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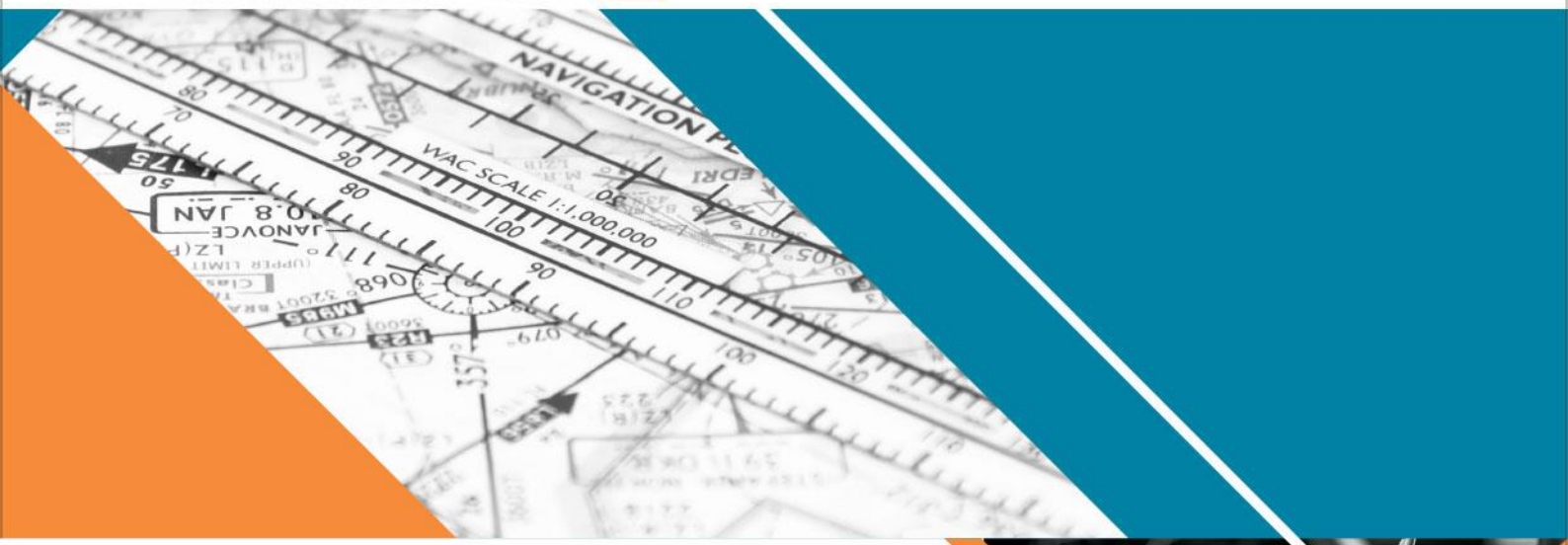

Approved system of maintenance for Class A aircraft

Date	November 2022
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This Civil Aviation Advisory Publication (CAAP) provides guidance, interpretation and explanation on complying with the Civil Aviation Regulations 1988 (CAR) or a Civil Aviation Order (CAO).

This CAAP provides advisory information to the aviation industry in support of a particular CAR or CAO. Ordinarily, the CAAP will provide additional 'how to' information not found in the source CAR, or elsewhere.

Civil Aviation Advisory Publications should always be read in conjunction with the relevant regulations/orders.

Audience

This Civil Aviation Advisory Publication (CAAP) applies to:

- Certificate of registration holders for class A aircraft.
- Registered operators for class A aircraft.
- Operators (AOC holders) of class A aircraft.
- Authorised persons for the purpose of regulations 42M and 42R of CAR 1988.
- Maintenance controllers (class A aircraft).

Purpose

The purpose of this CAAP is to provide information and guidance on a means of developing, amending and seeking approval of a system of maintenance for an aircraft required by regulation 39 of CAR 1988. This publication is primarily aimed at operators of Part 25 (transport category) aircraft.

For further information

For further information on this CAAP, contact CASA's Airworthiness and Engineering Branch (telephone 131 757).

Status

This version of the CAAP is approved by the Branch Manager Airworthiness & Engineering.

Note: Changes made in the current version are not annotated. The document should be read in full.

Version	Date	Details
v1.1	November 2022	Administrative review only.
(0)	May 2006	Initial CAAP.

Contents

1 Reference material

1.1 Acronyms

The acronyms and abbreviations used in this CAAP are listed in the table below.

