



Schweizerische Eidgenossenschaft
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Federal Department of the Environment, Transport,
Energy and Communications DETEC
Federal Office of Civil Aviation FOCA
Safety Division - Flight Operations



Technical Part

Andreas Boss, FOCA, Safety Division Aircraft

Ronald Meier, FOCA, Safety Division Aircraft

3 May, 2024 - Zentrum Paul Klee



Topics



- Implementation of SMS
- Lack of skilled workers (outcome Workshop)
- Oversight policies
- Management of Changes
- OneCAMO
- Pilot owner Maintenance
- Regulatory amendments and developments



Implementation of SMS regulations



- National Regulations - in force since 2009
- Implementation of SMS in Part-145 (EU)2021/1963
Due date: 02.12.2024
- Implementation of SMS in Part-21 (EU)2022/201
Due date: 07.03.2025





Part-145/-21 SMS Implementation

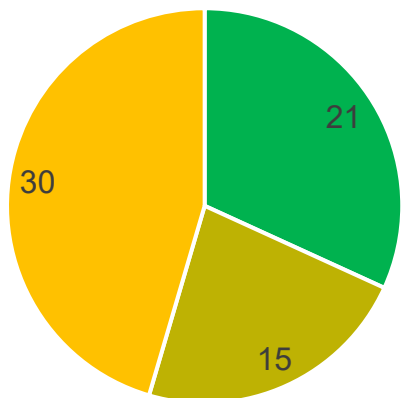


Thank you for your good work and cooperation with our inspectors in the process of implementing SMS into your Part-145 organisation



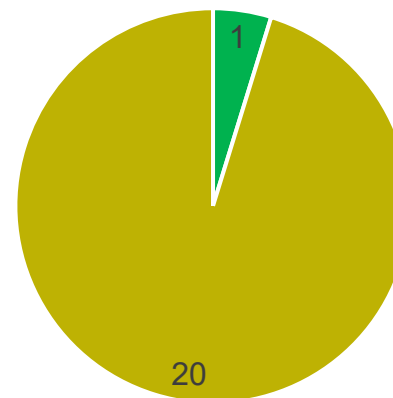
Implementation status as of today:

SMS in Part-145



■ Completed ■ Under development ■ Still open

SMS in Part-21



■ Completed ■ Under development ■ Still open



Experience of SMS Implementation



- Some organisations started early
- Open and transparent communication
- Good performance implementing MS & continuous improvements visible



