

#### **GUYANA CIVIL AVIATION AUTHORITY**

73 High Street Kingston Georgetown GUYANA TEL. NOs: (592) 225 6822; 225 0778; 227 8111 FAX: (592) 225 6800 E-mail: <u>director-general@gcaa-gy.org</u>

# GCAA ADVISORY CIRCULAR

# AIRWORTHINESS AC NO: GCAA AC/AIR-005

# SUBJECT: RENEWAL OF AIRCRAFT CERTIFICATE OF AIRWORTHINESS

DATE REVISED: 24-08-2016 REVISED BY: Director Aviation Safety Regulation

#### 1. PURPOSE

- a. This Advisory Circular (AC) provides information and guidance concerning an acceptable means of compliance with Regulation 9 of the Guyana Civil Aviation (Air Navigation) Regulations for the renewal of the Certificate of Airworthiness of an aircraft registered in Guyana. The required form(s) are obtainable from the Guyana Civil Aviation Authority (GCAA) head office at 73 High Street, Kingston, Georgetown, Guyana.
- b. Contained in this AC are criteria recommended by the Authority for the renewal of an aircraft Certificate of Airworthiness. Thus, this document applies to the process by which a person or company shall apply for the renewal of an aircraft Certificate of Airworthiness.

#### 2. AUDIENCE

This AC affects owners and operators of Guyana registered aircraft who are seeking to have their aircraft Certificate of Airworthiness renewed.

#### 3. CANCELLATION

As of its effective date this, AC cancels Airworthiness AC #: 05 dated 5<sup>th</sup> July, 2005.

#### 4. **EFFECTIVE DATE**

This AC is effective 1<sup>st</sup> September, 2016.

#### 5. CHANGES

The reason of this change is to remove the requirement for an aircraft test flight as a prerequisite for the renewal of an aircraft airworthiness certificate.

#### 6. **RELEVANT REFERENCES**

- a. Guyana Civil Aviation (Air Navigation) Regulations [GCARs] Regulation 9.
- b. Guyana Aviation Requirements [GARs] Part 5.4.6 (a) (2).

# 7. Contact Information

# Director General of Civil Aviation

73 High Street, Kingston, Georgetown, Guyana Phone: (592) 225 6822, FAX: (592) 225 6800 E-mail: director-general@gcaa-gy.org **Director Aviation Safety Regulation** Phone: (592) 225 0778 E-mail: dasr@gcaa-gy.org

# 8. FORM(S) TO BE USED

Airworthiness Engineering Report GCAA Form No. AW 020.

# 9. PROCEDURE

- a. Application for renewal of a Certificate of Airworthiness (C of A) shall be submitted in writing to the Director General of Civil Aviation (DGCA), together with the prescribed fee. The application shall be made at least 28 days before expiry of the current period of validity of the Certificate of Airworthiness so that all necessary formalities can be completed and the Certificate of Airworthiness renewed before the expiry date.
- b. The renewal of a C of A is dependent on evidence being provided that the aircraft complies with the appropriate airworthiness requirements and is airworthy.
- c. An inspection of the aircraft and all relevant records shall be done prior to the renewal of the Certificate of Airworthiness. The depth and extent of the inspection will depend on:
  - 1) The age of the aircraft, areas and types of operation, and conditions of storage.
  - 2) The extent of any un-programmed work that was carried out on the aircraft since the last renewal following such events as serious or repetitive defects, defects or damages requiring major repairs or modifications, inspections following hard or heavy landings or abnormal stresses during flight or on the ground, corrosion in major structure, etc.
  - 3) The time in service since new and since overhaul of any components of the aircraft, engines, propellers or equipment which are subject to an approved overhaul period.
  - 4) Changes of major structural components such as wings, tail-planes, helicopter rotors or transmission components and histories of the replacement components.
- d. It is required that:
  - 1) The aircraft should be made available, at a time and place acceptable to the Authority, for such checks and inspections required by the Authority.
  - 2) The necessary personnel and equipment should be made available so that the required checks and inspections can be carried out satisfactorily.
  - 3) All relevant records of previously completed inspections, maintenance, calibration, etc., since the last C of A renewal shall be made available to the Authority for inspection.
  - 4) All work for the maintenance of airworthiness of the aircraft shall be carried out under the supervision of an Approved Maintenance Organisation (AMO) in a manner acceptable to the Authority and in conformity with the requirements, specifications, drawings and instructions relating to the approved design of the subject aircraft.
  - 5) Full particulars of the work accomplished shall be entered in the appropriate log books and a maintenance release issued.

- e. The following maintenance tasks shall be complied with in accordance with the aircraft approved Maintenance Programme and the results recorded in the relevant statuary log books, and duly signed by an appropriately Licensed Aircraft Maintenance Engineer (LAME) of the AMO:
  - 1) Carry out compass swing/check swing and affix correction card;
  - 2) Carry out annual radio check and issue a Certificate of Release to Service;
  - 3) Leak test pitot/static system;
  - 4) Check calibrate airspeed indicator and record results;
  - 5) Check calibrate /leak check vertical speed indicator and record results;
  - 6) Check calibrate altimeter and record results;
  - 7) Check all engine controls for full and free movement;
  - 8) Check all flying controls for full and correct movement in the right sense and record results;
  - 9) Function check all emergency exits;
  - 10) Check electrical bonding and static wicks;
  - 11) Check all bladder fuel cells in situ for security, condition and wrinkles;
  - 12) Check calibrate all engine RPM indicators;
  - 13) Check fire extinguisher/s contents by pressure/weight;
  - 14) Check first aid and jungle survival kits contents for sufficiency of items and that their expiry dates are within limits; and
  - 15) Update modification status record and submit same.
- f. The following documentation shall be provided to the Authority at the time of C of A renewal:
  - 1) Original Certificate of Airworthiness;
  - 2) Receipt of payment of the required processing fees.
  - 3) A completed copy of Airworthiness Engineering Report Form No. AW020. This Report shall include the following information:
  - 4) A summary of Programmed maintenance completed since the last issue or renewal of the C of A.
  - 5) A statement of mandatory modification/inspection status together with dates of compliance, and for those of a repetitive nature, the last inspection done and when next due.
  - 6) Confirmation that the aircraft's mass and balance report reflects the current configuration of the aircraft.
  - 7) A statement that the required placards and markings specified in the aircraft Type Certificate Data Sheet/Approved Flight Manual/Aircraft Manufacturer's Drawing, as the case may be, are complied with.
  - 8) Evidence acceptable to the Director General of Civil Aviation that the amendment status of the Approved Flight Manual is current.
  - 9) Evidence that annual compass swing/loop swing has been done and is current.
  - 10) Evidence that all GCAA Additional Requirements have been complied with.