Acronym	Description
ALI	Airworthiness Limitation Item
AME	Aircraft Maintenance Engineer
ATA	Air Transportation Association
CAO	Civil Aviation Order
CAR	Civil Aviation Regulation
CAAP	Civil Aviation Advisory Publication
CDCCL	Critical Design Configuration Control Limit
CMR	Certification Maintenance Requirement
ICA	Instructions for continued airworthiness
MCM	Maintenance Control Manual
MEL	Minimum Equipment List
MPD	Maintenance planning document
MRB	Maintenance Review Board
MRBR	Maintenance review board report
MSG-3	Maintenance steering group logic process
NAA	National Aviation Authority
OSIP	Overhaul and Special Inspections Periods
RO	Registered Operator
SB	Service Bulletin
SL	Service Letter
SIL	Service Information Letter
SoM	System of Maintenance
STC	Supplemental Type Certificate
TBO	Time between overhaul
TC	Type Certificate

1.2 Definitions

Terms that have specific meaning within this CAAP are defined in the table below. Where definitions from the civil aviation legislation have been reproduced for ease of reference, these are identified by 'grey shading'. Should there be a discrepancy between a definition given in this CAAP and the civil aviation legislation, the definition in the legislation prevails.

Term	Definition
Airworthiness limitations	These are mandatory replacement times, structural inspection intervals, and related structural inspection tasks. These periods are operating limitations of the type certificate and take into consideration such things as: • the criticality of the function performed • the exposure of parts to fatigue or wear Airworthiness limitations perform a preventative maintenance function and should not be confused with CMRs. The airworthiness limitations are published in an airworthiness limitation document. These may be published in the ICA for the aircraft, and compliance with airworthiness limitations is mandatory. Airworthiness limitations are excluded from any escalation process by the operator.
Authorised person	means a person authorised by CASA under the provision of regulation 6 of CAR 1988 for the purpose of regulation 42M and 42R of CAR 1988.
Certification maintenance requirement	(CMR) - A CMR is a required periodic task, established during the design certification of the aircraft as an operating limitation of the type certificate. CMRs are tasks identified during the type certification process. CMRs usually result from a formal, numerical analysis conducted to show compliance with catastrophic and hazardous failure conditions. A CMR is intended to detect safety significant latent failures that would, in combination with one or more other specific failures or events, result in a hazardous or catastrophic failure condition. There are two types of CMRs: namely one star (*) CMRs and two star (**) CMRs. Only the NAA of the State of the type design can vary task intervals of one-star CMRs. It is important to note that CMRs are derived from a fundamentally different analysis process than the maintenance tasks and intervals that result from MSG-3 analysis
Maintenance task	An action or set of actions required to achieve a desired outcome which restores an item to or maintains an item in serviceable condition, including inspection and determination of condition or defect rectification.
Registered operator	In accordance with transitional provisions for Part 47 of CASR 1998 (see regulation 202.222 of CASRs 1998): • A reference in CAR 1988 to the holder of a certificate of registration of an aircraft is taken to be a reference to the registered operator (RO) of the aircraft. • A duty imposed on the holder of a certificate of registration of an aircraft is taken to be imposed on the registered operator of the aircraft.
System of maintenance	In this CAAP, reference to a system of maintenance means a document that includes: • ‘what’ maintenance must be carried out; • ‘when’ maintenance must be carried out; and

Term	Definition
	It includes scheduled, non-scheduled maintenance and guidance on 'how' the maintenance is to be carried out. It, however, does not include maintenance control and maintenance performance aspects. Time-lifed aircraft component, means an aircraft component, including an engine or propeller, that: • the manufacturer of the component; or • if the component has been modified—the designer of the modification; or • CASA; has instructed must be retired or overhauled or removed from an aircraft within a particular period.
Type certificate holder's maintenance schedule	in relation to an aircraft, means recommended maintenance specifications issued by the type certificate holders of the aircraft that sets out "what" maintenance should be carried out on the aircraft and "when" it should be carried out. It is recognised that many type certificate holders publish maintenance specifications for the aircraft in different documents, even for one aircraft type.

1.3 References

Legislation

Legislation is available on the Federal Register of Legislation website https://www.legislation.gov.au/

Document	Title
regulation 39 of CAR	requirements for maintenance of class A aircraft
regulation 40 of CAR	requirements for maintenance of class A aircraft
regulations 42J to 42T of CAR	covering request and approval, etc., of systems of maintenance

2 Introduction

2.1.1 The airworthiness of an aircraft is a multi-dimensional process because it involves a wide range of activities in the diverse fields of design, manufacture, maintenance and operations.