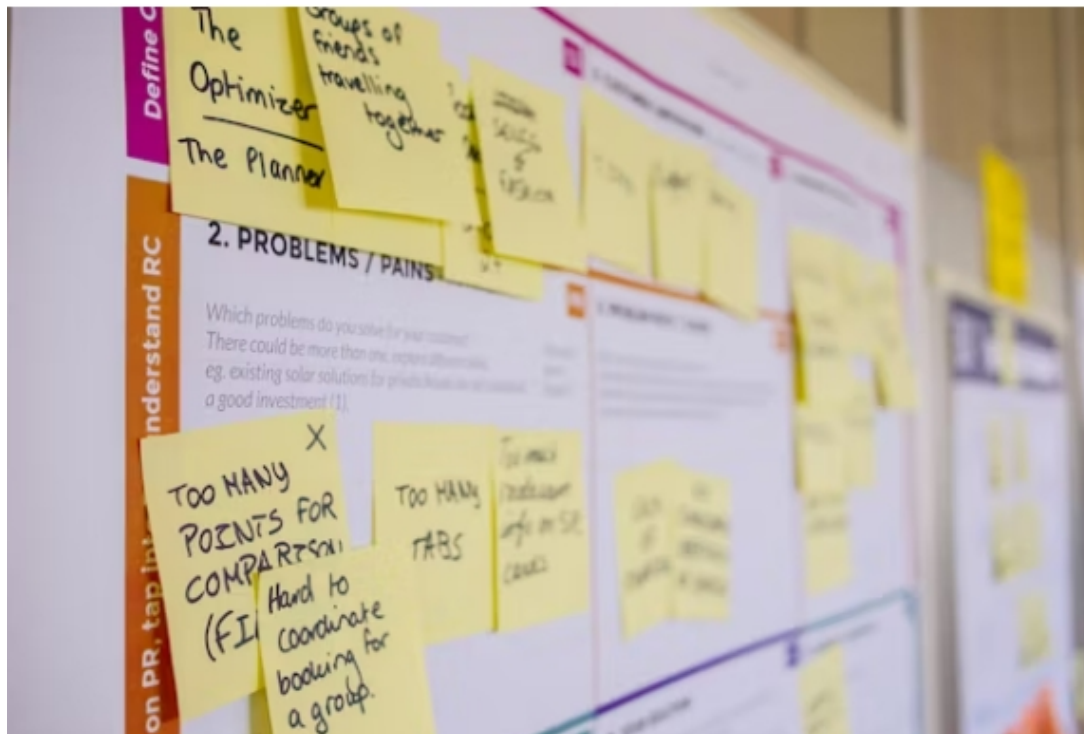
Experience of SMS Implementation



- Exposition not amended and provided
- Total time needed for the whole process not adequately considered
- An extension of the due date is not possible



Experience of SMS Implementation



Main issues

- Role of CMM and SM
- Time for training of Personnel in organisations not taken into account
- Hazards, Objectives and Indicators do not fit to nature of organisation
- Weak compliance monitoring

