal if dirty, disheveled, odoriferous, or unkempt)

(ii) Behaviour (abnormal if uncooperative, bizarre, or inexplicable)

(iii) Mood (abnormal if excessively angry, sad, euphoric, or labile)

(iv) Communication (abnormal if incomprehensible, does not answer questions directly)

(v) Memory (abnormal if unable to recall recent events)

(vi) Cognition (abnormal if unable to engage in abstract thought or if delusional or hallucinating)

(6) The AAME, upon identifying any significant problems, should defer issuance of the medical certificate and report findings to the Authority. This could be accomplished by contacting the Authority.

(b) Medical disposition.

(1) General considerations. It must be pointed out that considerations for safety, which in the "mental" area are related to a compromise of judgement and emotional control or to diminished mental capacity with loss of behavioural control, are not the same as concerns for emotional health in everyday life. Some problems may have only a slight impact on an individual's overall capacities and the quality of life but may nevertheless have a great impact on safety. Conversely, many emotional problems that are of therapeutic and clinical concern have no impact on safety.

(2) Denials. The Authority has concluded that certain psychiatric conditions are such that their presence or a past history of their presence is sufficient to suggest a significant potential threat to safety. It is, therefore, incumbent upon the AAME to be aware of any current or past indications of these conditions and to deny or defer issuance of the medical certificate to an applicant who has a history of these conditions. An applicant who has a current diagnosis or history of these conditions (listed below) may request the Authority to grant an Authorisation under the special issuance section of this guide and, based upon individual considerations, the Authority may grant such an issuance.

Note: The use of a psychotropic drug is disqualifying for aeromedical certification purposes. This

includes all sedatives, tranquillisers, antipsychotic drugs, antidepressant drugs (including SSRIs), analeptics, anxiolytics, and hallucinogens. The AAME should defer issuance and forward the medical records to the Authority.

The following is a table that lists the most common conditions of aeromedical significance and the course of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
PSYCHIATRIC CONDITIONS			
Adjustment disorders	All	Submit all pertinent medical information and Clinical status reports	If stable, resolved, no associated disturbance of thought, no recurrent episodes, and psychotropic medication(s) used for less than 6 months and discontinued for at least 3 months, issue certificate Otherwise, unfit
Attention deficit disorder	All	Submit all pertinent medical information and a clinical status report, including documenting the period of use, name and dosage of any medication(s) and side effects	Unfit
PSYCHIATRIC CONDITIONS			
Bipolar disorder	All		Unfit
Bereavement, dysthymic, or minor depression	All	Submit all pertinent medical information and clinical status reports	If stable, resolved, no associated disturbance of thought, no recurrent episodes, and (a) Psychotropic medication(s) used for less than 6 months and discontinued for at least 3 months, issue certificate (b) No use of psychotropic medication(s), issue certificate Otherwise, unfit
Psychosis	All		Unfit
Psychotropic medications for smoking cessation	All	Document period of use, name, and dosage of medication(s) and side effects	If medication(s) discontinued for at least 30 days and without side effects, issue certificate Otherwise, unfit
Substance abuse	All		Unfit
Substance dependence	All		Unfit
Suicide attempt	All	Submit all pertinent medical information required	Unfit

(c) The category of personality disorders severe enough to have repeatedly manifested themselves by overt acts refers to diagnosed personality disorders that involve what is called “acting out” behaviour. These personality problems relate to poor social judgement; impulsivity; and disregard or antagonism towards authority, especially rules and regulations. A history of long-standing behavioural problems, whether major (criminal) or relatively minor (truancy, military misbehaviour, petty criminal and civil indiscretions, and social instability), usually occurs with these disorders.

(d) Driving infractions and previous failures to follow aviation regulations are critical examples of these acts.

(e) Certain personality disorders and other mental disorders that include conditions of limited duration and/or widely varying severity may be disqualifying. Under this category, the Authority is especially concerned with significant depressive episodes requiring treatment, even outpatient therapy. If these episodes have been severe enough to cause some disruption of vocational or educational activity, or if they have required medication or involved suicidal ideation, the application should be deferred or denied issuance.

(f) Some personality disorders and situational dysphorias may be considered disqualifying for a limited time. These include such conditions as gross immaturity and some personality disorders not involving or manifested by overt acts.

(g) The category of psychosis includes schizophrenia and bipolar and major depression, as well as some other rarer conditions. In addition, some conditions such as schizotypal and borderline personality disorders that include psychotic symptoms at some time in their course may also be disqualifying.

(h) A bipolar disorder may not reach the level of psychosis but can be so disruptive of judgement and functioning (especially mania) so as to interfere with aviation safety. All applicants with such a diagnosis must be denied or deferred. However, a number of these applicants so diagnosed may be favourably considered for an Authorisation when the symptoms do not constitute a threat to safe aviation operations.

(i) Although they may be rare in occurrence, severe anxiety problems, especially anxiety and phobias associated with some aspect of flying, are considered significant. Organic mental disorders that cause a cognitive defect, even if the applicant is not psychotic, are considered disqualifying whether they are due to trauma, toxic exposure, or arteriosclerotic or other degenerative changes.

(j) Substance dependence refers to the use of substances of dependence, which include alcohol and other drugs (i.e., PCP, sedatives and hypnotics, anxiolytics, marijuana, cocaine, opioids, amphetamines, hallucinogens, and other psychoactive drugs or chemicals). Substance dependence is defined and specified as a disqualifying medical condition.

(k) Substance dependence is evidenced by one or more of the following: increased tolerance;manifestation of withdrawal symptoms; impaired control of use; or continued use despite damage to physical health or impairment of social, personal, or occupational functioning. Substance dependence is accompanied by various deleterious effects on physical health as well as personal or social functioning. There are many other indicators of substance dependence that may become apparent in the applicant’s medical history and physical examination. Treatment for substance dependence–related problems; arrests, including charges of driving under the influence of drugs or alcohol; and vocational or marital disruption related to drugs or alcohol consumption are important indicators. Alcohol on the breath at the time of a routine physical examination should prompt a high level of suspicion. Consumption of drugs or alcohol sufficient to cause liver damage is an indication of the presence of alcoholism.

(l) Substance abuse includes the use of the above substances under any one of the following conditions:

(1) Use of a substance in the last 2 years in which the use was physically hazardous (e.g.,DUI or DWI) if there has been at any other time an instance of the use of a substance also in a situation in which the use was physically hazardous

(2) During biochemical testing on such occasions as pre-employment, upon reasonable suspicion, after accidents/incidents, at intervals, and at random

(3) The Authority finds that an applicant's misuse of a substance makes him or her unable to safely

perform the duties or exercise the privileges of the airman/ATCO certificate applied for or held or that the misuse may reasonably be expected to make the applicant unable to perform those duties or exercise those privileges for the maximum duration of the airman/ATCO medical certificate applied for or held.

(m) Substance dependence and substance abuse are specified as disqualifying medical conditions.

19.0 GENERAL SYSTEMIC (ITEM 27)

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(a) **Examination techniques**. A protocol for examinations applicable to Item 27 is not provided because the necessary history-taking, observation, and other examination techniques used in examining other systems have already revealed much of what can be known about the status of the applicant's endocrine and other systems. For example, the examination of the skin alone can reveal important signs of thyroid dysfunction, Addison's disease, Cushing's disease, and several other endocrine disorders. The eye may reflect a thyroid disorder (exophthalmos) or diabetes (retinopathy). When the AAME reaches Item 49 in the course of the examination of an applicant, it is recommended that the AAME take a moment to review and determine if key procedures have been performed in conjunction with examinations made under other items and to determine the relevance of any positive or abnormal findings.

(b) **Medical disposition.** The following is a table that lists the most common conditions of aeromedical significance and courses of action that should be taken by the AAME. Medical certificates must not be issued to an applicant with medical conditions that require deferral or for any condition not listed in the

table that may result in sudden or subtle incapacitation without consulting the Authority. Medical documentation must be submitted for any condition in order to support an issuance of an airman/ATCO medical certificate.

Disease/Condition	Class	Evaluation Data	Disposition
BLOOD AND BLOOD-FORMING TISSUE DISEASE			
Anaemia	All	Submit a current status report and all pertinent medical reports; include a CBC, and any other tests deemed necessary	Requires Authority decision
Haemophilia	All	Submit a current status report and all pertinent medical reports; include frequency, severity, and location of bleeding sites	Unfit
Other disease of the blood or blood-forming tissues that could adversely affect performance of airman duties	All	Submit a current status report and all pertinent medical reports	Unfit
Polycythaemia	All	Submit a current status report and all pertinent medical reports; include CBC	Unfit
DIABETES			
Diabetes insipidus	All	Submit all pertinent medical records; current status must include names and dosage of medication(s) and side effects	Requires Authority decision
Diabetes mellitus, diet controlled	All		If no glycosuria and normal Hgba1c, issue certificate
Diabetes mellitus II requiring oral medication	2,3		Oral drugs administered under Conditions permitting appropriate medical supervision and control, issue certificate
ENDOCRINE DISORDERS			
Acromegaly	All	Submit all pertinent medical records; current status must include names and dosage of medication(s) and side effects	Unfit
Addison's disease	All	Submit all pertinent medical records; current status must include names and dosage of medication(s) and side effects	Unfit
Cushing's disease or syndrome	All	Submit all pertinent medical records; current status must include names	If status is post-surgery, and the

		and dosage of medication(s) and side effects	disease is controlled and stable, and no sequelae is present, issue certificate Otherwise, unfit
Hypoglycaemia, whether functional or a result of pancreatic tumour	All	Submit all pertinent medical records; current status must include names and dosage of medication(s), side effects, and current serum calcium and phosphorus levels	Unfit
Hyperparathyroidism	All	Submit all pertinent medical records; current status must include names and dosage of medication(s), side effects, and current serum calcium and phosphorus levels	Unfit
Hyperparathyroidism	All	Submit all pertinent medical records; current status must include names and dosage of medication(s), side effects, and current serum calcium and phosphorus levels	Unfit
Hyperthyroidism	All	Submit all pertinent medical records; current status must include names and dosage of medication(s) and side effects and current TFTs	Unfit
Hypothyroidism	All	Submit all pertinent medical records; current status must include names and dosage of medication(s) and side effects and current TFTs	If euthyroid, issue certificate Otherwise, unfit
Proteinuria and glycosuria	All	Submit all pertinent medical records; current status must include names and dosage of medication(s) and side effects	Trace or 1+ protein and glucose intolerance ruled out, issue certificate Otherwise, requires Authority decision.
HUMAN IMMUNODEFICIENCY VIRUS (HIV)			
Acquired Immunodeficiency Syndrome (AIDS)	All		Unfit
Human Immunodeficiency Virus (HIV)	All		Unfit
LEUKAEMIA, ACUTE AND CHRONIC			
Leukaemia, acute and chronic – all types	All	Submit a current status report and all pertinent medical reports	Unfit

CHAPTER 4

EXAMINATION TECHNIQUES AND CRITERIA FOR QUALIFICATION

1.0 EXAMINATION TECHNIQUES AND CRITERIA FOR QUALIFICATION

This chapter provides guidance for the completion of **Item 34 in FORM: O-MED 004 and item 419 and 420 in FORM: O-MED 003**. The AAME is responsible for conducting the examination. However, he or she may delegate to a qualified physician's assistant, nurse, aide, or laboratory assistant the testing required for these Items. Regardless of who performs the tests, the AAME is responsible for the accuracy of the findings, and this responsibility may not be delegated.

After all routine evaluations and tests are completed; the AAME should make a complete review of applicable forms. If the forms are complete and accurate, the AAME should add final comments, make qualification decision statements, and sign the declaration. The medical history page of the form must be completed in the handwriting of and signed and dated by the applicant. Upon completion of the physical examination, the entire forms must be sent by the AAME to the Authority.

2.0 HEARING (ITEM 34 IN FORM: O-MED 004 AND ITEM 419 AND 420 IN FORM: O-MED 003

Item 34 in FORM: O-MED 004

(34) Hearing	Right ear	Left ear
Conversational voice test at 2m Back turned to examiner	Yes No	Yes No
Forced at 6m whisper	Yes No	Yes No

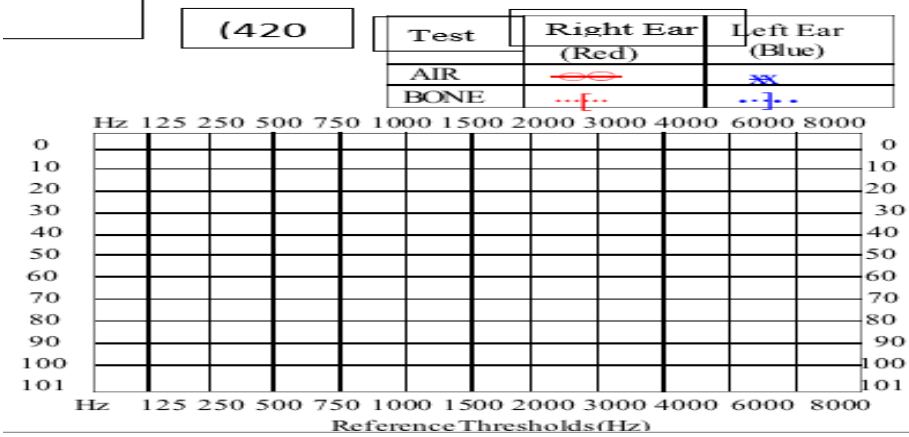
Item 419 and 420 in FORM: O-MED 003

(419) Pure tone audiometry dB HL (hearing level)

normal

Hz	Right ear	Left ear
250		
500		
1000		
2000		
3000		
4000		
6000		
8000		

(420



(a) The person shall demonstrate acceptable hearing by at least one of the following tests:

(1) Demonstrate an ability to hear an average conversational voice in a quiet room, using both ears, at a distance of 2 meters from the AAME, who should have his or her back turned to the applicant.

(2) Provide acceptable results of pure tone audiometric testing of unaided hearing acuity according to the following table of worst acceptable thresholds. The reference zero for calibration of pure-tone audiometers used for applying these standards is that of the International Organisation for Standardization (ISO) Recommendation R389 (1964).

Frequency (Hz)	500 Hz	1000 Hz	2000 Hz	3000 Hz
Better ear (Db)	35	35	35	50
Poorer ear (Db)	35	35	35	50

(3) No disease or condition of the middle or internal ear, nose, oral cavity, pharynx, or larynx that:

(i) Interferes with, or is aggravated by, flying or may reasonably be expected to do so,

or

(ii) Interferes with, or may reasonably be expected to interfere with, clear and effective speech communication.

(4) No disease or condition manifested by, or that may reasonably be expected to be manifested by, vertigo or a disturbance of equilibrium.

(b) **Examination equipment and techniques.**

(1) Classes 1, 2 and 3. The applicant must be tested on pure tone audiometric testing device using unaided hearing at first issue and then once every 5 years up to age 40 years and once every 3 years after age 40. The hearing requirements are listed below according to the following table of acceptable thresholds, using the calibration standards of the American National Standards Institute (ASNI) (1969):

Frequency (Hz)	500	1000	2000	3000	4000	6000	8000
Better ear (Db)	35	35	35	50	50	50	50
Poorer ear (Db)	35	35	35	50	50	50	50

An applicant with a hearing loss greater than the above may be declared fit provided that:

(i) The applicant can demonstrate an ability to hear an average conversational voice in a quiet room, using both ears, at a distance of 2 meters from the AAME, who is facing away from the applicant, and

A. The Class 1 applicant has a hearing performance in each ear separately equivalent to that of a normal person against a background noise that will simulate the masking properties of flight deck noise upon speech and beacon signals

B. The Class 3 applicant has a hearing performance in each ear separately equivalent to that of a normal person against a background noise that will simulate that experienced in a typical air traffic control working environment

(ii) The frequency composition of the background noise referred to above is defined only to the extent that the frequency ranges 600 to 4,800 Hz is adequately represented

(iii) Alternatively, other methods providing equivalent results to those specified above must be used

(2) Class 2. The applicant must demonstrate an ability to hear an average conversational voice in a quiet room, using both ears, at a distance of 2 meters from the AAME, who is facing away from the applicant.