2.1.2 The registered operator of an aircraft is responsible for the continuing airworthiness of the aircraft.

2.1.3 To ensure the continuing airworthiness of an aircraft, during its entire life cycle, many aspects, such as maintenance requirements and control thereof, repairs and modifications must be considered. The maintenance requirements may also vary with the operating environment and role of the aircraft.

2.1.4 Regulations 39(1) and 39(2) of CAR 1988 require the registered operator of a class A aircraft to ensure that all required maintenance on an aircraft, including any aircraft components from time to time included in or fitted to the aircraft, is carried out in accordance with the aircraft's approved system of maintenance (SoM).

2.1.5 The minimum contents of a SoM are outlined in regulation 42L and 42M(3) of CAR 1988.

2.1.6 However, a SoM encompasses the total aircraft, including all avionics equipment, survival equipment, emergency equipment, cargo provisions, role equipment etc., and takes into account any modifications/repairs made to the aircraft. The SoM also takes into account the aircraft’s operational role, in particular the need for compliance with operational requirements such as those for Instrument Flight Rules, Extended Range Operations, Category II & III approach minima and operation with Reduced Vertical Separation, etc.

2.1.7 An approved SoM for an aircraft is a non-transferable document, i.e., if another person becomes the RO of the aircraft then new approval for the SoM is required, even if the aircraft retains the same registration mark.

2.1.8 An aircraft is maintained to only one approved SoM at a given point in time. Where a registered operator wishes to change from one approved SoM to another, a transfer check or inspection may need to be performed in order to implement the change.

2.1.9 A SoM must be approved for each aircraft by the registration mark. However, a SoM may cover more than one aircraft of the same type.

2.1.10 Approval of a SoM, and the transfer of aircraft on to an existing SoM, are two separate issues. Approval of the SoM does not in itself establish when the tasks are next due for a particular aircraft.

2.1.11 A SoM is approved or amended by CASA directly or by an authorised person for the purpose of regulation 42M/42R of CAR 1988, in accordance with a procedure approved by CASA.

2.1.12 An approved SoM is reviewed periodically by the RO to determine its effectiveness. An approved SoM may become inappropriate for a variety of reasons such as:

- changes to a maintenance schedule recommended by the TC holder of the aircraft or manufacturers of components.

- changes in instructions for continuing airworthiness e.g., maintenance manual, service bulletins etc.
- the result of information gained from the operator's reliability program which may indicate the need for a change in content or interval of some inspections/tests, etc.
- an aircraft's operation may change such that operations are conducted in relatively more or less demanding roles, especially:
- change in flight sectors, such as flights of short duration and/or of increased frequency
- operations from short or rough fields
- operations in aggressively corrosive environments, e.g., coastal operations
- the aircraft may be modified by a configuration change, change of installed equipment, or by repairs to damage tolerant structures
- the aircraft may be experiencing unusually high failure rates on the types of components that would respond to preventative maintenance.

2.1.13 Regulation 42P of CAR 1988 requires that any subsequent amendments to an approved SoM must also be approved by CASA or an authorised person.

3 Documentation

3.1.1 A SoM is documented and includes at least the following:

- A list of effective pages
- Amendment/revision status
- A table of contents.
- A preamble defining the SoM contents, the maintenance specifications to be applied, permitted variations to task frequencies and, where applicable, any procedure to escalate established check/inspection intervals, etc.
- Notes and definitions.
- Maintenance tasks, including frequencies, for individual systems and/or components identified by ATA specifications 100.
- Procedural instructions for carrying out the maintenance tasks.

4 Content of system of maintenance

4.1 Basic information

4.1.1 A SoM includes the following information and instructions, as applicable:

- Name and contact address of the registered operator.
- Registration mark(s) and serial number(s) of the aircraft.
- Type, make & model of aircraft, engine and where applicable, auxiliary power units and propellers/rotors.
- SoM approval reference number, date of issue, and issue number (this information is provided once the SoM has been approved).
- Anticipated utilisation of the aircraft. Utilisation normally provides for a tolerance of 25%. Where utilisation cannot be anticipated, a calendar time limit is included.
- Check periods, based on the anticipated utilisation of the aircraft.
- Inspection standards to be applied, permitted variations to task frequencies and, where applicable, any procedure to manage the evolution of established check/inspection intervals.
- Details of pre-flight maintenance tasks that are accomplished by maintenance staff.

Note: Pre-flight walk around checks performed by flight crew or daily and pre-departure checks intended to be performed by unlicensed personnel, need not form part of the SoM. These tasks should be addressed in other appropriate documents.