# **10. VALIDITY OF A CERTIFICATE OF AIRWORTHINESS**

- a. The period of validity of the Certificate of Airworthiness shall be limited to a maximum period of one year (12 calendar month from time of issue or renewal). The prior approval of the Director General of Civil Aviation will be required for any variation of this rule. The Director General of Civil Aviation may, however, vary a certificate to suit any circumstances that may arise.
- b. The Authority shall not grant any ad-hoc extension to a Certificate of Airworthiness.
- c. The validity of a C of A will remain continuous during the renewal process provided all requirements are established in a timely manner, such as, prerequisite fees are paid, Engineering Report is submitted at least 28 days prior to expiration of the C of A, aircraft and documents are presented for inspection in a timely manner so that any discrepancies found can be rectified before expiration of the C of A.
- d. If the renewal process is completed after the current date of validity has expired, the new period of validity of the C of A will start from the date the aircraft was inspected.
- e. The verso of the C of A will indicate the date of inspection and the new expiry date of the C of A.
- f. A Certificate of Airworthiness shall cease to be valid for any of the following reasons:
  - 1) If the aircraft or its equipment which is essential to the continued airworthiness of the aircraft has been overhauled or replaced, or such equipment is removed or replaced, other than in a manner which complies with the maintenance and repair procedures issued by the manufacturer as approved data.
  - 2) If an inspection or maintenance of the aircraft or its equipment as required by the approved Maintenance Programme is not carried out.
  - 3) If any modification or inspection required by an Airworthiness Directive or a Mandatory Inspection required by the Director General of Civil Aviation is not carried out within the specified time limits.
  - 4) If the aircraft sustains major damage such that the design specification of the aircraft is altered as a result of the damage.
  - 5) If "life" components are not replaced within the life limits of the components.

# 11. SUSPENSION OR WITHDRAWAL OF A CERTIFICATE OF AIRWORTHINESS

In the event a Certificate of Airworthiness is suspended or withdrawn by the Director General of Civil Aviation, the C of A shall be returned to the Authority without delay. When a C of A is suspended, the certificate will be returned to the Owner/Operator with an endorsement stating the period of suspension. Re-instatement will be made with an endorsement to that effect. In both of these cases, the period of validity will not exceed that of the C of A before it was suspended or withdrawn.

# 12. INSPECTION OF AIRCRAFT AND TECHNICAL RECORDS

Depending on the type of operations, the inspection of an aircraft and the relevant records shall be carried out by an Approved Maintenance Organisation to determine the extent of work to be undertaken to maintain the continued airworthiness standard of the aircraft. For this purpose, the following factors shall be taken into account:

- 1) The requirements of the approved Maintenance Programme of the aircraft, including the periods between overhauls of aircraft components and other limitations, if any, have been complied with.
- 2) The requirements of the approved Maintenance Programme remain relevant to the age of the aircraft, its utilisation and the type of operations in which it is engaged.
- 3) The mandatory inspections or modifications status are complied with.
- 4) Manufacturer's recommendations contained in Service Bulletins and other service information have been reviewed and appropriate action taken.
- 5) There is satisfactory evidence that all modifications and repairs completed since issue or last renewal of the C of A are the subject of approved design data and their accomplishment properly certified.
- 6) An inspection status report shall be prepared, to include details of any work considered necessary and a copy of the report forwarded to the Authority for review of the adequacy of the proposed work or any additional checks or inspections necessary for the purpose. The applicant will be advised of any further work considered necessary.
- 7) Following completion of the foregoing formalities the Authority may wish to complete a inspection of the aircraft and the applicant will be notified accordingly.
- 8) All maintenance etc., in connection with the renewal of the C of A of an aircraft in the Transport/Passenger Category shall be undertaken under the supervision of appropriately Licensed Aircraft Maintenance Engineers of an AMO.
- 9) Full particulars of the work accomplished, together with details of the aircraft's mandatory modification and inspection status shall be entered in the appropriate log books and certified by appropriately Licensed Aircraft Maintenance Engineers.

# 13. REWEIGHING OF AIRCRAFT

- a. Reweighing of aircraft will be dependent on the history of the aircraft concerned and the date of last weighing. Aircraft is required to be reweighed and a new Mass and Balance Report/Schedule must be prepared and a copy submitted to the Authority for approval.
- b. A Mass and Balance Report/Schedule is required for the following:
  - 1) The whole or fifty percent and more of the aircraft was repainted; or
  - 2) Any major maintenance work was done on the aircraft that requires reweighing, e.g. major structural repairs, modifications, etc.; or
  - 3) As required by Regulations.

#### Approved by:

Lt. Col (Ret'd.) Egbert Field Director General of Civil Aviation Guyana Civil Aviation Authority