(c) **Discussion**.

(1) Conversational voice test. For all classes of certification, the applicant must demonstrate hearing of an average conversational voice in a quiet room, using both ears, at 2 meters, with his or her back turned to the AAME. The AAME should not use only sibilants (Sounding test materials). If the applicant is able to repeat correctly the test numbers or words, “pass” should

be noted and recorded on application form, Item 49. If the applicant is unable to hear a normal conversational voice, then "fail" should be marked and one of the following tests may be administered:

(2) Audiometric speech discrimination. Upon failing both conversational voice and pure tone audiometric test, an audiometric speech discrimination test should be administered (usually by an otologist or audiologist). The applicant must score at least 70 percent at an intensity no greater than 65 dB in either ear.

(d) **Equipment**.

(1) Approval. The Authority does not approve or designate specific audiometric equipment for use in medical certification. Equipment used for testing must accurately and reliably cover the required frequencies and have adequate threshold step features. Most audiometers should be acceptable if they are maintained in proper calibration and are used in an adequately quiet place.

(2) Calibration. It is critical that any audiometer be periodically calibrated to ensure its continued accuracy. Annual calibration is recommended. Also recommended is the further safeguard of obtaining an occasional audiogram on a "known" subject or staff member between calibrations, especially at any time that a test result unexpectedly varies significantly from the hearing levels clinically expected. This testing provides an approximate "at threshold" calibration.

Hearing requirements are established in addition to the ear examination conducted during the medical examination for the physical and mental requirements.
In the choice of speech material, aviation-type material is not to be used exclusively for the above tests. Lists of phonetically balanced words in use by a number of Contracting States have given satisfactory results.

A quiet room for the purposes of testing the hearing requirements is a room in which the intensity of the background noise is less than 50 dB when measured on "slow" response of an "A"-weighted sound level meter.

For the purposes of hearing requirements, the sound level of an average conversational Voice at point of output ranges from 85 to 95 dB.

(e) Medical disposition.

(i) Applicants who do not meet the auditory standards may be found eligible for a Statement of Demonstrated Ability (SODA). An applicant seeking a SODA must make the request in writing to the Authority. A determination of qualifications will be made on the basis of a special medical examination by an ENT consultant, an MFT, or operational experience.

(f) Hearing aids. If the applicant meets the standard with the use of hearing aids, the certificate may be issued with the following restriction: "Valid only with use of hearing amplification."

(ii) Some pilots who normally wear hearing aids to assist in communicating while on the ground report that they elect not to wear them while flying. They prefer to use the volume amplification of the radio headphone. Some use the headphone on one ear for radio communication and the hearing aid in the other for cockpit communications.

3.0 VISION (ITEMS 304 – 316 IN FORM: O-MED 005)

(a) Distant Vision (item 314)

Clinical Examination Check each item		Normal	Abnormal
(304) Eyes, External & Eyelids			
(305) Eyes Exterior (Slit lamp, opth.)			
(306) Eye position and movement			
(307) Visual fields (confrontation)			
(308) Pupillary reflexes			
(309) Fundi (Ophthalmoscopy)			
(310) Convergence	cm		
(311) Accommodation	D		

Visual acuity				
(314) Distant Vision at 5m/6m			*Spectacles*	*Contact lenses*
Right eye		Corrected to		
Left eye		Corrected to		
Both eyes		Corrected to		

(315) Intermediate vision at 1m			*Spectacles*	*Contact lenses*
Right eye		Corrected to		
Left eye		Corrected to		
Both eyes		Corrected to		

(312) Ocular muscle balance (in prism diopters)

Distant at 5/6	Near at 30-50cm
Ortho	Ortho
Eso	Eso
Hyper	Hyper
Cyclo	Cyclo
Tropia Yes ☐ No ☐	Phoria Yes ☐ No ☐
Fusional reserve testing Not performed ☐	Normal ☐ Abnormal ☐

(316) *Near vision at 30-50cm*		*Spectacles*	Contact lenses
Right eye	Corrected to		
Left eye	Corrected to		
Both eyes	Corrected to		

(317) Refraction	Sph	Cylinder	Axis

(1) **Classes 1 and 3.**

Distant visual acuity must be 6/9 or better in each eye separately, and binocular vision must be 6/6 or better with or without corrective lenses. If corrective lenses (spectacles or contact lenses) are necessary for 6/6 vision, the person may be eligible only on the condition that corrective lenses are worn while exercising the privileges of an airman/ATCO certificate and ratings, and an extra pair of suitable correcting spectacles is kept readily available.

(2) **Class 2.**

Distant visual acuity must be 6/12 or better in each eye separately, and binocular vision must be 6/9 or better, with or without corrective lenses. If corrective lenses (spectacles or contact lenses) are necessary for 6/9 vision, the person may be eligible only on the condition that corrective lenses are worn while exercising the privileges of an airman certificate and ratings, and an extra pair of suitable correcting spectacles is kept readily
available.

(3) **All classes.**

An applicant accepted as meeting the provisions above is deemed to continue to do so unless there is reason to suspect otherwise, in which case an ophthalmic report is required at the discretion of the Authority. Both uncorrected and correct visual acuity are normally measured and recorded at each reexamination. Conditions which indicate a need to obtain an ophthalmic report include a substantial

decrease in the uncorrected visual acuity; any decrease in best corrected visual acuity; and the occurrence of eye disease, eye injury, or eye surgery.

(4) **Examination equipment and techniques.**

(i) Each eye will be tested separately, and both eyes will be tested together.

(ii) Visual acuity should be measured by means of a series of Landolt rings or similar optotypes, placed at a distance from the applicant appropriate to the method of testing adopted.

(iii) A metal, opaque plastic or cardboard occluder should be used to cover the eye not being examined.

(iv) The examining room should be illuminated at a level that corresponds to ordinary office illumination (30–60 cd/m2).

(v) If the applicant wears corrective lenses, the uncorrected acuity should be determined first, and then corrected acuity. Applicants who wear contact lenses may not need to have their uncorrected visual acuity measured at each reexamination provided the history of their contact lens prescription is known.

(vi) Applicants with a large refractive error must use contact lenses or high-index spectacle lenses. (High-index spectacles are required to minimize peripheral field distortion.)

(vii) Common errors:

A. Permitting the applicant to view the chart with both eyes

B. Failure to observe the applicant's face to detect squinting

C. Failure to obtain the corrected acuity when the applicant wears glasses

D. Failure to note and to require the removal of contact lenses

(viii) Directions furnished by the manufacturer or distributor should be followed when using substitute devices for the above testing.

(5) **Medical disposition.**

(i) When corrective lenses are required to meet the standards, an appropriate limitation will be placed on the medical certificate. For example, when lenses are needed for distant vision only: "Holder shall wear corrective lenses."

(ii) For multiple vision defects involving distant and/or intermediate and/or near vision when one set of monofocal lenses corrects for all, the limitation is: "Holder shall wear corrective lenses."

(iii) For combined defective distant and near visual acuity where multifocal lenses are required, the appropriate limitation is: "Holder shall wear lenses that correct for distant vision and possess glasses that correct for near vision."

(iv) For multiple vision defects involving distant, near, and intermediate visual acuity when more

than one set of lenses is required to correct for all vision defects, the appropriate limitation is: "Holder shall wear lenses that correct for distant vision and possess glasses that correct for near and intermediate vision."

(v) An applicant who fails to meet vision standards and has no SODA that covers the extent of the visual acuity defect found on examination may obtain further Authority consideration for

grant of an Authorisation under the special issuance section of this guide for medical certification by submitting a report of an eye evaluation. The AAME can help to expedite the review procedure by forwarding a detailed Ophthalmic report which has been completed by an eye specialist.

(vi) Applicants whose uncorrected visual standards acuity is worse than 6/60 are required to provide a full ophthalmic report prior to obtaining an initial medical certificate and every 5 years thereafter. Applicants with eye disease (e.g., glaucoma) should be referred only to an ophthalmologist. Detailed Consultant Ophthalmologist/ specialist report to be obtained by the AAME and sent to the Authority.

(vii) In amblyopia ex anopsia, the visual acuity of one eye is decreased without presence of organic eye disease, usually because of strabismus or anisometropia in childhood. In amblyopia ex anopsia, the visual acuity loss is simply recorded in Item 49, "Distant vision," of application form, and visual standards are applied as usual. If the standards are not met, a detailed Ophthalmologist report should be submitted for consideration.

(b) Near Vision; Intermediate Vision (item 315 and item 316).

(315) Intermediate vision at 1m			*Spectacles*	*Contact lenses*
Right eye		Corrected to		
Left eye		Corrected to		
Both eyes		Corrected to		

(316) *Near vision at 30-50cm*		*Spectacles*	Contact lenses
Right eye	Corrected to		
Left eye	Corrected to		
Both eyes	Corrected to		

(1) **All classes.**

(i) The applicant shall have the ability to read, while wearing the correcting lenses, if any, the N5 chart or its equivalent at a distance selected by that applicant in the range of 30 to 50 cm and the N14 chart at a distance of 100 cm. If this requirement is met only by the use of near correction, the applicant may be assessed as fit provided that this near correction is added to the spectacles already prescribed for distance vision; if no such correction is prescribed, a pair of spectacles for near use shall be kept readily available during the exercise of the privileges of the licence. When near correction is required, the applicant shall demonstrate that one pair of spectacles is sufficient to meet both distant and near visual requirements.

(ii) "N5" and "N14" refer to the size of typeface used.

(iii) Any applicant who needs near correction to meet this requirement will require "look-over," bifocal or perhaps multifocal lenses in order to read the instruments and a chart or manual held in the hand, and also to make use of distant vision, through the windscreen, without removing the lenses. Single-vision near correction (full lenses of one power only, appropriate for reading) significantly reduces distant visual acuity and is therefore not acceptable.

(iv) Whenever there is a requirement to obtain or renew correcting lenses, an applicant is expected to advise the refractionist of reading distances for the visual flight deck tasks relevant to the types of aircraft in which the applicant is likely to function.

(v) When near correction is required in accordance with this paragraph, a second pair of near-correction spectacles shall be kept available for immediate use.

(vi) The applicant shall be required to have normal fields of vision.

(vii) The applicant shall be required to have normal binocular function.

Note: Defective stereopsis, abnormal convergence not interfering with near vision, and ocular misalignment where the fusional reserves are sufficient to prevent asthenopia and diplopia may not be disqualifying.

(2) **Equipment and examination techniques.**

Near at 30–50 cms	Intermediate at 100 cms
Near Vision Acuity Test Chart N5	Near Vision Acuity Test Chart N14
Acceptable substitutes: AOC Site-Screener Bausch & Lomb Orthorator Keystone Orthoscope Keystone Telebinocular OPTEC 2000 Vision Tester Titmus Vision Tester	Acceptable substitutes: OPEC 2000 Vision Tester Titmus Vision Tester Titmus II Vision Tester (Model Nos. TII and TIIS) Titmus 2 Vision Tester (Model Nos. T2A and T2S) Others as approved

Near visual acuity and intermediate visual acuity, if the latter is required, are determined for each eye separately and for both eyes together. Test values are recorded both with and without corrective glasses/lenses when either are worn or required to meet the standards.

If the applicant is unable to meet the intermediate acuity standard unaided, he or she then is tested using each of the corrective lenses or glasses otherwise needed by that person to meet distant and/or near visual acuity standards. If the aided acuity meets the standard using any of the lenses or glasses, the findings are recorded, and the certificate appropriately limited. If an applicant has no lenses that bring intermediate and/or near visual acuity to the required standards, or better, in each eye, no certificate may be issued, and the applicant is referred to an eye specialist for appropriate visual evaluation and correction.

(3) **Medical disposition.**

When correcting glasses are required to meet the near vision standards, an appropriate limitation will be placed on the medical certificate. Contact lenses that correct only for near visual acuity are not considered acceptable for aviation duties. If the applicant meets the uncorrected near vision standard but already uses spectacles that correct the vision, it is recommended that the AAME enter the limitation for near vision corrective glasses on the certificate.

(i) **All classes.**

A. The appropriate wording for the near vision limitation is: “Holder shall possess glasses that correct for near vision.”

B. Possession only is required, because it may be hazardous to have distant vision obscured by the continuous wearing of reading glasses.

C. For multiple defective distant and near visual acuity when unifocal glasses or contact lenses are used and correct all defects, the appropriate limitation is: “Holder shall wear corrective lenses.”

D. For multiple vision defects involving distance and/or near visual acuity when more than one set of lenses is required to correct for all vision defects, the appropriate limitation is: “Holder shall wear lenses that correct for distant vision and possess glasses that correct for near vision.”

E. When near vision correction is required, a second pair of near-correction spectacles must be kept available for immediate use.

F. The appropriate wording for combined near and intermediate vision limitation is: “Holder shall possess glasses that correct for near and intermediate vision.”

(a) **Colour Vision (item 313.**

(313) *Colour perception*		
Pseudo-Isochromatic plates	Type:	
No of plates:	No of errors:	
Advanced colour perception testing indicated	Yes	No
Method: Colour SAFE ☐	Colour UNSAFE ☐	

(1) **All classes.**

Colour vision is the ability to perceive those colours necessary for the safe performance of airman/ATCO duties. The applicant must be tested for the ability to correctly identify a series

of pseudoisochromatic plates.

(2) **Examination equipment and techniques**.

Equipment	Test	Edition	Plates
Pseudoisochromatic plates	Test book should be held 76 cm from applicant. Plates should be illuminated by daylight or in artificial light of the same colour temperature such as that provided illuminants C or D65 as specified by the International Commission of Illumination (CIE) Only 3 seconds are allowed for the applicant to interpret and respond to a given plate		
American Optical Company [AOC]		1965	1–15
AOC-HRR		2nd	1–11
Dvorine		2nd	1–15
Ishihara		14 Plate	1–11
		24 Plate	1–15
		38 Plate	1–21
Richmond, 15-plates		1983	1–15

Note: The following are acceptable substitutes:

i. Color Assessment and Diagnostic (CAD) test, City University of London 1894

ii. the procedures for the Farnsworth Lantern, Farnsworth D-15, HUE

iii. 100 or OPTEC 900 Colour Vision Test; Keystone Orthoscope; Keystone Telebinocular; LKC Technologies, Inc.,

iv. APT-5 Colour Vision Tester; OPTEC 2000 Vision Tester (Model Nos. 2000PM, 2000PAME, and 2000PI); Titmus

v. Vision Tester; Titmus II Vision Tester (Model Nos. TII and TIIS); and the Titmus 2 Vision Tester (Model Nos. T2A and T2S) accompany the instructions.

(3) Medical disposition. An applicant does not meet the colour vision standard if testing reveals:

(i) **All classes.**

A. Seven or more errors on plates 1–15 of the AOC (1965 edition) pseudoisochromatic plates.

B. Any error in test plates 7–11 of AOC-HRR (second edition). Because the first 4 plates in the test book are for demonstration only, test plate 7 is actually the 11th plate in the book. (See instruction booklet.)

C. Seven or more errors on plates 1–15 of Dvorine pseudoisochromatic plates (second edition, 15-plates).

D. Six or more errors on plates 1–11 of the concise 14-plate edition of the Ishihara pseudoisochromatic plates. Seven or more errors on plates 1–15 of the 24-plate edition of Ishihara pseudoisochromatic plates. Nine or more errors on plates 1–21 of

the 38-plate edition of Ishihara pseudoisochromatic plates.

E. Seven or more errors on plates 1–15 of the Richmond (1983 edition) pseudoisochromatic plates.

F: Failed CAD test

(ii) **Certificate limitation.**

A. Class 2. If an applicant fails to meet the colour vision standard as interpreted above but is otherwise qualified, the AAME may issue a medical certificate bearing the limitation “Valid Daytime Only.”