- Nomination of a maintenance check for issue of the maintenance release. Generally, operators nominate this check based on the utilisation rate of the aircraft.
- A statement that practices and procedures to satisfy the SoM are performed to the standards specified in the TC holder's maintenance instructions. In the case of approved practices and procedures that differ from the TC holders' instructions, the statement should refer to them.
- A statement highlighting that whenever vital points and control systems are disturbed during maintenance, the affected system shall be subjected to independent inspection (as minimum, provisions of regulation 42G of CAR 1988 are covered).
- A statement to the effect that the specified aircraft will be maintained to the SoM and that the SoM will be reviewed and updated as required.
- MEL approval reference number, date of issue, and issue number, if applicable.
- Maintenance Reliability Program approval reference number, date of issue, and issue number, if applicable.

4.1.2 Where not addressed in other maintenance documents, it may be required for maintenance tasks (e.g., inspection, cleaning, checking, lubricating, replenishing, adjusting, testing, etc.) to be defined and explained in notes and definitions section of the SoM.

4.2 Scheduled Maintenance Tasks

4.2.1 Scheduled maintenance consists of all the individual maintenance tasks performed according to the time limitations in the maintenance schedule.

4.2.2 Scheduled tasks are based on one of the following sources:

a. A maintenance review board (MRB) report or equivalent document;
b. A TC holder's recommendation (non-MRB aircraft);
c. A SoM approved for other Australian operators; or
d. Other data acceptable to CASA.

and are discussed as follows:

4.2.3 A Maintenance Review Board (MRB) Report or Equivalent Document (4.2.2 a)):

- Where an aircraft type has been subjected to the MRB report process, a registered operator normally develops the initial SoM for the aircraft based on the MRB report.
- Normally, schedules include all the tasks listed in the MRB report, plus any additional tasks arising from the role in which the aircraft is to be employed or the environment in which it is to be operated. The intervals between tasks specified in the MRB report are regarded as the maximum intervals for the operator's initial schedule and may be adjusted downward if the utilisation or environment may have a detrimental effect.
- Each scheduled maintenance task based on MRB report should contain identification cross reference to the MRB report tasks such that it is always possible to relate such tasks to the current approved SoM.
- MRB reports usually address only the basic aircraft and should therefore be supplemented by additional tasks to ensure the serviceability of optional equipment, including galley and passenger service equipment, life jackets, medical kits, etc.
- The aircraft TC holders usually produce a maintenance planning or other such document to assist operators in planning and structuring a SoM. Normally a maintenance planning documentation (MPD) includes a copy of the MRBR with the tasks packaged in a manner that is usable to the operator. They also include other tasks derived from processes other than the MRBR.
- For example, tasks that may be included are Airworthiness Limitations, which would include structural fatigue related tasks for damage tolerant aircraft, life limited parts, CMRs, CDCCLs, and fuel tank system mandatory replacement times and inspection intervals.
- They would also include recommended tasks for equipment and parts of the aircraft not addressed by the MRBR such as those mentioned above. The registered operator of an aircraft should ensure that these aspects of the MPD or the aircraft TC holder's recommendations are included within their SoM.
- In the case of older aircraft where the TC holder has not kept the MRBR current, the MPD or other documents may have incorporated informal or supplementary information. These amounts to TC holder's recommendations which result in maintenance tasks different than those that were originally developed as part of the MRB. In such case, due consideration to the TC holder's recommendations is given.