B. Classes 1 and 3. An applicant failing to obtain a satisfactory result on the colour perception test must be assessed as unfit.
“Colour vision correcting” lens (e.g., X-Chrom). Such lens is unacceptable to the Authority as a means for correcting a pilot’s colour vision deficiencies.

(d) Field of Vision. (item 307)

Clinical Examination Check each item		Normal	Abnormal
(304) Eyes, External & Eyelids			
(305) Eyes Exterior (Slit lamp, opth.)			
(306) Eye position and movement			
(307) Visual fields (confrontation)			
(308) Pupillary reflexes			
(309) Fundi (Ophthalmoscopy)			
(310) Convergence	cm		
(311) Accommodation	D		

(1) **All classes.**

(i) Field of vision. No acute or chronic pathological condition of either eye or adnexa that interferes with the proper function of an eye that may reasonably be expected to progress to that degree or that may reasonably be expected to be aggravated by flying. Applicants must have normal fields of vision.

(2) **Examination equipment and techniques.**

(i) Fifty-inch square black matte surface wall target with centre white fixation point; 2- millimeter white test object on black-handled holder:

A. The applicant should be seated 1 meter from the target.

B. An occluder should be placed over the applicant's right eye.

C. The applicant should be instructed to keep the left eye focused on the fixation point.

D. The white test object should be moved from the outside border of the wall target toward the point of fixation on each of the eight 4-degree radials.

E. The result should be recorded on a worksheet as the number of inches from the fixation point at which the applicant first identifies the white target on each radial.

F. The test should be repeated with the applicant's left eye occluded and the right eye focusing on the fixation point.

(3) **Alternative techniques.**

(i) Standard perimeter. A standard perimeter may be used in place of the above procedure. With this method, any significant deviation from normal field configuration will require evaluation by an ophthalmologist.

(ii) Direct confrontation. This is the least acceptable alternative since this tests for peripheral vision and only grossly for field size and visual defects. The AAME, standing in front of the applicant, has the applicant look at the AAME's nose while advancing two moving fingers from slightly behind and to the side of the applicant in each of the four quadrants. Any significant deviation from normal requires ophthalmological evaluation.

(4) **Medical disposition.**

(i) Ophthalmological consultations. If an applicant fails to identify the target in any presentation at a distance of less than 58 centimetres from the fixation point, an ophthalmologist's evaluation must be requested. This is a requirement for all classes of certification. The AAME should provide a detailed Consultant Ophthalmologist report (to include but not limited to OCT, CVR, Fuduscopy, IOP and VA) if glaucoma is suspected.

(ii) Glaucoma. The Authority may grant an Authorisation under the special issuance section of this guide on an individual basis. The AAME can facilitate Authority review by obtaining a detailed Consultant Ophthalmologist report.
If considerable disturbance in night vision is documented, the Authority may limit the medical certificate: "Not Valid for Night Flying."

(iii) Other pathological conditions.

(1) **Classes 1 and 3**. Bifoveal fixation and vergence-phoria relationship sufficient to prevent a break in fusion under conditions that may reasonably be expected to occur in performing airman/ATCO duties. Tests for the factors named in this paragraph are not required except for persons found to have more than 1 prism diopter of hyperphoria, 6 prism dioptres of esophoria, or 6 prism dioptres of exophoria. If

any of these values are exceeded, the Authority may require the person to be examined by a qualified eye specialist to determine if there is bifoveal fixation and an adequate vergence-phoria relationship.

(2) Examination equipment and techniques.

(i) Equipment.

A. Red Maddox rod with handle.

B. Horizontal prism bar with graduated prisms beginning with 1 prism dioptre and increasing in power to at least eight prism dioptres.

C. Acceptable substitutes:

AOC Site-Screener	Maddox rod and individual prisms
Bausch & Lomb	Maddox rod and Risley rotary prism
Orthorator	OPTEC 2000 Vision Tester
Keystone Orthoscope	OPTEC 900 Vision Tester
Keystone Telebinocular	Titmus Vision Tester

(ii) Examination techniques.

A. Test procedures to be used accompany the instruments. If the AAME needs specific instructions for use of the horizontal prism bar and red Maddox rod, these may be obtained from the Authority.

(3) **Medical disposition.**

(i) Class 1 and 3. If an applicant exceeds the heterophoria standards (1-prism dioptre of hyperphoria, 6-prism dioptres of esophoria, or 6-prism dioptres of exophoria), but shows no evidence of diplopia or serious eye pathology and all other aspects of the examination are favourable, the AAME should not withhold or deny the medical certificate. The applicant should be advised that the Authority may require further examination by a qualified eye specialist.

(ii) Class 2. Applicants are not required to undergo heterophoria testing. However, if an applicant has strabismus or a history of diplopia, the AAME should defer issuance of a certificate and forward the application to the Authority. If the applicant wishes further consideration, the AAME can help expedite Authority review by providing a detailed Consultant Ophthalmologist report.

4.0 BLOOD PRESSURE (ITEM 6 IN FORM: O-MED 004)

<table>
<tr><td rowspan="2">(A) Examination Category
Initial ☐
Renewal/Reval. ☐
Extended ☐</td><td>(2) Height (cm)</td><td>(3) Weight (Kg)</td><td rowspan="2">(4) Eye Color</td><td rowspan="2">(5) Hair Color</td><td colspan="2">(6) Blood Pressure – Seated (mmHg)</td><td colspan="2">(7) Pulse - resting</td></tr>
<tr><td colspan="2">Body Mass Index (BMI) =</td><td>Systolic</td><td>Diastolic</td><td>Rate</td><td>Rhythm</td></tr>
</table>

(a) **All classes.**

(1) The systolic and diastolic blood pressures must be within normal limits. No other organic, functional, or structural disease, defect, or limitation that the Authority, based on the case history and appropriate, qualified medical judgement relating to the condition involved, finds:

(i) Makes the person unable to safely perform the duties or exercise the privileges of the airman/ATCO certificate applied for or held, or

(ii) May reasonably be expected, for the maximum duration of the airman/ATCO medical certificate applied for or held, to make the person unable to perform those duties or exercise those privileges.

(2) No medication or other treatment that the Authority, based on the case history and appropriate, qualified medical judgement relating to the medication or other treatment involved finds:

(i) Makes the person unable to safely perform the duties or exercise the privileges of the airman/ATCO certificate applied for or held, or

(ii) May reasonably be expected, for the maximum duration of the airman/ATCO medical certificate applied for or held, to make the person unable to perform those duties or exercise those privileges.

(3) Measurement of blood pressure is an essential part of the Authority medical certification examination. The average blood pressure while sitting should not exceed 155-mm mercury systolic and 95-mm mercury diastolic maximum pressure for all classes. A medical assessment is specified for all applicants who need or use antihypertensive medication to control blood pressure.

(b) Examination techniques. In accordance with accepted clinical procedures, routine blood Pressure should be taken with the applicant in the seated position. An applicant should not be denied or deferred Class 1, 2, or 3 certification unless subsequent recumbent blood pressure readings exceed those contained in this guide. Any conditions that may adversely affect the validity of the blood pressure reading should be noted.

(c) Medical disposition.

(1) Examining options.

(i) An applicant whose pressures are within the above limits, who has not used antihypertensives for 30 days and who is otherwise qualified should be issued a medical certificate by the AAME.

(ii) An applicant whose blood pressure is slightly elevated beyond the Authority specified limits, may, at the AAME's discretion, have a series of three daily readings over a 7-day period. If the indication of hypertension remains, even if it is mild or intermittent, the AAME should defer certification and submit the application to the Authority with a note of explanation.

(iii) The AAME must defer issuance of a medical certificate to any applicant whose hypertension has not been evaluated, who uses unacceptable medications, whose medical status is unclear, whose hypertension is uncontrolled, who manifests

significant adverse effects of medication, or whose certification has previously been specifically reserved to the Authority.

(2) Initial and follow-up evaluation for hypertensives under treatment.

5.0 PULSE (ITEM 7 IN FORM: O-MED 004)

<table>
<tr><td rowspan="2">(A) Examination Category
Initial ☐
Renewal/Reval. ☐
Extended ☐</td><td>(2) Height (cm)</td><td>(3) Weight (Kg)</td><td rowspan="2">(4) Eye Color</td><td rowspan="2">(5) Hair Color</td><td colspan="2">(6) Blood Pressure – Seated (mmHg)</td><td colspan="2">(7) Pulse - resting</td></tr>
<tr><td colspan="2">Body Mass Index (BMI) =</td><td>Systolic</td><td>Diastolic</td><td>Rate</td><td>Rhythm</td></tr>
</table>

The medical standards do not specify pulse rates that are disqualifying for medical certification, per se. These tests are used, however, to determine the status and responsiveness of the cardiovascular system. Abnormal pulse rates may be reason to conduct additional cardiovascular system evaluations.

(a) **Examination techniques.** The pulse rate is determined with the individual relaxed in a sitting position.

(b) Medical disposition. If there is bradycardia, tachycardia, or arrhythmia, further evaluation is warranted and deferral may be indicated. A cardiac evaluation may be needed to determine the applicant's qualifications. Temporary stresses or fever may, at times, result in abnormal pulse readings. If the AAME believes this to be the case, the applicant should be given a few days to recover and then be retested. If this is not possible, the AAME should defer issuance, pending further evaluation.

6.0 URINALYSIS (ITEM 35 IN FORM: O-MED 004)

<table>
<tr><td>(35) Urinalysis</td></tr>
<tr><td>
<table>
<tr><td>Glucose</td><td>Protein</td><td>Blood</td><td>Others</td></tr>
</table>
</td></tr>
<tr><td>(49) Comments, restriction, Limitations:</td></tr>
</table>

(a) **All classes.**

(1) No established medical history or clinical diagnosis of diabetes mellitus that requires insulin or any other hypoglycaemic drug for control.

(2) No other organic, functional, or structural disease, defect, or limitation that the Authority, based on the case history and appropriate, qualified medical judgement relating to the condition involved, finds:

(i) Makes the person unable to safely perform the duties or exercise the privileges of the airman/ATCO certificate applied for or held, or

(ii) May reasonably be expected, for the maximum duration of the airman/ATCO medical certificate applied for or held, to make the person unable to perform those duties or exercise those privileges

(b) **Examination techniques**. Any standard laboratory procedures are acceptable for these tests.

(c) Medical disposition.

(1) Glycosuria or proteinuria is cause for deferral of medical certificate issuance until additional studies/investigations determine the status of the endocrine and/or urinary systems. If the glycosuria has been determined not to be due to carbohydrate intolerance, the AAME may issue the certificate. Trace or 1+ proteinuria in the absence of a history of renal disease is not cause for denial.

(2) The AAME may request additional urinary tests when they are indicated by history or examination. These should be reported on FORM: O-MED 004 or attached to the form as an addendum.

7.0 ECG DATE ((ITEM 39 IN FORM: O-MED 004)

Accompanying Reports

	Not performed	Normal	Abnormal
(39) ECG			
(40) Audiogram			
(41) Ophthalmology			
(42) ORL (ENT)			
(43) Chest X-ray			
(44) Blood lipids			
(45) Pulmonary Function			
(46) EEG			
(47) Others			

(a) All persons applying for medical certification must demonstrate an absence of myocardial infarction and other clinically significant abnormality on an electrocardiographic exam as follows:

(a) Class 1 medical certificate

(1) At the first application for a licence

(2) Every 2 years at the reexamination of applicants between the ages of 30 and 50

(3) On an annual basis after reaching the 50th birthday

(b) Class 2 Medical certificate:

(1) At first application for a licence

(2) At 40 years of age

(3) Then at 50 years of age then Two (2) yearly thereafter

(c) Class 3 Medical certificate:

(1) At first application for a licence

(2) Then at 50 years, then Two (2) yearly thereafter.

Note: All applicants for certification may be required to provide ECGs when indicated by history or physical examination.

(b) Examination techniques.

(1) Date. The date of the most recent ECG shall be entered in Item XX on FORM: AC-AMD002B of the Medical Assessment Report.

(i) If an applicant is due for a periodic ECG, the AAME performs and sends a current tracing according to established procedures.

(ii) If an applicant is not required to have a periodic ECG with the current examination, the AAME should record the date of the preceding ECG in item XX on FORM: AC-AMD002B of the Medical Assessment Report.

(iii) The purpose of routine electrocardiography is case finding. It does not provide sufficient evidence to justify disqualification without further thorough cardiovascular investigation.

(2) **Currency.**

(i) In order to meet regulatory requirements, an applicant's periodic ECG must have been performed and submitted along with the applicable periodic medical examination report. The Authority verifies currency of all periodic ECGs.

(ii) There is no provision for issuance of a medical certificate based upon a promise that an ECG will be obtained at a future date. In such circumstances, the AAME should defer issuance and submit the completed application form to the Authority.

(3) **Interpretation.**

(i) All ECGs required to establish eligibility for medical certification must be forwarded for interpretation to the Authority. This does not preclude submission of an interpretation by or through the AAME.

(ii) Interpretation is accomplished by the Medical Assessor and or Consultant cardiologists acceptable to the Authority. Abnormalities are investigated to determine their significance, if any.

(4) Technique and reporting format for required ECGs.

(i) The Authority also will accept 3-channel or 12-channel strips uncut or mounted on standard mounting paper. The following steps are essential to expedite processing of these tracings:

A. All leads must be properly identified

B. Applicant and AAME identification must be complete and the tracing must be dated

(ii) Provide a resting tracing. Tracings must be stapled to the ECG report form to ensure that all leads are appropriately coded and interpreted.

8.0 OTHER TESTS GIVEN

(a) **All classes**.

(1) Whenever the Authority finds that additional medical information or history is necessary to determine whether an applicant for or the holder of a medical certificate meets the medical standards for it, the Authority requests that person to furnish that information or to authorise any clinic, hospital, physician, or other person to release to the Authority all available information or records concerning that history. If the applicant or holder fails to provide the requested medical information or history or to authorise the release so requested, the Authority may suspend, modify, or revoke all medical certificates the airman/ATCO holds or may, in the case of an applicant, deny the application for an airman/ATCO medical certificate.

(2) If an airman/ATCO medical certificate is suspended or modified under those conditions, that suspension or modification remains in effect until the requested information, history, or authorisation is provided to the Authority and until the Authority determines whether the person meets the medical standards under this part.

(b) Examination techniques. Additional medical information may be furnished through additional history taking, further clinical examination procedures, and supplemental laboratory procedures.

(1) On rare occasions, even surgical procedures such as biopsies may be indicated. As a designee of the Authority, when an AAME determines that there is a need for additional medical information, based upon history and findings, the AAME is authorised to request prior hospital and outpatient records and to request supplementary examinations including laboratory testing and examinations by appropriate medical specialists. The AAME should discuss the need with the applicant. The applicant should be advised of the types of additional examinations required and the type of medical specialist to be consulted. Responsibility for ensuring that these examinations are forwarded and that any charges or fees are paid will rest with the applicant. All reports should be forwarded to the Authority.

(2) Whenever, in the AAME's opinion, medical records are necessary to evaluate an applicant's medical fitness, the AAME should request that the applicant sign an authorisation for the for the Release of Medical Information to the Authority. The AAME should forward this authorisation to the custodian of the applicant's records so that the information contained in the record may be obtained for attachment to the report of medical examination.

9.0 COMMENTS ON HISTORY AND FINDINGS (ITEM 49 OF FORM: O-MED 004)

Comments on history and findings: The aviation medical AAME (AAME) shall comment on all "yes" answers in the medical history section and for abnormal findings of the examination. (Attach all consultation reports, ECGs, Xrays, etc., to this report before submitting the Medical Examination report to the Authority.

Comments on all positive history or medical examination findings must be reported by item number. Item 49 of FORM: O-MED 004 provides the AAME an opportunity to report observations, comments and/or findings that are not asked for on the application form and Medical Examination Report form. Concern about the applicant's behaviour, abnormal situations arising during the examination, unusual findings, unreported history,

and other information thought germane to aviation safety should be reported in Item 49 of FORM: O-MED 004. The AAME should record the name, dosage, frequency, and purpose of all currently used medications. If possible, all ancillary reports, such as consultations, ECGs, X-ray release forms, and hospital or other treatment records, should be attached. If the delay for those items would exceed 14 days, the AAME should forward all available data to the Authority, with a note specifying what additional information is being prepared for submission at a later date. AAMEs may submit additional details an information to the Authority on the applicant using their official letter head paper.

10.0 HAS BEEN ISSUED (ITEM 48 OF FORM: O-MED 004)

(48) Aviation medical examiner's recommendations:

Name of applicant: .....
☐ Fit Class.....
☐ Medical Certificate issued Class.....
☐ Unfit Class.....
☐ Deferred for further evaluation? Yes, why and to whom?

The AAME must check the proper box to indicate if FORM: O-MED 004 has been issued. If denied, a copy of FORM: O-MED 015, Notice of Denial of Medical Certificate, should be forwarded to the Authority.

(a) Applicant's refusal. When advised by an AAME that further examination and/or medical records are needed, the applicant may elect not to proceed. The AAME should note this on FORM: O-MED 001. No certificate should be issued, and the AAME should forward the application form to the Authority, even if the application is incomplete.

(b) Anticipated delay. When the AAME anticipates a delay of more than 14 days obtaining records or reports concerning additional examinations, the completed FORM: O-MED 001 should be submitted to the Authority with a note stating that additional information will follow. No medical certificate should be issued.

(c) Issuance. When the AAME receives all the supplemental information requested and finds that the applicant meets all the Authority medical standards for the class sought, the AAME should issue a medical assessment for the applicable class of medical certificate.

(d) Deferral. If upon receipt of the information, the AAME finds that there is a need for even more information or there is uncertainty about the significance of the findings, certification should be deferred. The AAME's concerns should be noted on FORM: O-MED 001 and the application should be transmitted to the Authority for further consideration.

If the applicant decides at this point to abandon the application for a medical certificate, the AAME should also note this on FORM: O-MED 001 and mail the incomplete form to the Authority. An incomplete form should not be transmitted to the Authority for further consideration.

(e) Denial. When the AAME concludes that the applicant is clearly ineligible for certification, the applicant should be denied, using FORM: O-MED 015. Use of this form will provide the applicant with the reason for the denial and refer the applicant to the appeal rights and procedures listed in Section 1.20 of this guide. (See Section 1.8, Medical Certification Decision Making, and Section 1.9, Discretionary Issuance, of this guide.)

11.0 DISQUALIFYING DEFECTS (ITEM 6 OF FORM: O-MED 015)

6. **Disqualifying conditions**
Assessment of your application form and medical examination caried out on the above date reveal that you do not meet the medical requirements stated in Nig.CARs Part 2 for a medical assessment/certificate (class as stated above) because of the condition(s) stated above. Accordingly, your application for a medical certificate (class as above) is hereby denied. I have personally interviewed and examined this applicant and deem his/her medical condition unsatisfactory for issuance of the medical certificate being sought. The Applicant may wish to apply within Seven (7) days from the date of this denial to the Director General of Civil Aviation (DGCA), Nigeria Civil Aviation Authority NCAA Corporate Headquarters, Nnamdi Azikiwe International Airport, Abuja, F.C.T. Nigeria, for a review.
7. **Signature of Authorised Aviation Medical Examiner** 8. **Date:**

List all disqualifying defects, diagnoses, or conditions by item number that serve as the basis for denial or deferral in Item. Comments or discussion of specific observations or findings may be reported in Item 6 of FORM: O-MED 015 or submitted on a separate sheet of paper. If the AAME denies the applicant, the AAME must issue FORM: O-MED 015 to the applicant and report the issuance of the denial in Item 48 of FORM: O-

MED 004.

12.0 MEDICAL AAME'S DECLARATION (ITEM 50 OF FORM: O-MED 004)

(50) Medical examiner's declaration:

I hereby certify that I have personally examined the applicant named on this medical examination report and that this report with any attachment embodies my findings completely and correctly.		
(51) Place and date:	Examiner's Name and Address (Block Capitals)	AAME Stamp with AAME No.
Authorized Medical Examiner's Signature	Telephone No:. Telefax No.	

The date of examination and the AAME's name and complete address must be clearly written. The AAME must personally sign the completed form. The AAME's serial number and address should be entered in the blocks provided. The Authority designates specific individuals as AAMEs, and this status may not be further delegated to a physician who may be covering the designee's practice. The Authority require that the AAME sign the AAME's copy of the application form as a witness.

CHAPTER 5

MEDICAL REQUIREMENTS

1.0 NIG. CARS 2.11.2.6. CLASS 1 MEDICAL CERTIFICATE

(a) CERTIFICATE ISSUE AND RENEWAL.

(1) An applicant for a CPL, an MPL, or an ATPL shall undergo an initial medical examination for the issue of a Class 1 medical certificate.

(2) Except where otherwise stated in this subpart, the holder of a CPL, an MPL, or an ATPL shall have his or her Class 1 medical certificate renewed at intervals not exceeding those specified below.A Class 1 medical certificate will be issued when the applicant complies with the requirements of this part.

(b) PHYSICAL AND MENTAL REQUIREMENTS.

(1) The applicant shall not suffer from any disease or disability which could render that applicant likely to become suddenly unable either to operate an aircraft safely or to perform assigned duties safely.

(2) The applicant shall have no established medical history or clinical diagnosis of any of the following such as might render the applicant unable to safely exercise the privileges of the licence applied for or held:

(i) An organic mental disorder;

(ii) A mental or behavioural disorder, due to the use of psychoactive substances, that induces dependence syndrome induced by alcohol or other psychoactive substances;

(iii) Schizophrenia or a schizotypal or delusional disorder;

(iv) A mood (affective) disorder;

(v) A neurotic, stress-related, or somatoform disorder;

(vi) A disorder of adult personality or behaviour, particularly if manifested by repeated overt acts;

(vii) Mental retardation;

(viii) A disorder of psychological development;

(ix) A behavioural or emotional disorder, with onset in childhood or adolescence; or

(x) A mental disorder not otherwise specified.

(A) An applicant with depression, being treated with antidepressant medication, shall be assessed as unfit unless the medical assessor, having access to the details of the case concerned, considers the applicant's condition as unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

(3) The applicant shall have no established medical history or clinical diagnosis of any of the following:

(i) A progressive or nonprogressive disease of the nervous system, the effects of which, according to accredited medical conclusion, are likely to interfere with the safe exercise of the applicant's licence and rating privileges;

(ii) Epilepsy; or

(iii) Any disturbance of consciousness without satisfactory medical explanation of cause.

(4) An applicant who has suffered any head injury, the effects of which, according to Accredited medical conclusion, are likely to interfere with the safe exercise of the applicant's licence and rating privileges, shall be assessed as unfit.

(5) An applicant shall not possess any abnormality of the heart, congenital or acquired, that is likely to interfere with the safe exercise of the applicant's licence and rating privileges. A history of proven myocardial infarction shall be disqualifying.

(6) An applicant who has undergone coronary bypass grafting or angioplasty (with or without stenting) or other cardiac intervention or who has a history of myocardial infarction or who suffers from any other potentially incapacitating cardiac condition shall be assessed as unfit unless the applicant's cardiac condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(7) An applicant with an abnormal cardiac rhythm shall be assessed as unfit unless the cardiac arrhythmia has been investigated and evaluated in accordance with the safe exercise of the applicant's licence or rating privileges.

(8) Electrocardiography shall form part of the heart examination for the first issue of a medical certificate.

(9) Electrocardiography shall be included in re-examinations of applicants between the age of 30 and 50 no less frequently than every two years.

Note 1: The purpose of routine electrocardiography is case finding. It does not provide sufficient evidence to justify disqualification without further thorough cardiovascular investigation.

(10) The systolic and diastolic blood pressures shall be within normal limits.

(11) The use of drugs for control of high blood pressure is disqualifying except for those drugs, the use of which, is compatible with the safe exercise of the applicant's licence and rating privileges.

(12) There shall be no significant functional or structural abnormality of the circulatory system.

(13) There shall be no acute disability of the lungs or any active disease of the structures of the lungs, mediastinum, or pleura likely to result in incapacitating symptoms during normal or emergency operations.

(14) Radiography shall form a part of the initial chest examination.

Note: Periodic chest radiography is usually not necessary but may be a necessity in situations where asymptomatic pulmonary disease can be expected.

(15) An applicant with chronic obstructive pulmonary disease shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(16) An applicant with asthma causing significant symptoms or likely to cause incapacitating symptoms during normal or emergency operations shall be assessed as unfit.

(17) The use of drugs for control of asthma shall be disqualifying except for those drugs the use of which is compatible with the safe exercise of the applicant's licence and rating privileges.

(18) An applicant with active pulmonary tuberculosis shall be assessed as unfit.

(19) An applicant with quiescent or healed lesions which are known to be tuberculous, or are presumably tuberculous in origin, may be assessed as fit.

(20) An applicant with significant impairment of the function of the gastrointestinal tract or its adnexa shall be assessed as unfit.

(21) An applicant shall be completely free from those hernias that might give rise to incapacitating symptoms.

(22) An applicant with sequela of disease of, or surgical intervention on, any part of the digestive tract or its adnexa, likely to cause incapacity in flight, in particular, any obstructions due to stricture or compression, shall be assessed as unfit.

(23) An applicant who has undergone a major surgical operation on the biliary passages or the digestive tract or its adnexa, with a total or partial excision or a diversion of any of these organs shall be assessed as unfit until such time as the medical assessor having access to the details of the operation concerned considers that the effects of the operation are not likely to cause incapacity in flight.

(24) An applicant with metabolic, nutritional, or endocrine disorders likely to interfere with the safe exercise of the applicant's licence and rating privileges shall be assessed as unfit.

(25) An applicant with insulin-treated diabetes mellitus shall be assessed as unfit.

(26) An applicant with non-insulin-treated diabetes mellitus shall be assessed as unfit unless the condition is shown to be satisfactorily controlled by diet alone or by diet combined with oral anti-diabetic medication, the use of which is compatible with the safe exercise of the applicant's licence and rating privileges.

(27) An applicant with diseases of the blood and/or the lymphatic system shall be assessed as unfit

unless adequately investigated and the applicant's condition is found unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.
Note: Sickle cell trait or other haemoglobinopathic traits are usually compatible with a fit assessment.

(28) An applicant with renal or genitourinary disease shall be assessed as unfit unless adequately investigated and the applicant's condition is found unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

(29) Urine examination shall form part of the medical examination and abnormalities shall be adequately investigated.

(30) An applicant with sequelae of disease of, or surgical procedures on the kidneys or the genitourinary tract, in particular, any obstructions due to stricture or compression, shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(31) An applicant who has undergone nephrectomy shall be assessed as unfit unless the condition is well compensated.

(32) An applicant who is seropositive for HIV shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed as not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(33) Applicants with gynaecological disorders that are likely to interfere with the safe exercise of their licence and rating privileges shall be assessed as unfit.

(34) An applicant who is pregnant shall be assessed as unfit unless obstetrical evaluation and continued medical supervision indicate a low-risk, uncomplicated pregnancy.

(35) For applicants with a low-risk uncomplicated pregnancy, evaluated and supervised in accordance with the provisions of this subpart, the fit assessment period shall be limited from the end of the 12th week until the end of the 26th week of gestation.

(36) Following confinement or termination of pregnancy, the applicant shall not be permitted to exercise the privileges of her licence until she has undergone re-evaluation in accordance with best medical practice and has been assessed as fit to safely exercise the privileges of her licence and ratings.

(37) The applicant shall not possess any abnormality of the bones, joints, muscles, tendons, or related structures that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

Note: Any sequelae after lesions affecting the bones, joints, muscles, or tendons, and certain anatomical defects will normally require functional assessment to determine fitness.

(38) The applicant shall not possess any abnormality or disease of the ear or related structures that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(39) There shall be:

(iv) No disturbance of vestibular function;

(v) No significant dysfunction of the Eustachian tubes; and

(vi) No unhealed perforation of the tympanic membranes.

(40) A single dry perforation of the tympanic membrane need not render the applicant unfit.

(41) There shall be no nasal obstruction and no malformation nor disease of the buccal cavity or upper respiratory tract that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(42) An applicant with stuttering or other speech defects sufficiently severe to cause impairment of speech communication shall be assessed as unfit.

(c) VISUAL REQUIREMENTS.

(1) The function of the eyes and their adnexae shall be normal. There shall be no active pathological condition, acute or chronic, or any sequelae of surgery or trauma of the eyes or their adnexae likely to reduce proper visual function to an extent that would interfere with the safe exercise of the applicant's licence and rating privileges.

(2) Distant visual acuity with or without correction shall be 6/9 or better in each eye separately, and binocular visual acuity shall be 6/6 or better. No limits apply to uncorrected visual acuity. Where this standard of visual acuity can be obtained only with correcting lenses, the applicant may be assessed as fit provided that:

(i) Such correcting lenses are worn during the exercise of the privileges of the licence or rating applied for or held; and

(ii) In addition, a pair of suitable correcting spectacles is kept readily available during the exercise of the privileges of the applicant's licence.

Note: An applicant accepted as meeting these provisions is deemed to continue to do so unless there is reason to suspect otherwise, in which case an ophthalmic report is required at the discretion of the Authority. Both uncorrected and corrected visual acuity are normally measured and recorded at each reexamination. Conditions which indicate a need to obtain an ophthalmic report include: a substantial decrease in the uncorrected visual acuity, any decrease in best-corrected visual acuity, and the occurrence of eye disease, eye injury, or eye surgery.

(3) An applicant may use contact lenses to meet the requirement of paragraph 2.11.2.6(c)(2) of this subsection, provided that:

(i) The lenses are monofocal and non-tinted;

(ii) The lenses are well tolerated; and

(iii) A pair of suitable correcting spectacles is kept readily available during the exercise of the licence privileges.

Note: Applicants who use contact lenses may not need to have their uncorrected visual acuity measured at each reexamination provided the history of their contact lens prescription is known.

(4) An applicant with a large refractive error shall use contact lenses or high-index spectacle lenses.

Note: If spectacles are used, high-index lenses are needed to minimise peripheral field distortion.

(5) An applicant whose uncorrected distant visual acuity in either eye is worse than 6/60 shall be required to provide a full ophthalmic report prior to the initial medical certificate and every 5 years thereafter.

Note 1: The purpose of the required ophthalmic examination is 1) to ascertain normal visual performance and 2) to identify any significant pathology.

(6) An applicant who has undergone surgery affecting the refractive status of the eye shall be assessed as unfit unless the applicant is free from those sequelae which are likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(7) An applicant shall have the ability to read, while wearing the correcting lenses, if any, the N5 chart or its equivalent at a distance selected by that applicant in the range of 30 to 50 cm and the ability to read the N14 chart or its equivalent at a distance of 100 cm. If this requirement is met only by the use of near correction, the applicant may be assessed as fit provided that this near correction is added to the spectacle correction already prescribed in accordance with this paragraph; if no such correction is prescribed, a pair of spectacles for near use shall be kept readily available during the exercise of the privileges of the licence. When near correction is required, the applicant shall demonstrate that one pair of spectacles is sufficient to meet both distant and near visual requirements.

Note 1: Any applicant who needs near correction to meet this requirement will require "look-over," bifocal, or perhaps multifocal lenses in order to read the instruments and a chart or manual held in the hand, and also to make use of distant vision, through the windscreen, without removing the lenses. Single-vision near correction (full lenses of one power only, appropriate for reading) significantly reduces distant visual acuity and is therefore not acceptable.

Note2: Whenever there is a requirement to obtain or renew correcting lenses, an applicant is expected to advise the refractionist of reading distances for the visual flight deck tasks relevant to the types of aircraft in which the applicant is likely to function.