4.2.4 The TC Holder's Recommendations (Non-MRB Aircraft) (4.2.2 b)):

- If a SoM is based on the TC holder's recommendations and all necessary additional items resulting from the operator's role, environment and optional equipment are also included, it will normally be found acceptable.
- It should be noted that the "TC holder's recommendations" are not limited to the basic recommended maintenance schedule in the maintenance manual. Recommendations issued in the following form also need to be evaluated:
  - Instructions for continued airworthiness (ICAs) and/or other publications (e.g., SBs, SLs, SILs) issued by the TC holder (airframe, engine, or propeller)
  - Recommendations issued by the applicable supplemental type certificates (STC) holders
  - Maintenance requirements arising out of repair design or modifications
  - Other relevant documents
- In certain cases, individual tasks recommended by the TC holder may be omitted from the operator's initial maintenance schedule, but approval for such action will be dependent upon the applicant's ability to demonstrate to the satisfaction of CASA or an authorised person, that the omission will not have any adverse effect on safety.
- It is generally observed that TC holder's maintenance recommendations for many older aircraft do not include avionics, emergency appliances, role equipment, and related installations or in some instances do not cover them adequately.
- The registered operator developing the SoM should ensure that the maintenance schedules recommended by the TC holder for the aircraft contains all the necessary maintenance requirements and covers the following as applicable:
  - Airframe
  - Engine(s)
  - Propeller(s) or rotors
  - Mechanical systems
  - Electrical systems
  - Instruments
  - Communication/Navigation systems
  - Emergency systems and equipment
  - Other equipment installed on the aircraft, e.g., role equipment.
- For maintenance significant components, equipment and systems that are not adequately covered in TC holder's recommended maintenance schedule, the SoM includes instructions from the manufacturer of the component, equipment or systems as appropriate.
- Where instructions are not available or inadequate, the SoM at least provides for a detailed visual inspection and functional check of the components, equipment or systems.

4.2.5 A SoM Approved for Another Australian Operator (4.2.2 c)):

- Although approved SoMs are not transferable, operators may base their schedules upon those of another Australian operator(s).
- Applications to base a schedule upon that of another operator usually occur when an operator:

- purchases or leases an aircraft, and wishes to take over the previous operator's SoM as part of the package; or
- contracts out the maintenance arrangements to maintain the aircraft in accordance with another operator's approved SoM.

- If the assessment of the application results in changes to tasks or intervals, it will be necessary to re-calculate (pro rata) the times when the tasks are next due.
- Analysis of schedules developed in this way should involve a comparison between the two operations.
- Acceptance of the SoM will depend upon the applicant's ability to demonstrate that the role, aircraft configuration, route structure, type of evaluation program and environment are essentially the same in both cases. A comparison of the reliability programs of the previous operator and the applicant would be required. In addition, the assessment will take into account the relative experience of each operator with the aircraft type, or with similar types. An operator may not take credit for another operator's established TBO, or other intervals, unless the operator can show equivalent competence and experience.

4.2.6 Other Data Acceptable to CASA (4.2.2 d)):

- This heading covers a wide range of possible sources, including schedules approved by other airworthiness authorities, military schedules, and in rare cases, completely new schedules resulting from the operator's analysis of the aircraft design. The depth of review required for approval will depend upon the circumstances of the individual case.

4.2.7 To avoid any inadvertent amendments to applicable mandatory regulatory requirements, each scheduled task containing the details of maintenance tasks related to mandatory life limitations, CMR, CDCCL and ADs have some specific identification of their mandatory status and can be cross-referenced to the source documents.

4.2.8 Normally a SoM for class A aircraft is a self-contained document and does not exclusively refer to manufacturer's schedules. This is because an aircraft's configuration status can vary from the baseline aircraft.

4.2.9 However, in certain circumstances, such as, for a newly manufactured aircraft it may be appropriate to incorporate manufacturer's schedules by reference.

4.3 Task intervals

4.3.1 Each scheduled task specifies at what interval it is to be carried out. A task interval is stated in terms of calendar times, cycles, landings and operating hours, as applicable.

4.3.2 The maintenance task frequencies included in the initial SoM generally reflect the recommendations (MRB Report, MPD, Chapter 5 of the Maintenance Manual, etc.) issued by the aircraft certification authority or the aircraft TC holder. Frequencies may be adjusted later in accordance with the operator's reliability program or as a result of the operator's monitoring of the effectiveness of the SoM.

4.3.3 Task intervals of CMRs, CDCCL, ALIs and any regulatory requirements are not permitted to be varied without prior approval of CASA or an authorised person.

4.3.4 Scheduled tasks having comparable frequency are normally grouped into checks e.g., Check A, B or Check I, II etc.

4.3.5 All maintenance tasks scheduled to occur out of phase with the check cycles, are identified and listed in a separate document. This list is sometimes called the OSIP - Overhaul and Special Inspections Periods document.

4.4 Time-lifed items

4.4.1 A list of time-lifed items/components, CMRs and ALIs installed in the aircraft and when each of those components is to be retired, overhauled and/or removed.

4.5 Non-scheduled maintenance

4.5.1 Non-scheduled maintenance includes procedures, instructions, and standards for maintenance that occurs on an unscheduled or unforeseen basis. A need for non-scheduled maintenance may result from scheduled maintenance tasks, reported defects, or unforeseen events such as hard or overweight landings, tail strikes, lightning strikes, or engine over-temperature etc. Instructions and standards for the accomplishment of non-scheduled maintenance are included in the SoM.