(8) When near correction is required in accordance with paragraph 2.11.2.6(c) of this subsection, a second pair of near-correction spectacles shall be kept available for immediate use.

(9) The applicant shall be required to have normal fields of vision.

(10) The applicant shall be required to have normal binocular function.

(11) Reduced stereopsis, abnormal convergence not interfering with near vision, and ocular misalignment where the fusional reserves are sufficient to prevent asthenopia and diplopia may not be disqualifying.

(d) HEARING REQUIREMENTS.

(1) The applicant shall be tested by pure-tone audiometry:

(i) At the initial medical examination;

(ii) At least once every 5 years up to the age of 40 years; and

(iii) At least once every 2 years after the age of 40 years.

(2) An applicant shall not have a hearing loss, in either ear separately, of more than 35 dB at any of the frequencies 500, 1 000, or 2 000 Hz, or more than 50 dB at 3 000 Hz. However, an applicant with a hearing loss greater than the above may be declared fit provided that:

(iv) The applicant has a hearing performance in each ear separately equivalent to that of a normal person, against a background noise that will simulate the masking properties of flight deck noise upon speech and beacon signals; and

(v) Where audiometry is not performed, the applicant has the ability to hear an average conversational voice in a quiet room, using both ears, at a distance of 2 m from the examiner, with the back turned to the examiner.

(3) Alternatively, a practical hearing test conducted in flight in the flight deck of an aircraft of the type for which the applicant's licence and ratings are valid may be used.

2.0 NIG.CARS 2.11.2.7. CLASS 2 MEDICAL CERTIFICATE

(a) CERTIFICATE ISSUE AND RENEWAL.

1. An applicant for a PPL, FE and Cabin Crew licence shall undergo an initial medical examination for the issue of a Class 2 medical certificate.

2. Except where otherwise stated in this subpart, holders of a PPL, FE and Cabin Crew licence shall have their Class 2 medical certificate renewed at intervals not exceeding those specified in this subpart.

3. A Class 2 medical certificate will be issued when the applicant complies with the requirements of this part.

(b) PHYSICAL AND MENTAL REQUIREMENTS.

1. The applicant shall not suffer from any disease or disability which could render that applicant likely to become suddenly unable either to operate an aircraft safely or to perform assigned duties safely.

2. The applicant shall have no established medical history or clinical diagnosis of any of the following such as might render the applicant unable to safely exercise the privileges of the licence applied for or held:

(i) An organic mental disorder;

(ii) A mental or behavioural disorder due to the use of psychoactive substances; this

includes dependence syndrome induced by alcohol or other psychoactive substances;

(iii) Schizophrenia or a schizotypal or delusional disorder;

(iv) A mood (affective) disorder;

(v) A neurotic, stress-related, or somatoform disorder;

(vi) A disorder of adult personality or behaviour, particularly if manifested by repeated overt acts;

(vii) Mental retardation;

(viii) A disorder of psychological development;

(ix) A behavioural or emotional disorder, with onset in childhood or adolescence; or

(x) A mental disorder not otherwise specified.

3. An applicant with depression, being treated with antidepressant medication, shall be assessed as unfit unless the medical assessor, having access to the details of the case concerned, considers the applicant's condition as unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

4. The applicant shall have no established medical history or clinical diagnosis of any of the following:

(i) A progressive or nonprogressive disease of the nervous system, the effects of which, according to accredited medical conclusion, are likely to interfere with the safe exercise of the applicant's licence and rating privileges;

(ii) Epilepsy; or

(iii) Any disturbance of consciousness without satisfactory medical explanation of cause.

(5) An applicant who has suffered any head injury, the effects of which, according to accredited medical conclusion, are likely to interfere with the safe exercise of the applicant's licence and rating privileges, shall be assessed as unfit.

(6) The applicant shall not possess any abnormality of the heart, congenital or acquired, that is likely to interfere with the safe exercise of the applicant's licence and rating privileges. A history of proven myocardial infarction shall be disqualifying.

(7) An applicant who has undergone coronary bypass grafting or angioplasty (with or without stenting) or other cardiac intervention or who has a history of myocardial infarction or who suffers from any other potentially incapacitating cardiac condition shall be assessed as unfit unless the applicant's cardiac condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(8) An applicant with an abnormal cardiac rhythm shall be assessed as unfit unless the cardiac arrhythmia has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating

privileges.

(9) Electrocardiography shall form part of the heart examination for the first issue of a medical certificate:

(i) After the age of 40; and

(ii) In reexaminations every 2 years after the age of 50.

Note 1: The purpose of routine electrocardiography is case finding. It does not provide sufficient evidence to justify disqualification without further thorough cardiovascular investigation.

(10) The systolic and diastolic blood pressures shall be within normal limits.

(11) The use of drugs for control of high blood pressure is disqualifying except for those drugs, the use of which, is compatible with the safe exercise of the applicant's licence and rating privileges.

(12) There shall be no significant functional or structural abnormality of the circulatory system.

(13) There shall be no acute disability of the lungs or any active disease of the structures of the lungs, mediastinum, or pleura likely to result in incapacitating symptoms during normal or emergency operations.

(i) Radiography shall form a part of the initial chest examination.

(14) An applicant with chronic obstructive pulmonary disease shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(15) An applicant with asthma causing significant symptoms or likely to cause incapacitating symptoms during normal or emergency operations shall be assessed as unfit.

(16) The use of drugs for control of asthma shall be disqualifying except for those drugs the use of which is compatible with the safe exercise of the applicant's licence and rating privileges.

(17) An applicant with active pulmonary tuberculosis shall be assessed as unfit.

(18) An applicant with quiescent or healed lesions which are known to be tuberculous, or are presumably tuberculous in origin, may be assessed as fit.

(19) An applicant with significant impairment of the function of the gastrointestinal tract or its adnexae shall be assessed as unfit.

(20) The applicant shall be completely free from those hernias that might give rise to incapacitating symptoms.

(21) An applicant with sequelae of disease of, or surgical intervention on any part of the digestive tract or its adnexae, likely to cause incapacitation in flight, in particular any obstructions due to stricture or compression, shall be assessed as unfit.

(22) An applicant who has undergone a major surgical operation on the biliary passages or the

digestive tract or its adnexae, with a total or partial excision or a diversion of any of these organs, shall be assessed as unfit until such time as the medical assessor, having access to the details of the operation concerned considers that the effects of the operation are not likely to cause incapacitation in flight.

(23) An applicant with metabolic, nutritional, or endocrine disorders that are likely to interfere with the safe exercise of the applicant's licence and rating privileges shall be assessed as unfit.

(24) An applicant with insulin-treated diabetes mellitus shall be assessed as unfit.

(25) An applicant with non-insulin-treated diabetes mellitus shall be assessed as unfit unless the condition is shown to be satisfactorily controlled by diet alone or by diet combined with oral anti-diabetic medication, the use of which is compatible with the safe exercise of the applicant's licence and rating privileges.

(26) An applicant with diseases of the blood and/or the lymphatic system shall be assessed as unfit unless adequately investigated and the condition is found unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

Note: Sickle cell trait or other haemoglobinopathic traits are usually compatible with a fit assessment.

(27) An applicant with renal or genitourinary disease shall be assessed as unfit unless adequately investigated and their condition found unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

(28) Urine examination shall form part of the medical examination and abnormalities shall be adequately investigated.

(29) An applicant with sequelae of disease or surgical procedures on the kidneys or the genitourinary tract, in particular, any obstructions due to stricture or compression, shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(30) An applicant who has undergone nephrectomy shall be assessed as unfit unless the condition is well compensated.

(31) An applicant who is seropositive for HIV shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed as not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

Note 1: Early diagnosis and active management of HIV disease with antiretroviral therapy reduces morbidity and improves prognosis and thus increases the likelihood of a fit assessment.

(32) An applicant who is pregnant shall be assessed as unfit unless obstetrical evaluation and continued medical supervision indicate a low-risk, uncomplicated pregnancy.

(33) For an applicant with a low-risk, uncomplicated pregnancy, evaluated and supervised in accordance with paragraph 2.11.2.7(b)(32) of this subsection, the fit assessment shall be limited to the period from the end of the 12th week until the end of the 26th week of gestation.

(34) Following confinement or termination of pregnancy, the applicant shall not be permitted to exercise the privileges of her licence until she has undergone re-evaluation in accordance with best medical practice and has been assessed as fit to safely exercise the privileges of her licence and ratings.

(35) The applicant shall not possess any abnormality of the bones, joints, muscles, tendons or related structures that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

Note: Any sequelae after lesions affecting the bones, joints, muscles or tendons, and certain anatomical defects will normally require functional assessment to determine fitness.

(36) The applicant shall not possess any abnormality or disease of the ear or related structures that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(37) There shall be:

(i) No disturbance of vestibular function;

(ii) No significant dysfunction of the Eustachian tubes; and

(iii) No unhealed perforation of the tympanic membranes.

(38) A single dry perforation of the tympanic membrane need not render the applicant unfit.

Note: Guidance on testing of the vestibular function is contained in ICAO Doc 8984, Manual of Civil Aviation Medicine.

(39) There shall be no nasal obstruction and no malformation nor disease of the buccal cavity or upper respiratory tract that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(40) An applicant with stuttering or other speech defects sufficiently severe to cause impairment of speech communication shall be assessed as unfit.

(c) VISUAL REQUIREMENTS.

(1) The function of the eyes and their adnexae shall be normal. There shall be no active pathological condition, acute or chronic, or any sequelae of surgery or trauma of the eyes or their adnexae likely to reduce proper visual function to an extent that would interfere with the safe exercise of the applicant's licence and rating privileges.

(2) Distant visual acuity with or without correction shall be 6/12 or better in each eye separately, and binocular visual acuity shall be 6/9 or better. No limits apply to uncorrected visual acuity. Where this standard of visual acuity can be obtained only with correcting lenses, the applicant may be assessed as fit provided that:

(i) Such correcting lenses are worn during the exercise of the privileges of the licence or rating applied for or held; and

(ii) In addition, a pair of suitable correcting spectacles is kept readily available during the exercise of the privileges of the applicant's licence.

Note: An applicant accepted as meeting these provisions is deemed to continue to do so unless there is reason to suspect otherwise, in which case an ophthalmic report is required at the discretion of the Authority. Both uncorrected and corrected visual acuity are normally measured and recorded at each reexamination. Conditions which indicate a need to obtain an ophthalmic report include: a substantial decrease in the uncorrected visual acuity; any decrease in best-corrected visual acuity, and the occurrence of eye disease, eye injury or eye surgery.

(3) An applicant may use contact lenses to meet the requirement of paragraph 2.11.2.7(c)(2) of this subsection provided that:

(i) The lenses are monofocal and non-tinted;

(ii) The lenses are well tolerated; and

(iii) A pair of suitable correcting spectacles is kept readily available during the exercise of the licence privileges.

Note: Applicants who use contact lenses may not need to have their uncorrected visual acuity measured at each reexamination provided the history of their contact lens prescription is known.

(4) An applicant with a large refractive error shall use contact lenses or high-index spectacle lenses.

Note: If spectacles are used, high-index lenses are needed to minimise peripheral field distortion.

(5) An applicant whose uncorrected distant visual acuity in either eye is worse than 6/60 shall be required to provide a full ophthalmic report prior to the initial medical certificate and every 5 years thereafter.

Note 1: The purpose of the required ophthalmic examination is 1) to ascertain normal visual performance and 2) to identify any significant pathology.

(6) An applicant who has undergone surgery affecting the refractive status of the eye shall be assessed as unfit unless the applicant is free from those sequelae which are likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(7) An applicant shall have the ability to read, while wearing the correcting lenses, if any, the N5 chart or its equivalent at a distance selected by that applicant in the range of 30 to 50 cm. If this requirement is met only by the use of near correction, the applicant may be assessed as fit provided that this near correction is added to the spectacle correction already prescribed in accordance with this paragraph; if no such correction is prescribed, a pair of spectacles for near use shall be kept readily available during the exercise of the privileges of the licence. When near correction is required, the applicant shall demonstrate that one pair of spectacles is sufficient to meet both distant and near visual requirements.

Note 1: Any applicant who needs near correction to meet this requirement will require "look-over," bifocal, or perhaps multifocal lenses in order to read the instruments and a chart or manual held in the hand, and also to make use of distant vision, through the windscreen, without removing the lenses. Single-vision near correction (full lenses of one power only,

appropriate for reading) significantly reduces distant visual acuity and is therefore not acceptable.

Note 2: Whenever there is a requirement to obtain or renew correcting lenses, an applicant is expected to advise the refractionist of reading distances for the visual flight deck tasks relevant to the types of aircraft in which the applicant is likely to function.

(8) When near correction is required in accordance with paragraph 2.11.2.7(c) of this subsection, a second pair of near-correction spectacles shall be kept available for immediate use.

(9) The applicant shall be required to have normal fields of vision.

(10) The applicant shall be required to have normal binocular function.

(11) Reduced stereopsis, abnormal convergence not interfering with near vision, and ocular misalignment where the fusional reserves are sufficient to prevent asthenopia and diplopia may not be disqualifying.

(d) HEARING REQUIREMENTS.

(1) The applicant shall be tested by pure-tone audiometry:

(i) At the initial medical examination; and

(ii) At least once every 2 years after the age of 50 years.

(2) When tested by pure-tone audiometry, an applicant with a hearing loss, in either ear separately, of more than 35 dB at any of the frequencies 500, 1 000, or 2 000 Hz, or more than 50 dB at 3 000 Hz, shall be assessed as unfit.

(3) Where audiometry is not performed, the applicant shall have the ability to hear an average conversational voice in a quiet room, using both ears, at a distance of 2 m from the

(4) examiner, with the back turned to the examiner, or be assessed as unfit.

(5) The applicant who holds a PPL with an IR shall meet the hearing requirements for a Class 1 medical certificate.

3.0 NIG.CARS 2.11.2.8. CLASS 3 MEDICAL CERTIFICATE

(a) CERTIFICATE ISSUE AND RENEWAL.

(1) An applicant for an ATCO licence or, an RPL shall undergo an initial medical examination for the issue of a Class 3 medical certificate.

(2) Except where otherwise stated in this subpart, holders of ATCO licences or RPLs shall have their Class 3 medical certificate renewed at intervals not exceeding those specified in this subpart.

(3) A Class 3 medical certificate will be issued when the applicant complies with the requirements of this part.

(b) PHYSICAL AND MENTAL REQUIREMENTS.

(1) The applicant shall not suffer from any disease or disability which could render that applicant likely to become suddenly unable either to operate an aircraft safely or to perform assigned duties safely.

(2) The applicant shall have no established medical history or clinical diagnosis of any of the following such as might render the applicant unable to safely exercise the privileges of the licence applied for or held:

(i) An organic mental disorder;

(ii) A mental or behavioural disorder due to the use of psychoactive substances; this includes dependence syndrome induced by alcohol or other psychoactive substances;

(iii) Schizophrenia or a schizotypal or delusional disorder;

(iv) A mood (affective) disorder;

(v) A neurotic, stress-related, or somatoform disorder;

(vi) A disorder of adult personality or behaviour, particularly if manifested by repeated overt acts;

(vii) Mental retardation;

(viii) A disorder of psychological development;

(ix) A behavioural or emotional disorder, with onset in childhood or adolescence; or

(x) A mental disorder not otherwise specified.

(3) An applicant with depression, being treated with antidepressant medication, shall be assessed as unfit unless the medical assessor, having access to the details of the case concerned, considers the applicant's condition as unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

(3) The applicant shall have no established medical history or clinical diagnosis of any of the following:

(i) A progressive or nonprogressive disease of the nervous system, the effects of which, according to accredited medical conclusion, are likely to interfere with the safe exercise of the applicant's licence and rating privileges;

(ii) Epilepsy; or

(iii) Any disturbance of consciousness without satisfactory medical explanation of cause.