4.5.2 A schedule of inspections for reported abnormal occurrences is developed in accordance with instructions issued by the TC holder. These inspections may include, but not be limited to, the following occurrences:

- Lightning strike *
- Abnormal flight loads *
- Abnormal ground loads *
- Heavy or overweight landings
- Exceeding airspeed/acceleration limits
- Burst tyre(s)
- Immersion in water
- Propeller and rotor strikes
- Spillage of corrosive substances
- Indications of overspeed, high/excessive temperature, or over-torque
- Use of contaminated or incorrect grades of fuel or oil
- Ingestion of chemical extinguishing agent
- Bird strike
- Ground incidents
- Tail scrapping
- High energy stop

Note: '*' Represents regulatory requirement of CAR 42L.

4.5.3 These instructions are to be in the SoM. They may be referenced in the SoM and detailed in a separate manual, (e.g., the maintenance manual or any other document) in a format that can be cross-referenced.

4.6 Provision for continuing airworthiness

4.6.1 Regulation 42M of CAR 1988 requires that a SoM must adequately provide for the continued airworthiness of the aircraft. If applicable, details of specific structural maintenance programs such as the following are included in the SoM:

- Corrosion prevention and control program (CPCP);
- Supplemental structural inspection documents (SSID);
- Structural integrity inspection program (SIIP);
- Ageing aircraft or similar program issued by the TC holder.

4.7 Maintenance task categorisation

4.7.1 STC holders' recommended maintenance schedules are generally developed for the AME licensing systems of the aircraft type certification NAAs and may not suit the Australian AME licensing system.

4.7.2 Each maintenance task is normally identified according to the appropriate maintenance categories such as:

- Airframe
- Engines
- Radio
- Electrical
- Instruments

4.7.3 This may be achieved by grouping the cards by category, marking them individually, etc.

4.7.4 In addition to the above, where maintenance tasks cover activities such as non-destructive testing, welding, etc., they are also specified separately.

4.8 Instructions for accomplishing tasks

4.8.1 A SoM includes instructions for the maintenance tasks and the requirements to record results of the inspections, checks, tests, etc. The instructions include information in a form suitable for use by the person performing the work. Following are several means of accomplishing these guidelines:

- The instructions may be printed directly on the work forms.
- They may be published in a manual, in a format that can be cross-referenced.

4.8.2 These instructions address methods, techniques, practices, tools & equipment to perform the task and provide standards regarding acceptance/rejection criteria, dimensions and tolerances in accordance with the latest provisions of the applicable approved data.

4.8.3 References to specific chapters, sections, or paragraph of the aircraft's maintenance manual, or other pertinent approved airworthiness data can be included on the work forms.

4.8.4 While instructions for accomplishing the maintenance tasks form part of a SoM and are developed from approved data, these instructions are not subject to CASA or an

authorised person's approval. It is the responsibility of the RO to ensure these instructions are updated to the latest revisions status and do not require approval by CASA or an authorised person.

4.9 Maintenance reliability programs

4.9.1 A maintenance reliability program is a part of an approved SoM.

4.9.2 Maintenance reliability programs are designed to supplement the operator's overall maintenance system for maintaining aircraft in a continuous state of airworthiness. The purpose of a maintenance reliability program is to recognise, and act upon meaningful symptoms of deterioration before malfunction or failure in order to establish and monitor the maintenance control requirements. Data gained from these programs can provide justifications for escalations and therefore efficiency and financial benefits.

4.9.3 All operators of transport category aircraft engaged in commercial operations are required, as part of the SoM for those aircraft, to have in place a maintenance reliability program where:

- the aircraft's maintenance program is based on MSG-3 logic process; or
- the aircraft's SoM includes condition monitored components; or
- the aircraft's SoM does not contain overhaul time periods for all significant system components; or
- it is required by the MRB report issued by the NAA responsible for type certification of the aircraft or the TC holder's MPD.

4.9.4 A maintenance reliability program is not required, where:

- The maintenance program is based on the MSG-1 or MSG-2 logic process, but only contains hard time or on condition items; or
- The aircraft's Maximum Take-off Weight is 5700 kg or below: or
- The aircraft's SoM provides overhaul time periods for all significant system components.

4.9.5 For more details regarding a maintenance reliability program, see CAAP 42M-2.

4.10 Minimum equipment list

4.10.1 An MEL is a document that allows for the operation of an individual aircraft by a specific operator under specified conditions, with particular item(s) of equipment inoperative at the time of dispatch for an intended flight.

4.10.2 CAO 20.18 requires an operator of regular public transport aircraft to have an approved MEL for each aircraft operated.

4.10.3 While an MEL is approved under regulation 37 of CAR 1988, regulation 42L of CAR 1988 requires that if permissible unserviceabilities have been approved for an aircraft in the form of an MEL, the MEL must be included in the SoM for the aircraft.

4.10.4 For more details regarding MELs, see CAAP 37-1.

5 Evaluation of a SoM

5.1.1 A SoM or its subsequent amendment is evaluated by the registered operator prior to submitting it to CASA or an authorised person for approval.

5.1.2 This evaluation establishes, as a minimum, that the SoM applies to the aircraft make, model, configuration and modification status, and that it encompasses the avionics installation and all aircraft equipment fitted or fitted from time to time.

5.1.3 A SoM is also evaluated for its suitability with regard to the geographic location and climatic conditions of the operation. Evaluation includes, sector length (flight time between take-off and landing), and the provisional inspection for special purpose operations. For example, overwater or chemical spraying operation.

6 SoM approval process

6.1 Application for approval of a SoM

6.1.1 An operator submitting a SoM for approval should provide CASA or an authorised person with:

- a letter or application requesting approval of the SoM from the registered operator of the aircraft; and
- a copy of the proposed SoM, and
- to assist the person assessing the application, information describing the SoM may be provided by the applicant (see Example of System of Maintenance Description and Certification Statement at Appendix A to this CAAP).

6.1.2 Where a SoM covers more than one aircraft of the same type, all differences in the equipment/systems installed in those aircraft, if any, are clearly identified by registration marks.

6.2 CASA fees

6.2.1 Approval or amendment of a SoM attracts a fee. On receipt of an application for approval of a SoM (or amendment to an approved SoM), CASA will notify the applicant of an estimate of the fee for assessment of the application.

6.2.2 The total chargeable fee is based on the actual work hours involved in assessing the SoM at the hourly rate published in the Civil Aviation (Fees) Regulations. CASA will not initiate SoM assessment process unless the applicant pays the estimated fee.

6.3 Interim approvals

6.3.1 CASA or an authorised person may approve an incomplete SoM (interim scheme) at the start of operation of an aircraft for an operator, subject to limiting the approval of the SoM to a period that does not exceed any required maintenance not yet approved.

6.4 Revision of a SoM

6.4.1 A revision to a maintenance task may be based on analysis of service experience, tests, or inspections. This analysis should review the effectiveness of the maintenance task, assessing the historical data relating to the serviceability or condition of the aircraft, aircraft system, powerplant, component or structure and including modifications, and consider environmental and operational factors.

6.4.2 CASA or an authorised person is to be notified that the analysis of tasks has been based on inspection, test and disassembly. This is to ensure that CASA or the authorised person can observe and verify the actions as appropriate.

6.4.3 Historical data for revisions based on service experience is provided by the applicant.

6.4.4 TC holders' recommendations or inspection program revisions do not, by themselves, permit change to a SoM. Any change to a SoM must be justified by the registered operator and approved by CASA or an authorised person.

6.4.5 A revision to a SoM may include:

- Additions of tasks
- Deletions of tasks
- Modifications to tasks
- Changes in tasks frequencies
- Deletion of aircraft from the applicability list

6.4.6 Note: Editorial changes or revisions that reflect an amendment status to other approved documents such as MELs, Reliability Programs, etc. do not require approval by CASA or an authorised person.

6.4.7 For assessment of approval of a revision, the following documents are submitted to CASA or an authorised person:

- The proposed revision to the SoM
- Justification to every change, such as:
  - Amendments to source documents (as applicable: TCDS, MRB report, MPD, Chapter 5 of the Maintenance Manual, Life limitations, CPCP, CMRs, etc.)
  - Modifications, including Service Bulletins, Airworthiness Directives, and repairs
  - Data arising from the reliability program or the monitoring of the SoM effectiveness.

Appendix A

Example of system of maintenance description and certification statement

A.1 System of maintenance applicability

A.1.1 Registered operator's name and address

……

……

……

A.1.2 This System of maintenance is applicable to the following:

a. Registration mark(s) & Serial No: .....
b. Aircraft type/model: …….....
c. Engine(s) type: .....
d. APU type: .....
e. Propeller type: .....