(5) An applicant who has suffered any head injury, the effects of which, according to accredited medical conclusion, are likely to interfere with the safe exercise of the applicant's licence and rating privileges, shall be assessed as unfit.

(6) The applicant shall not possess any abnormality of the heart, congenital or acquired, that is likely to interfere with the safe exercise of the applicant's licence and rating privileges. A history of proven myocardial infarction shall be disqualifying.

(7) An applicant who has undergone coronary bypass grafting or angioplasty (with or without stenting) or other cardiac intervention or who has a history of myocardial infarction or who suffers from any other potentially incapacitating cardiac condition shall be assessed as unfit unless the applicant's cardiac condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(8) An applicant with an abnormal cardiac rhythm shall be assessed as unfit unless the cardiac arrhythmia has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(9) Electrocardiography shall form part of the heart examination for the first issue of a medical certificate and in reexaminations annually after the age of 50.

(10) Electrocardiography shall be included in reexaminations of applicants between the ages of 30 and 50 no less frequently than every two (2) years.

Note 1: The purpose of routine electrocardiography is case finding. It does not provide sufficient evidence to justify disqualification without further thorough cardiovascular investigation.

(11) The systolic and diastolic blood pressures shall be within normal limits.

(12) The use of drugs for control of high blood pressure is disqualifying except for those drugs, the use of which, is compatible with the safe exercise of the applicant's licence and rating privileges.

(13) There shall be no significant functional or structural abnormality of the circulatory system.

(14) There shall be no acute disability of the lungs or any active disease of the structures of the lungs, mediastinum, or pleura likely to result in incapacitating symptoms during normal or emergency operations. Radiography shall form a part of the initial chest examination.
Note: Periodic chest radiography is usually not necessary but may be a necessity in situations where asymptomatic pulmonary disease can be expected.

(15) An applicant with chronic obstructive pulmonary disease shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(16) An applicant with asthma causing significant symptoms or likely to cause incapacitating symptoms during normal or emergency operations shall be assessed as unfit.

(17) The use of drugs for control of asthma shall be disqualifying except for those drugs the use of which is compatible with the safe exercise of the applicant's licence and rating privileges.

(18) An applicant with active pulmonary tuberculosis shall be assessed as unfit.

(19) An applicant with quiescent or healed lesions which are known to be tuberculous, or are

presumably tuberculous in origin, may be assessed as fit.

(20) An applicant with significant impairment of the function of the gastrointestinal tract or its adnexae shall be assessed as unfit.

(21) An applicant with sequelae of disease of or surgical intervention on any part of the digestive tract or its adnexae, likely to cause incapacity in flight, in particular any obstructions due to stricture or compression, shall be assessed as unfit.

(22) An applicant who has undergone a major surgical operation on the biliary passages or the digestive tract or its adnexae, with a total or partial excision or a diversion of any of these organs shall be assessed as unfit until such time as the medical assessor having access to the details of the operation concerned considers that the effects of the operation are not likely to cause incapacity in flight.

(23) An applicant with metabolic, nutritional, or endocrine disorders that are likely to interfere with the safe exercise of the applicant's licence and rating privileges shall be assessed as unfit.

(24) An applicant with insulin-treated diabetes mellitus shall be assessed as unfit.

(25) Applicants with non-insulin-treated diabetes mellitus shall be assessed as unfit unless the condition is shown to be satisfactorily controlled by diet alone or by diet combined with oral anti-diabetic medication, the use of which is compatible with the safe exercise of the applicant's licence and rating privileges.

(26) An applicant with diseases of the blood and/or the lymphatic system shall be assessed as unfit unless adequately investigated and their condition found unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

Note: Sickle cell trait or other haemoglobinopathic traits are usually compatible with a fit assessment.

(27) An applicant with renal or genitourinary disease shall be assessed as unfit, unless adequately investigated and their condition found unlikely to interfere with the safe exercise of the applicant's licence and rating privileges.

(28) Urine examination shall form part of the medical examination and abnormalities shall be adequately investigated.

(29) An applicant with sequelae of disease or surgical procedures on the kidneys or the genitourinary tract, in particular any obstructions due to stricture or compression, shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

(30) An applicant who has undergone nephrectomy shall be assessed as unfit unless the condition is well compensated.

(31) An applicant who is seropositive for HIV shall be assessed as unfit unless the applicant's condition has been investigated and evaluated in accordance with best medical practice and is assessed as not likely to interfere with the safe exercise of the applicant's licence or rating privileges.

Note 1: Early diagnosis and active management of HIV disease with antiretroviral therapy reduces morbidity and improves prognosis and thus increases the likelihood of a fit assessment.

(32) An applicant who is pregnant shall be assessed as unfit unless obstetrical evaluation and continued medical supervision indicate a low-risk, uncomplicated pregnancy.

(33) During the gestational period, precautions shall be taken for the timely relief of an ATCO in the event of early onset of labour or other complications.

(34) For an applicant with a low-risk, uncomplicated pregnancy, evaluated and supervised in accordance with paragraph 2.11.2.8(b)(31) of this subsection, the fit assessment shall be limited to the period until the end of the 34th week of gestation.

(35) Following confinement or termination of pregnancy, the applicant shall not be permitted to exercise the privileges of her licence until she has undergone re-evaluation in accordance with best medical practice and has been assessed as fit to safely exercise the privileges of her licence and ratings.

(36) An applicant shall not possess any abnormality of the bones, joints, muscles, tendons or related structures which is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

Note: Any sequelae after lesions affecting the bones, joints, muscles, or tendons, and certain anatomical defects will normally require functional assessment to determine fitness.

(37) The applicant shall not possess any abnormality or disease of the ear or related structures that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(38) There shall be no malformation or any disease of the nose, buccal cavity, or upper respiratory tract that is likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(39) An applicant with stuttering or other speech defects sufficiently severe to cause impairment of speech communication shall be assessed as unfit.

(c) VISUAL REQUIREMENTS.

(1) The function of the eyes and their adnexae shall be normal. There shall be no active pathological condition, acute or chronic, or any sequelae of surgery or trauma of the eyes or their adnexae likely to reduce proper visual function to an extent that would interfere with the safe exercise of the applicant's licence and rating privileges.

(2) Distant visual acuity with or without correction shall be 6/9 or better in each eye separately, and binocular visual acuity shall be 6/6 or better. No limits apply to uncorrected visual acuity. Where this standard of visual acuity can be obtained only with correcting lenses, the applicant may be assessed as fit provided that:

(i) Such correcting lenses are worn during the exercise of the privileges of the licence or rating applied for or held; and

(ii) In addition, a pair of suitable correcting spectacles is kept readily available during the

exercise of the privileges of the applicant's licence.

Note: An applicant accepted as meeting these provisions is deemed to continue to do so unless there is reason to suspect otherwise, in which case an ophthalmic report is required at the discretion of the Authority. Both uncorrected and corrected visual acuity are normally measured and recorded at each reexamination. Conditions which indicate a need to obtain an ophthalmic report include: a substantial decrease in the uncorrected visual acuity, any decrease in best-corrected visual acuity, and the occurrence of eye disease, eye injury, or eye surgery.

(3) An applicant may use contact lenses to meet the requirement of paragraph 2.11.2.8(c)(2) of this subsection provided that:

(i) The lenses are monofocal and non-tinted;

(ii) The lenses are well tolerated; and

(iii) A pair of suitable correcting spectacles is kept readily available during the exercise of the licence privileges.

Note: Applicants who use contact lenses may not need to have their uncorrected visual acuity measured at each reexamination provided the history of their contact lens prescription is known.

(4) An applicant with a large refractive error shall use contact lenses or high-index spectacle lenses.

Note: If spectacles are used, high-index lenses are needed to minimise peripheral field distortion.

(5) An applicant whose uncorrected distant visual acuity in either eye is worse than 6/60 shall be required to provide a full ophthalmic report prior to the initial medical certificate and every 5 years thereafter.

Note 1: The purpose of the required ophthalmic examination is 1) to ascertain normal visual performance and 2) to identify any significant pathology.

.(6) An applicant who has undergone surgery affecting the refractive status of the eye shall be assessed as unfit unless the applicant is free from those sequelae which are likely to interfere with the safe exercise of the applicant's licence and rating privileges.

(7) An applicant shall have the ability to read, while wearing the correcting lenses, if any, required by paragraph 2.11.2.8(c)(2) of this subsection, the N5 chart or its equivalent at a distance selected by that applicant in the range of 30 to 50 cm and the ability to read the N14 chart or its equivalent at a distance of 100 cm. If this requirement is met only by the use of near correction, the applicant may be assessed as fit provided that this near correction is added to the spectacle correction already prescribed in accordance with (b); if no such correction is prescribed, a pair of spectacles for near use shall be kept readily available during the exercise of the privileges of the licence. When near correction is required, the applicant shall demonstrate that one pair of spectacles is sufficient to meet both distant and near visual requirements.

Note 1: Any applicant who needs near correction to meet this requirement will require "look-

over," bifocal, or perhaps multifocal lenses in order to read the instruments and a chart or manual held in the hand, and also to make use of distant vision, through the windscreen, without removing the lenses. Single-vision near correction (full lenses of one power only, appropriate for reading) significantly reduces distant visual acuity and is therefore not acceptable.

Note 2: An applicant who needs near correction to meet this requirement will require "look-over," bifocal, or perhaps multifocal lenses in order to read radar screens, visual displays, and written or printed material, and also to make use of distant vision, through the windows, without removing the lenses. Single-vision near correction (full lenses of one power only, appropriate for reading) may be acceptable for certain air traffic, RP duties. However, it should be realised that single-vison near correction significantly reduces distant visual acuity.

Note3: Whenever there is a requirement to obtain or renew correcting lenses, an applicant is expected to advise the refractionist of reading distances for air traffic control, RP duties.

(8) When near correction is required in accordance with this paragraph 2.11.2.8(c) of this subsection, a second pair of near-correction spectacles shall be kept available for immediate use.

(9) The applicant shall be required to have normal fields of vision.

(10) The applicant shall be required to have normal binocular function.

(11) Reduced stereopsis, abnormal convergence not interfering with near vision, and ocular misalignment, where the fusional reserves are sufficient to prevent asthenopia and diplopia, may not be disqualifying.

(d) HEARING REQUIREMENTS.

(1) The applicant shall be tested by pure-tone audiometry:

(i) At the initial medical examination;

(ii) At least once every 4 years up to the age of 40 years; and

(iii) At least once every 2 years after the age of 40 years.

(2) The applicant, when tested on a pure-tone audiometer, shall not have a hearing loss, in either ear separately, of more than 35 dB at any of the frequencies 500, 1 000, or 2 000 Hz, or more than 50 dB at 3 000 Hz.

(3) Where audiometry is not performed, the applicant shall have the ability to hear an average conversational voice in a quiet room, using both ears, at a distance of 2 m from the examiner, with the back turned to the examiner, or be assessed as unfit.

(4) An applicant with a hearing loss greater than the above may be declared fit provided that the applicant has normal hearing performance against a background noise that reproduces or simulates that experienced in a normal air traffic control working environment or RP working environment.

(5) Alternatively, a practical hearing test conducted in an air traffic control environment representative of the one for which the applicant's licence and ratings are valid may be used.

CHAPTER 6

AAME TRAINING REQUIREMENTS

This section lists the subjects that AAMEs must be trained in to perform medical examinations of aviation personnel.

1.0 BASIC TRAINING IN AVIATION MEDICINE

All AAMEs need basic training in aviation medicine to complete medical examinations for Class 2 and 3 medical certificates:

Basic training in aviation medicine for AAMEs shall include at least the following:

(1) Basic training in aviation medicine.

(2) Physics of atmosphere and space.

(3) Basic aeronautical knowledge.

(4) Aviation Physiology.

(5) Ophthalmology.

(6) Otorinolaryngology.

(7) Cardiology and general medicine.

(8) Neurology.

(9) Psychiatry in aviation medicine.

(10) Psychology.

(11) Dentistry.

(12) Accidents, Escape and Survival.

(13) Legislation, rules and regulations.

(14) Air evacuation.

(15) Medicine and flying.

2.0 ADVANCED TRAINING IN AVIATION MEDICINE

AAMEs who perform examinations for Class 1 medical certificates need **advanced training** in the following categories:

(a) Pilot working environment

(b) Aerospace physiology

(c) Ophthalmology

(d) Otorhinolaryngology

(e) Cardiology and general medicine

(f) Neurology/psychiatry

(g) Human factors in aviation

(h) Tropical medicine

(i) Hygiene

(j) Space medicine

CHAPTER 7

HEALTH PROMOTION

1.0 PURPOSE

This chapter has been developed to guide Authorised Aviation Medical Examiners (AAMEs) in implementing appropriate aviation-related health promotion activities for the medical certification of licence holders.

2.0 REFERENCES:

2.1 Nig.CARs Part 2.11.1.2 (c)

3.0 HEALTH PROMOTION

The Authority shall implement appropriate aviation-related health promotion for licence holders subject to a Medical Assessment to reduce future medical risks to flight safety.

3.1 List of appropriate topics identified for health promotion:

The list of appropriate topics for health promotion will be identified based on the following triggers:

a) Reports from AAMEs following familiarization flights, simulator or ATC facility visits;

b) Findings and analysis and audit of medical examination reports of licenced aviation personnel submitted to the Authority by AAMEs, which may indicate disease trend(s) in the pilot and ATC population.

c) Any other trigger(s) considered appropriate by the Authority that may be relevant to occupational health and flight safety significance in the pilot and ATC communities.

3.2 List of appropriate topics identified for health promotion;

a) Hypertension

b) Diabetes mellitus

c) Smoking

d) Depression/Mood disorder

e) Sleep disorder

f) Substance abuse

g) Mental Health

h) Fatigue

i) Obesity/ Weight gain

j) Obstructive Sleep Apnoea (OSA)

a) Hypertension

Hypertension, or high blood pressure, is a common medical condition affecting Nigerians, most of whom are unaware that they have this condition. The significance of the condition is that it is a major risk factor for heart disease, stroke, and kidney failure.
Hypertension has been called the most powerful and predictive of all the vascular risk factors although in reality age is the most important. To assess one risk factor in isolation is not appropriate as they all interact powerfully and multiple risk factors present in minor extent are as lethal as a single one present in large extent.

The blood pressure should be less than 155/95mmHg, treated or untreated, and this may be achieved by lifestyle adjustment (reduction of alcohol intake, weight reduction) in those with modest elevation. If the 10-year cardiovascular mortality is < 5 per cent and there is no evidence of target organ damage, slightly higher levels are tolerable in the short term. If it is > 5 per cent, medical treatment will be needed. In the presence of diabetes and microalbuminuria, the lower target of 130/80 mm Hg is applicable. A pressure consistently >160/95 mmHg is disqualifying from all classes of medical certification.

b) Diabetes Mellitus

The prevalence of diabetes has increased over the past 100 years and the condition is now common. There are a number of sound reasons why diabetes is one of the most common chronic disorders. The life expectancy of the general population including diabetics with improved quality of control is increasing. In addition, the current high standard of living has led to a higher intake of calories accompanied by a lower level of physical activity, resulting in an increased prevalence of obesity. Contributing to the decrease in physical activity may be the dependency by many on private or commercial transport. Health screening programs for the general population have also contributed to a perceived increase in the prevalence of diabetes by diagnosing a number of diabetics at an early stage.

c) Smoking

Smoking and its effects relative to the pulmonary and cardiovascular systems (e.g. chronic bronchitis, chronic obstructive lung disease, bronchial malignancy and coronary artery disease) are not the only considerations from the standpoint of flight safety.

Decreased altitude tolerance secondary to the displacement of oxyhaemoglobin by methaemoglobin, increased fatigue, conjunctival irritation and decreased night vision are consequences reported to be due to smoking. As almost all passenger flights today are smoke free, it is important that pilots ensure they do not suffer withdrawal symptoms during flight.

d) Mood Disorders

Depressive mood disorders (DSM-IV: Major Depressive Disorder) are common disorders which present with depressed mood, reduced energy, impaired concentration and memory, loss of interest in surroundings, slowed cerebration, difficulty in making decisions, alteration of appetite and sleep, guilt feelings and low self-esteem. Suicide is common; the incidence

varies with cultural background but may approach 20 per cent per depressive episode. The

illness is usually of insidious onset and persists for many months when not treated adequately. Depression may be accompanied by a number of somatic symptoms. There may be diurnal variation in the symptoms, and many persons with depression may have some good days in between. It is not unusual for sufferers to try to modify their symptoms (especially the dysphoria and insomnia) by the use of alcohol and/or drugs.
Depression leads to subtle (and sometimes obvious) incapacitation, mainly due to the decreased ability to concentrate as well as to distractibility and indecision, which are frequent features of the illness. It is these symptoms, along with the risk of suicide, which make a depressed individual unsuitable to work in the aviation environment. Because the symptoms wax and wane during a depressive episode, there may be days when the individual is relatively well and may appear to be fit to fly.

e) Sleep Disorder

Insomnia affects up to one-third of the adult population, and large numbers of people complain of intermittent sleep difficulties. Individuals with insomnia become tense, anxious, preoccupied with sleep, and frequently complain of poor concentration and poor ability to focus on tasks. Persistent insomnia requires a complete history and thorough physical examination as the presence of organic causes must be ruled out (e.g. chronic pain, narcolepsy, sleep apnea, episodic movement disorders).

Disturbed sleep is commonly associated with alcohol or substance abuse and with a host of psychiatric conditions including mood disorders, psychosis and anxiety disorders.

f) Drug Use (Substance Abuse and Dependence)

Drugs, in this context refer to those non-prescription mood-altering substances that are ingested for the purpose of changing ones' mental state, for nonmedical purposes. The purpose of taking these substances may be to induce pleasure or to reduce pain or suffering. There is a wide range of substances that may be abused and the type will vary in different parts of the world, and this is usually determined by customs, accessibility, legality, and societal acceptances. The most commonly used substances are alcohol, cannabis, opiates, amphetamines, sedative/hypnotics, and hallucinogens.

These substances may be used occasionally, episodically, but their use may also become a part of the user's regular daily life. In the case of regular use, the user will most commonly increase the dosage and frequency in order to achieve the desired effect. ICAO has published guidance on the question of "Problematic use of Substances."
Substance dependence is defined as excessive use of the substance, inability to curb the use of the substance despite complications, increased tolerance to its effect and the occurrence of withdrawal symptoms, while Substance abuse is defined as the continued use of the substance even at times when its use is harmful to health, excessive use of the substance, problems (family, friends, work) related to the use of the substance, or legal problems related to its use.

g) Mental health

As there is evidence that several fatal aviation accidents have been caused by psychiatric disorders or inappropriate use of psychoactive substances, it is reasonable that as part of the periodic aviation medical examination there should be questions that pertain to these issues. Further, the number of non-physical conditions that can affect the health of pilots and which can lead to long-term unfitness in those of middle age appears to be increasing. The conditions

addressed by the proposed questions have been shown to be amenable to preventive action before they develop into significant health problems and before there is an impact on the pilot's medical status for flying.

aim is to encourage pilots to consider their lifestyle and thereby improve the likelihood that they will remain in good mental health during their careers; this, of course, includes the avoidance of problematic use of psychoactive substances
To pilot an aircraft requires the utilization of a complex set of physical and cognitive skills. Interference with any aspect of these skills and their coordination may have serious personal and public safety consequences. The assessment of mental fitness shall therefore be made with due regard to the privileges of the licence and the ratings applied for or held, and to the conditions in which the applicants will have to carry out their duties.

h) Fatigue

A physiological state of reduced mental or physical performance capability resulting from sleep loss or extended wakefulness, circadian phase, or workload (mental and/or physical activity) that can impair a crew member's alertness and ability to safely operate an aircraft or perform safety-related duties.

The aviation environment is one that is marked by fatigue due to disrupted sleep, circadian stress, and at times high temperatures and humidity in places that are visited. There is also a significant risk of gastroenteritis which may provoke an episode in a vulnerable individual.
Pilot incapacitation has been of concern for as long as powered flight has existed. It represents an operational risk, and it can therefore be defined operationally as "any physiological or psychological state or situation that adversely affects performance."

i) Obesity – Excessive weight gain

Body Mass Index (BMI) is calculated by dividing a person's weight in kilograms by the square of their height in metres. Aircrew or ATC with BMI in the range of 32.5-34.9 should be warned about the health hazards of obesity and the aeromedical consequences
The result of the risk assessment shall be reviewed by the Authority's medical assessors. If the parameters are deranged or out of normal limits the aircrew shall be advised to consult with his personal physician or the AAME.

Aircrew or ATC with Body Mass Index (BMI) of 26 – 32 during medical examination will be issued letters advising them on life style modification and the aircrew's BMI will be monitored at the next medical examination.
Aircrew or ATC with BMI of 32 – 34.9 will be issued letters requesting them to commence weight reduction program and the aircrew's BMI will be monitored at the next medical examination.

Aircrew or ATC with BMI of 35 and above will be issued letters requesting that they carry out a Cardiac risk assessment which should include but not limited to the following investigations:

i. Stress Electrocardiogram

ii. Serum electrolytes,

iii. Urea and Creatinine estimation

iv. Fating Lipid Profile

v. Fasting Blood Sugar

The result of the risk assessment shall be reviewed by the Authority's medical assessors. If the parameters are deranged or out of normal limits the aircrew or ATC shall be advised to consult with his personal physician or the AAME.

j) Obstructive Sleep Apnoea (OSA)

Obstructive sleep apnea (OSA) is a condition in which, during sleep, the upper airway is obstructed due to loss of tone in the pharyngeal musculature.

The obstruction may be complete, leading to cessation of airflow (an apnoea) or partial, leading to a markedly reduced inspiratory flow (a hypopnoea).

OSA can be defined as the presence of five or more obstructive events (either apnoeas or hypopnoeas) per hour of sleep.

The obstructive sleep apnoea syndrome is defined as the presence of OSA with daytime sleepiness.

During apnoeas and hypopnoeas the difficulty in inspiration causes arousals from sleep. Poor quality of sleep is then the cause of daytime sleepiness.

Risk factors for OSA include increasing age, obesity, hypothyroidism and a family history of OSA.

Most patients seen in a sleep clinic are significantly overweight, though not all. In addition, the majority with significant OSA snore to a level that is commented on by their bed partners, who typically report being alarmed by the apnoeic episodes. Specific questions addressed to the partner may be helpful if the AAME suspects OSA may be an issue.

Note that a few individuals with severe OSA move so little air before they obstruct that they do not snore as much as those with a less severe condition. However, they may have a history of severe snoring which has subsequently lessened.

Severe snoring is a sensitive marker for OSA.
Daytime sleepiness as a symptom is also reasonably sensitive, but may not be declared to a AAME. Again, specific questions about this may be worthwhile.

Process for identifying obstructive sleep apnoea
The AAME asks the following two questions:
"Do you snore at a level that disturbs someone sleeping in the same room?"
"Do you have a tendency to fall asleep or doze at inappropriate times?"
An Epworth sleepiness test should be undertaken if the response to either question is positive, or if the applicant:

a) has a neck circumference greater than 17 in (43cm); or

b) has a Body Mass Index greater than 30.

3.3 **Means by which health promotion will be carried out in the aviation industry**;

a) By the Authority

i. Communication of health promotion principles and policies to the aviation through advisory circulars and or the Authority's website.

ii. Organizing seminars on health promotion for the aviation industry and AAMEs.

iii. Inclusion of appropriate health promotion topics in Authority's newsletters and periodic magazine (The Regulator)

iv. Letter of advice to identified licenced aviation personnel to put in place life-style changes to enhance health promotion e.g. Obese licenced aviation personnel who may require to commence weight reduction program.

v. Carry put trend analysis of the data of aircrew with medical conditions of aviation safety significance and how health promotion activities can be used to address some of these medical conditions positively.

vi. Any other means deemed fit by the Authority.

b) By AAMEs

i. Introduction of health promotion discussion with licenced aviation personnel during their initial and periodic medical examination.

ii. Provide specific health promotion advices (e.g. life-style changes weight reduction strategies, cession of smoking / substance abuse, reduction/cession in alcohol consumption etc) to applicants and monitor compliance or not at subsequent medical examinations.

iii. To inform the Authority of the outcome of health promotion discussions held with licenced aviation personnel during their periodic medical assessment.

FORMS

NIGERIA CIVIL AVIATION AUTHORITY

NCAA Headquarters: Nnamdi Azikiwe International Airport, Abuja
Website: ncaa.gov.ng E-mail: info@ncaa.gov.ng

FORM INDEX

APPENDICES AEROMEDICAL FORMS

ITEMS	FORM NO	SUBJECT
1.	FORM O-MED 001	APPLICATION FORM FOR A MEDICAL CERTIFICATE
2.	FORM O-MED 002	MEDICAL ASSESSMENT REPORT
3.	FORM O-MED 003	OTORHINOLARYNGOLOGY REPORT
4.	FORM O-MED 004	MEDICAL EXAMINATION REPORT
5.	FORM O-MED 005	OPHTHALMOLOGY EXAMINATION REPORT
6.	FORM O-MED 009	APPLICATION FORM FOR APPOINTMENT AS AN AUTHORISED AVIATION MEDICAL
7.	FORM O-MED 015	NOTIFICATION OF DENIAL OF MEDICAL CERTIFICATE
8.	FORM O-MED 016	MEDICAL CONFIDENTIALITY STATEMENT

Appendix 1B FORM:O -MED 001 Application Form for A Medical Certificate

	NIGERIA CIVIL AVIATION AUTHORITY APPLICATION FORM FOR A MEDICAL CERTIFICATE	Reference	FORM O – MED 001
		Revision/Date:	01/ June 2023

Complete this page fully using a black ball point and in block capitals – Refer to instructions' pages for detail **MEDICAL IN CONFIDENCE**

1. Application Initial ☐ Renewal/Revalidation ☐	2. Class of medical certificate applied for ☐ 2nd ☐ 3rd ☐		
3. Surname:	4. Forename:		5. Previous Surname(s):
6. Place and country of birth:	7. Date of birth/Age:	8. Sex: Male ☐ Female ☐	9. Reference Number:
	10. Nationality		11. Type of licence desired
12. Permanent Address: Country Telephone No:	13. Postal Address (if different) Country Telephone No.:		14. Occupation (principal) 15. Employer 16. Last medical application Date: Place:
17. Aviation licence held (type): Licence number Country of issue:			18. Any conditions/Limitations Variations on the Licence/Medical Certificate No ☐ Yes ☐ Det ☐:
19. Have you ever had an aviation medical certificate denied, suspended, or revoked by any AAME? If Yes, discuss with AAME ☐No ☐ Yes Date: Country Details:			20. Total flight Time (hours) 21. Flight time (hours) Since last medical:
23. Any aircraft accident/incident since last medical No ☐ Yes☐ Date: Place" Details:			22. Aircraft presently flown: 24. Type of flying intended: 25. Present flying activity: Single Pilo☐ Multi-☐t
26. Do you smoke tobacco? Nev ☐ ☐ Date stopped: Yes State type and amount:			27. Do you currently use any medication? No☐ Y☐ State drug, dose, date started and why
28. Alcohol-state average weekly intake: ☐			

29. General & Medical History: Do you have, or have, or have ever had, any of the following? YES or NO (or as indicated) must be ticked after each question.
Elaborate Yes answers in the remarks section (30)

No	Yes	No		Yes	No		Yes	No	**FAMILY**
HISTORY OF:	Yes	No							
1. Eye trouble/eye operation			12. Nose, throat, or speech disorder			23. Malaria or other tropical diseases			33. Heart disease		
2. Spectacles &/or contact lenses ever worn			13. Head injury or concussion			24. A positive HIV test			34. High blood pressure		
3. Spectacles/contact lens prescription/change since last medical exam			14. Frequent or severe headaches			25. Sexually transmitted disease			35. High Cholesterol level		
4. Hay fever, other allergy			15. Dizziness or fainting spells			26. Admission to hospital			36. Epilepsy		
5. Asthma, lung disease			16. Unconsciousness for any reason			27. Any other illness or injury			37. Mental illness		
6. Heart or vascular			17. neurological disorders, Stroke, Epilepsy, seizure, paralysis etc.			28. Visit to medical practitioner since last medical examination			38. Diabetes		
7. High or low blood pressure			18. Psychological/psychiatric trouble of any sort			29. Refusal of life insurance			39. Tuberculosis		
8. Kidney stone or blood in urine			19. Alcohol/drug/substance abuse			30. Refusal of flying licence			40. Allergy/asthma/eczema		
9. Diabetes, hormone			20. Attempted suicide			31. Deafness/ear disorder			41. Inherited disorders		
10. Stomach, liver or intestinal trouble			21. Motion sickness requiring medication			32. medical rejection from or for military service			42. Glaucoma		
11. Anaemia/Sickle cell trait/other blood disorders			22. Award of pension or compensation for injury or illness			Females only Gynaecological, menstrual problems. Are you pregnant?			Last menstrual period		

30. **Remarks**: If previously reported and no change since, so state.

31. **Declaration**: I hereby that I have carefully considered the statement made above and to the best of my belief they are complete and correct and that I have not withheld relevant information or made any misleading statements. I understand that if I have made any false or misleading statements in connect with this application or fail to release the supporting medical information, the Authority may refuse to grant me a medical certificate or may withdraw any medical certificate granted, without prejudice to any other action applicable under national law. ***CONSENT TO RELEASE OF MEDICAL INFORMATION:***
I hereby authorize the release of all information contained in this and any or all attachments to the Aeromedical Section and where necessary the Aeromedical section of another State, recognizing that these documents or electronically stored data are to be used for completion of a medical assessment and will become and remain the property of the Authority, providing that I or my physician may have access to them according to national law. Medical Confidentiality will be respected at all times.

……..	……..
Date	**Signature of Applicant**
of AAME (Witness)	**Signature**

Return all completed forms to the Head, Aeromedical Standards Department, NCAA.

Appendix 1C FORM:O - MED 002 Medical Certificate

	NIGERIA CIVIL AVIATION AUTHORITY **Medical Assessment Report**	Reference	FORM:O-MED 002
		Revision/Date	01/ June 2023

I. Licence No: .....

II. Name of Holder: ..... **III. Title**: .....
SURNAME FIRST NAME

IV. Place & Date of Birth: ..... **V. Nationality**: .....

..... **VI. Sex:**…….....

VII. Address: .....

.....

.....

VIII. Height (cm): ..... **IX. Weight (Kg):** ..... **X. Colour of Hair**: .....

XI. Colour of Eyes: ..... **XII. Signature of Holder:** .....

XIII. Authorized Aviation Medical Examiner's Name: .....

XIV. Address of AAME: .....

……..……

……..……

XV. Date of Examination: .....

XVI. Aeromedical Assessment: FIT/NOT FIT for ATPL/CPL/FE/ATCO/RPL/PPL/SPA/Cabin Crew Licences(s):……

.....

XVII. Limitations/Restrictions: .....

.....

.....

XVIII. Date of Issue: .....

XIX. Signature of Authorized Aviation Medical Examiner: .....

XX.