A.1.3 Source of maintenance tasks

The system of maintenance or interim schedules is based upon (complete as appropriate):

a. The MRB report: …….. Rev # ……..
b. The following type certificate holder's recommendations

Maintenance planning document: …… Rev # ……..
Airframe document: …… Rev # ……..
Engine document: …….. Rev # ……..
Propeller document: …….. Rev # ……..
Equipment Manuals (CMM): …… Rev # ……..
Other document: ……. Rev # ……..

c. Another operator's system of maintenance:

Name of the other operator: .....
SoM approval no.: …… (Please attach copy of schedule).

d. Other data (described below):

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.....
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.....
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.....
.....
.....
.....

e. The system of maintenance incorporates the requirements of the following additional maintenance instructions, as indicated:

SSID document: ..... Rev # .....
CPCP document: ..... Rev # .....
Other document(s): ..... Rev # .....

A.1.4 Annual utilisation of the aircraft

The periods and frequencies of the maintenance tasks in this proposed system of maintenance are based on an estimated annual utilisation of:

Min: Flying Hrs. Cycles

Max: Flying Hrs. Cycles

A.1.5 Maintenance applicable to specific operations

The system of maintenance contains the necessary tasks required to ensure continued compliance with special authorisations/approvals, as indicated:

a. Automatic Approach and Automatic Landing CAT II/CAT III
b. Minimum Navigation Performance Specifications (MNPS)
c. Reduced Vertical Separation Minima (RVSM)
d. Extended Range Operations with two-engined aeroplanes (ETOPS)
e. Other, (Specify)

A.1.6 Aircraft configuration status

Reference document	Description	Applicability (aircraft s/n)	Comments (if any)
Build Status [1]			
Service Bulletin(s) [2]			
STC(s)			
Local modifications			
Non-recurring ADs			

A.1.7 Scheduled maintenance tasks periods

The periods of scheduled maintenance tasks are as follows:

A.1.7.1 Check cycle

Check Name	Interval (Hrs/Cycle)	Document Location Reference

[1] Optional or additional items/systems incorporated at aircraft build e.g., customer options. This info is available from aircraft delivery documents.
[2] Cross reference to ADs, if any.

Check Name	Interval (Hrs/Cycle)	Document Location Reference

A.1.7.2 Description of check cycles

(Use this section, if necessary, to explain the operation of the check cycle i.e phases, relationship between phases etc.).

Engine & propeller overhauls and other maintenance tasks scheduled that occur out of phase with the maintenance check cycles shall be performed as indicated in paragraph 1.7.3. (Where applicable, the tasks may be identified by reference to separate documents, provided the documents are listed in 1.7.4.)

A.1.7.3 Out of phase tasks

Out of phase tasks & equipment maintenance requirements [3]

Item	Task	Interval [4]	Tolerance
Engines [5]	Overhaul		
Propellers [6]	Overhaul		

A.1.7.4 Reference documents

[3] Include additional pages where required.
[4] Insert interval, specifying whether in hours, cycles or calendar time
[5] Completion of engine and propeller details is mandatory. If necessary, indicate “On-condition” or “N/A.”
[6] Completion of engine and propeller details is mandatory. If necessary, indicate “On-condition” or “N/A.”

A.2 Registered operator's certification statement

A.2.1 In the preparation of this system of maintenance requirements of the regulations, civil aviation orders and the recommendations made by the type certificate holder of the aircraft and engine and equipment manufacturers have been evaluated and, where appropriate, have been incorporated.

A.2.2 The standards applied to the individual maintenance task meet the requirements of the type certificate holder's recommended standards and practices.

A.2.3 This system of maintenance lists the tasks and identifies the practices and procedures for the aircraft listed in Paragraph 1.2. The registered operator undertakes to ensure that these aircraft will continue to be maintained in accordance with this system of maintenance.

A.2.4 The data contained in this system of maintenance will be reviewed for continued validity at least annually in the light of operating experience, in accordance with procedure detailed in section *[insert the section number]* of the MCM,

A.2.5 If the annual utilisation of any aircraft to which this SoM applies varies by more than 25% from that stated in paragraph 1.4, the registered operator accepts that the system of maintenance shall be reviewed to make any necessary adjustments to the maintenance tasks and periods.

A.2.6 It is accepted that this system of maintenance does not prevent the necessity for complying with any new or amended regulatory requirements published by CASA from time to time where these new or amended regulatory requirements may override elements of this system of maintenance.

A.2.7 It is understood that this system of maintenance does not relieve the registered operator from the responsibility for determining the applicability of the tasks and intervals concerned, nor from the responsibility for identifying any other applicable maintenance requirements not listed therein.

Signed: ..... Registered operator

Name: .....

Date: .....