Date (Day/Month/Year of :)	Last	Next
Comprehensive Medical Exam		
Medical (General) Exam		
Electrocardiogram (ECG)		
Audiogram		

XXI. AAME Stamp and Number

XXII. Assessment is subject to review by the Aeromedical Standards Department
XXIII. Distribution: 1. Holder's Copy (White) 2. AAME's Copy (Blue)
3. Aeromedical Standards Department's Copy (Yellow)

Appendix 1D FORM: O-MED 003 Otorhinolaryngology Examination Report

	NIGERIA CIVIL AVIATION AUTHORITY OTORHINOLARYNGOLOGY EXAMINATION REPORT	Reference	FORM:O-MED 003
		Revision/Date	01/ June 2023

Complete this page fully using a black ball point pen and in block capitals. Applicant's details

MEDICAL IN CONFIDENCE

(1) Application Initial ☐ Renewal/Revalidation ☐	(2) Class of medical certificate applied for 1st ☐ 2nd ☐ 3rd ☐		
(3) Surname:	(4) Forenames:	(5) Previous Surname(s):	
(6) Place and country of birth	(7) Date of birth/Age	(8) Sex: Male ☐ Female ☐	(9) Reference number

(401) Consent to release of medical information: I hereby authorize the release of all information contained in this report and any or all attachments to the Aeromedical Examiner, the Authority and where necessary the Aeromedical Section of No other State, recognizing that these documents or any other electronically stored data are to be used for completion of a medical assessment and will become and remain the property of the Authority, providing that I or my physician may have access to them according to national law. Medical Confidentiality will be respected at all times.

Date:…… Signature of the applicant:…… Signature of medical examiners (witness):……

(402) Examination Category	(403) Otorhinolaryngology history
Initial ☐ Extended ☐ Renewal/Raval ☐ Special referral ☐	

(403) Clinical Examination Check each item

	Normal	Abnormal
(404) Head, face, neck, scalp		
(405) Buccal cavity, teeth		
(406) Pharynx		
(407) Nasal passages and naso-pharynx (inc.Anterior rhinoscopy)		
(408) Vestibular system incl. Romberg test		
(409) Speech		
(410) Sinuses		
(411) Ext. acoustic meati, tympanic membranes		
(412) Pneumatic otoscopy		
(413)Impedance tympanometry including Valsalva manoeuvre (initial only)		

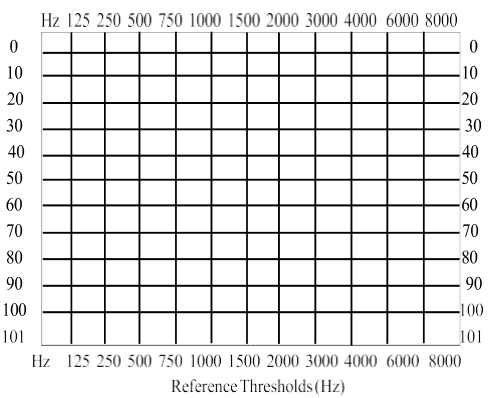
(419) Pure tone audiometry dB HL (hearing level)

Hz	Right ear	Left ear
250		
500		
1000		
2000		
3000		
4000		
6000		
8000		

Additional testing (if indicated)	Not Performed	Normal	Abnormal
(414) Speech audiometry			
(415) Posterior rhinoscopy			
(416) EOG; spontaneous and positional nystagmus			
(417) Differential caloric test or vestibular autorotation test			
(418) Mirror or fibre laryngoscopy			

(421) Otorhinolaryngology remarks and recommendations

Test		(Red)	Left Ear (Blue)
	AIR		
	BONE		



I hereby certify that I have personally examined the applicant named on this medical examination report and that this report with any attachment embodies my findings completely and correctly.

(423) Place and date:	ORL Examiner's Name and Address: (Block Capitals)	AAME Stamp with No:
Authorised Aviation Medical Examiner's Signature	Telephone No: Telefax No:	

Appendix 1E FORM: O-MED 004 Medical Examination Report

	NIGERIA CIVIL AVIATION AUTHORITY MEDICAL EXAMINATION REPORT	Reference	FORM:O-MED 004
		Revision/Date	01/ June 2023

(A) Examination Category Initial ☐ Renewal/Reval. ☐ Extended ☐	(2) Height (cm)	(3) Weight (Kg)	(4) Eye Color	(5) Hair Color	(6) Blood Pressure – Seated (mmHg)		(7) Pulse - resting	
	Body Mass Index (BMI) =				Systolic	Diastolic	Rate	Rhythm

Clinical Examination: Check each item	Normal	Abnormal	Clinical Examination: Check each item	Normal	Abnormal
(8) Head, face, neck, scalp			(18) Abdomen, hernia, liver, spleen		
(9) Mouth, throat, teeth			(19) Anus, rectum		
(10) Nose, sinuses			(20) Genito-urinary system		
(11) Ears, drum, eardrum mobility			(21) Endocrine System		
(12) Eyes -orbit & adnexa visual fields			(22) Upper & Lower limbs, joints		
(13) Eyes-pupils and optic fundi			(23) Spine, other musculoskeletal		
(14) Eyes – ocular motility: nystagmus			(24) Neurologic – reflexes etc		
(15) Lungs, chest, breasts			(25) Psychiatric		
(16) Heart			(26) Skin, identifying marks and lymphatics		
(17) Vascular system			(27) General systemic		
(28) Notes: Describe every abnormal finding. Enter applicable item number before each comment. Use separate sheet if space is inadequate.					

(36) Psychometric tests	Yes	No	Date

Visual acuity

(29) Distant vision of 5m/6m Spectacles Contact lenses

Right eye	Corrected to		
Left eye	Corrected to		
Both eyes	Corrected to		

(37) Pulmonary Function (38) Haemoglobin

Peak Expiratory Flow L/m		g/dl	
Normal ☐	Abnormal ☐	Normal ☐	Abnormal ☐

(30) Intermediate Vision N14 at 100cm Accompanying Reports	Uncorrected Yes / No		Corrected Yes / No	
Right eye				
Left eye				

(31) Near Vision N5 at 30-50cm	Uncorrected Yes / No		Corrected Yes / No	
Right eye				
Left eye				
Both eye				

	Not performed	Normal	Abnormal
(39) ECG			
(40) Audiogram			
(41) Ophthalmology			
(42) ORL (ENT)			
(43) Chest X-ray			
(44) Blood lipids			
(45) Pulmonary Function			
(46) EEG			
(47) Others			

(48) Aviation medical examiner's recommendations:

(32) Spectacles Lenses ☐ (33) Contact ☐

Yes ☐	No ☐	Yes ☐	No ☐
Type:		Type:	

Name of applicant: ……..…

☐ Fit Class…….

☐ Medical Certificate issued Class……..…

(34) Hearing	Right ear	Left ear
Conversational voice test at 2m Back turned to examiner	Yes No	Yes No
Forced at 6m whisper	Yes No	Yes No

☐ Unfit
Class……

(35) Urinalysis

Glucose	Protein	Blood	Others

(49) Comments, restriction, Limitations:

I hereby certify that I have personally examined the applicant named on this medical examination report and that this report with any attachment embodies my findings completely and correctly.

(51) Place and date:	Examiner's Name and Address (Bl Capitals)	AAME Stamp with AAME No.
Authorized Medical Examiner's Signatur	Telephone No:. Telefax No.	

Return all completed forms to the Head, Aeromedical Standards, NCAA, Aviation House, P.M.B. 21038, Ikeja, Lagos

Appendix 1F FORM: O-MED 005 Ophthalmology Examination Report

	NIGERIA CIVIL AVIATION AUTHORITY OPHTHALMOLOGY EXAMINATION REPORT	Reference	FORM O – MED 005
		Revision/Date	01/ June 2023

Complete this page fully using a black ball point pen and in block capitals.

Applicant's details **MEDICAL IN CONFIDENCE**

(1) Application: Initial ☐ Renewal/Revalidation ☐	(2) Class of medical certificate applied for: 1st ☐ 2nd ☐ 3rd ☐		
(3) Surname:	(3) Forenames:		(4) Previous Surname(s):
(6) Place and country of birth:	(7) Date of birth/Age:	(8) Sex: Male ☐ Female ☐	(9) Reference number:
	(10) Nationality:		(11) Type of licence desired:

(301) Consent to release of medical information: I hereby authorize the release of all information contained in this report and any or all attachments to the Aeromedical Examiner, the Authority and where necessary the Aeromedical Section of No other State, recognizing that these documents or any other electronically stored data are to be used for completion of a medical assessment and will become and remain the property of the Authority, providing that I or my physician may have access to them according to national law. Medical Confidentiality will be respected at all times.

Date:…… Signature of the applicant: ……..…….…….. Signature of medical examiners (witness)……

(302) Examination Category
Initial ☐
Extended ☐
Renewal/Reval. ☐
Special referral ☐

(303) Ophthalmological history

Clinical Examination Check each item		Normal	Abnormal
(304) Eyes, External & Eyelids			
(305) Eyes Exterior (Slit lamp, opth.)			
(306) Eye position and movement			
(307) Visual fields (confrontation)			
(308) Pupillary reflexes			
(309) Fundi (Ophthalmoscopy)			
(310) Convergence	cm		
(311)	D		

Visual acuity				
(314) Distant Vision at 5m/6m			*Spectacles*	*Contact lenses*
Right eye		Corrected to		
Left eye		Corrected to		

(315) Intermediate vision at 1m			*Spectacles*	*Contact lenses*
Right eye		Corrected to		

(312) Ocular muscle balance (in prism diopters)

Distant at 5/6	Near at 30-50cm
Ortho	Ortho
Eso	Eso
Hyper	Hyper
Cyclo	Cyclo
Tropia Yes ☐ No ☐	Phoria Yes ☐ No ☐
Fusional reserve testing Not performed ☐	Normal ☐ Abnormal ☐

(316) *Near vision at 30-50cm*		*Spectacles*	Contact lenses
Right eye	Corrected to		
Left eye	Corrected to		

(313) *Colour perception*	
Pseudo-Isochromatic plates	Type:
No of plates:	No of errors:
Advanced colour perception testing indicated	Yes No
Method: Colour SAFE ☐	Colour UNSAFE ☐

(*317) Refraction*	Sph	Cylinder	Axis
Right eye			
Left eye			
Both eyes			
Actual refraction examined ☐		Spectacles prescription based ☐	

(318) Spectacles	(319) Contact lens
Yes ☐ No ☐	Yes ☐ No ☐
Type:	Type:

(320) Intra-ocular pressure	
Right (mmHg)	Left (mmHg)
Method: Normal☐ Abnormal☐	

(321) Ophthalmological remarks and recommendations:

(322) Examiner's declaration: I hereby certify that I have personally examined the applicant named on this medical examination report and that this report with any attachment embodies my findings completely and correctly.		
(323) Place and date:	Ophthalmic Examiner's Name and Address: (Block Capitals)	AAME Stamp with No:
AAME's Signature:	Telephone No: Telefax No:	

Appendix 1A FORM: O-MED 009 Authorised Aviation Medical Examiner (AAME) Application Form

	NIGERIA CIVIL AVIATION AUTHORITY **Authorised Aviation Medical Examiner (AAME) Application Form**	Reference	FORM: O-MED 009
		Revision/Date	01/ June 2023

A. Applicant Details		
1. Name:		2. Date of birth (dd/mm/yyyy):
3. Address where Medical examinations will be performed:		4. Licenced as: ☐ MD ☐ Other (indicate type of Licence)
Name of institution/clinic, if any:		4a. Country:
Street and number:		4b. Licence number:
City:	Country:	
5. Office telephone number (include area code):		
6. Medical speciality:		
7. Were you ever authorised as an authorised aviation medical examiner (AAME)? (If yes, state where and when.): Yes ☐ No ☐		

B. Education			
1. Medical School/University:			
Name of school/ university	City/country	Year graduated	Degree received
2. Internship/Residency:			
Name of hospital/institution	City/country	Inclusive dates	Specialty/rotating
3. Post-Graduate			
Name of institution	City/country	Inclusive dates	Degree/certificate

C. Experience

1. Medical			
1a. Type of practice:			1b. Years:
1c. Institution(s) (name and location):			1d. Hospital privileges: ☐ Yes ☐ No
2. Aviation ☐ Pilot ☐ Other (Specify): ……			
3. Military			
3a. Currently on duty ☐ Yes ☐ No	3b. Reserve	3c. Current/past service	3d. Flight surgeon ☐ Yes ☐ No

D. Medical Specialty Information		
1. Boards	2. Specialty societies	3. Aviation medical societies

E. Licence Information		
Questions (If you check Yes, explain in detail under remarks.)	Yes	No
1. Is your licence to practice medicine/surgery limited or restricted in any way?		
2. Has your licence to practice medicine/surgery ever been suspended or revoked?		
3. Has the application for renewal of your licence or medical registration to practice medicine/surgery ever been refused?		
4. Have you ever been charged and convicted of a violation of any State law pertaining to controlled or habit-forming drugs or narcotics?		

F. Remarks

Reference item numbers when explaining previous entries and attaching information.

G. Certification

I certify that the information provided hereon and in attachments is correct to the best of my knowledge and belief, and I agree to the conditions of acceptance which accompanied this application. I further agree that I will acquire all the necessary equipment upon acceptance and prior to my conduct of NCAA medical examinations. If appointed an AAME, I promise to discharge my responsibilities with the highest level of professionalism and in compliance with the provisions of the Nigeria Civil Aviation Regulations (Nig.CARs Part 2)

1. **Date (dd/mm/yyyy):**	2. **Applicant (Name/Signature)**	3. **Professional degree:**

H. NCAA Use Only

1. This application has been reviewed, references have been investigated and/or it has otherwise been determined that the applicant.

☐ **Meets** ☐ **Does not meet** the professional standards required for authorisation as an AAME. ☐ Authorisation not made for the following reasons:	
2. **Applicant authorized as:** ☐ Class 1 AAME ☐ Class 2 AAME ☐ Class 3 AAME	3. **AAME number:** 2. **Supplies/instructions issued**
Name of Medical Assessor:	
Signature of Medical Assessor:	**Date:**

Appendix 1H FORM: O – MED 015 Notice of Denial of Medical Certificate

	NIGERIA CIVIL AVIATION AUTHORITY **Notice of Denial of Medical Certificate**	Reference	FORM: O – MED 015
		Revision/Date	01/ June 2023

1. **Name and address of applicant**:	**2. Date of birth (dd/mm/yyyy):** **3. Date of medical examination (dd/mm/yyyy):**

4. **Class of medical certificate denied** ☐ Class 1 ☐ Class 2 ☐ Class 3

5. Applicable Nig.CARs Part (paragraph number):

6. Disqualifying conditions

Assessment of your application form and medical examination caried out on the above date reveal that you do not meet the medical requirements stated in Nig.CARs Part 2 for a medical assessment/certificate (class as stated above) because of the condition(s) stated above. Accordingly, your application for a medical certificate (class as above) is hereby denied.

I have personally interviewed and examined this applicant and deem his/her medical condition unsatisfactory for issuance of the medical certificate being sought.

The Applicant may wish to apply within Seven (7) days from the date of this denial to the Director General of Civil Aviation (DGCA), Nigeria Civil Aviation Authority NCAA Corporate Headquarters, Nnamdi Azikiwe International Airport, Abuja, F.C.T. Nigeria, for a review.

7. **Signature of Authorised Aviation Medical Examiner** 8. **Date:**

Appendix 1G FORM: O – MED 016 Medical Confidentiality Statement

	NIGERIA CIVIL AVIATION AUTHORITY **Medical Confidentiality Statement**	Reference	FORM: O-MED 016
		Revision	00
		Date	June 2023

The Nigeria Civil Aviation Authority (NCAA) require that non – medical staff of NCAA Aeromedical Standards Department and Authorised Aviation Medical Examiners' (AAMEs) maintain/ respect the highest level of medical confidentiality as contained in Nig.CARs Part 2.11.1.9 with respect to the medical information of aircrew and ATCOs that they may become acquainted with in the performance of their duties.

I ..... Understand that in the course of my duties, I will have access to medical records of licenced aviation personnel, I undertake to hold all information available to me with the highest degree of medical confidentiality.

I shall indemnify the Authority in the event of a breach of the above undertaking.

Name: ……...

Organisation: ……

Signature: …… Date: ……..…….

WITNESS

Name: ……...…….

Organisation: ……..…….

Signature: ……Date: ……..…….