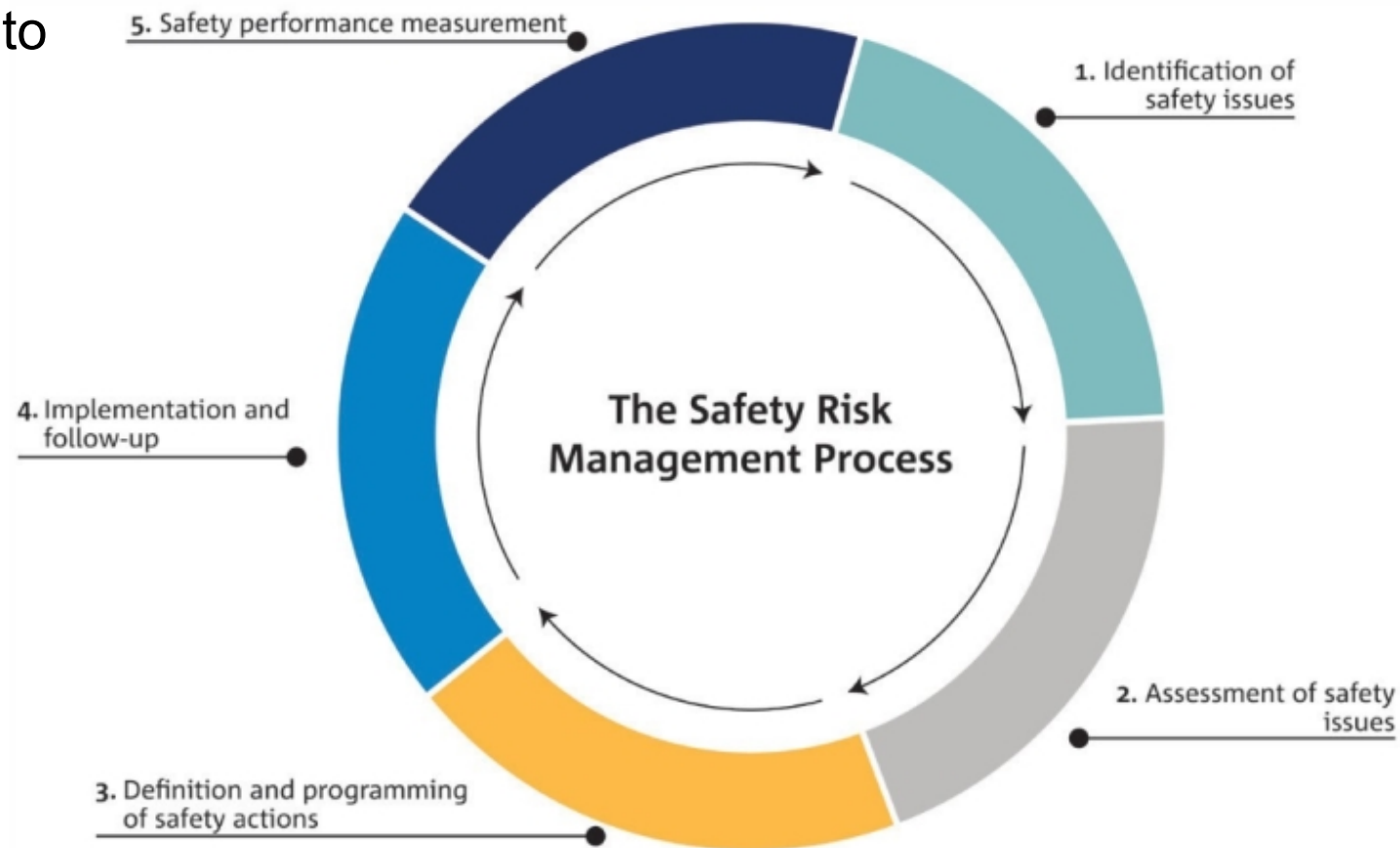


Integration of SMS into a Management System



The SMS can be integrated into a Company Management System

- Compliance with IR
- Risk Matrix must contain technical aspects





Integration of SMS into a Management System



Hazard Identification

Undesirable events - delivery of an unairworthy aircraft to the operator

[EASA Guidance Material](#)



Integration of SMS into a Management System



Risk Matrix

Probability need to be adapted to the size and complexity of activities

Probability of occurrence		Severity of occurrence				
		Negligible	Minor	Major	Hazardous	Catastrophic
		1	2	3	5	8
Extremely improbable	1	1	2	3	5	8
Improbable	2	2	4	6	10	16
Remote	3	3	6	9	15	24
Occasional	4	4	8	12	20	32
Frequent	5	5	10	15	25	40



Lack of skilled workers (outcome Workshop)



Many licensed maintenance personnel will retire in the next 15 years

FOCA organized a workshop with representatives of industry and associations

Different ideas were evaluated and analysed

Attractiveness of technical jobs should be increased for career changers and apprentices, various actions are ongoing



Oversight Policies



- Harmonized oversight AOC / CAMO
- Combined audits/assessments of the management system
- Activities split into MS / Technical Processes





Management of Changes



Crucial for effectiveness

Procedures in expositions are not followed

Inadequate documentation, not signed / accepted from accountable manager

Templates could be helpful

Define responsible key staff to perform the change and risk analysis





Management of Changes



Processes to Identify change

Risks are properly assessed, mitigations are defined and effective (where is it described, who does it, when)

Development of implementation plan (considering FOCA activities as well)

Communication of change and during implementation

Monitoring and verification during and after implementation



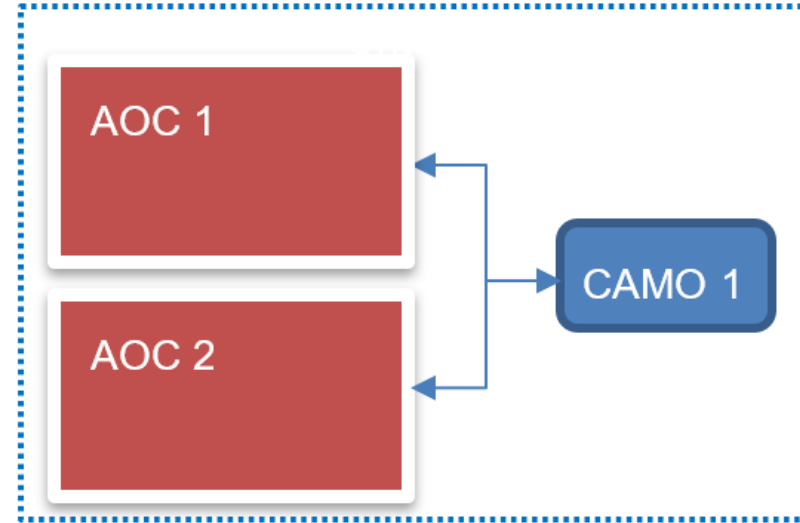


OneCAMO



OneCAMO implementation in CH

- 2 OneCAMO Organisations in CH
- Some interest in the industry



If interested, consider:

- Contracts between CAMO – AOC
- Contract between NAA's
- Harmonised Management System
- Time



Pilot Owner Maintenance / Flying Mechanic



M / ML.A.803 Applicable to

- Any other than complex motor-powered aircraft of 2 730 kg MTOM and below
- not used in CAT operations, in commercial specialised operations or in commercial operations by ATOs or DTOs

FAQ n.19491

FAQs: [Continuing airworthiness - General](#), [Continuing Airworthiness](#), [Regulations](#)

Can a Pilot-Owner or Flight Crew accomplish an inspection required by an AD?



Pilot Owner Maintenance / Flying Mechanic



To qualify as a Pilot-owner, the person must:

1. hold a valid pilot licence (or equivalent) issued or validated by a Member State for the aircraft type or class rating; and
2. own the aircraft, either as sole or joint owner





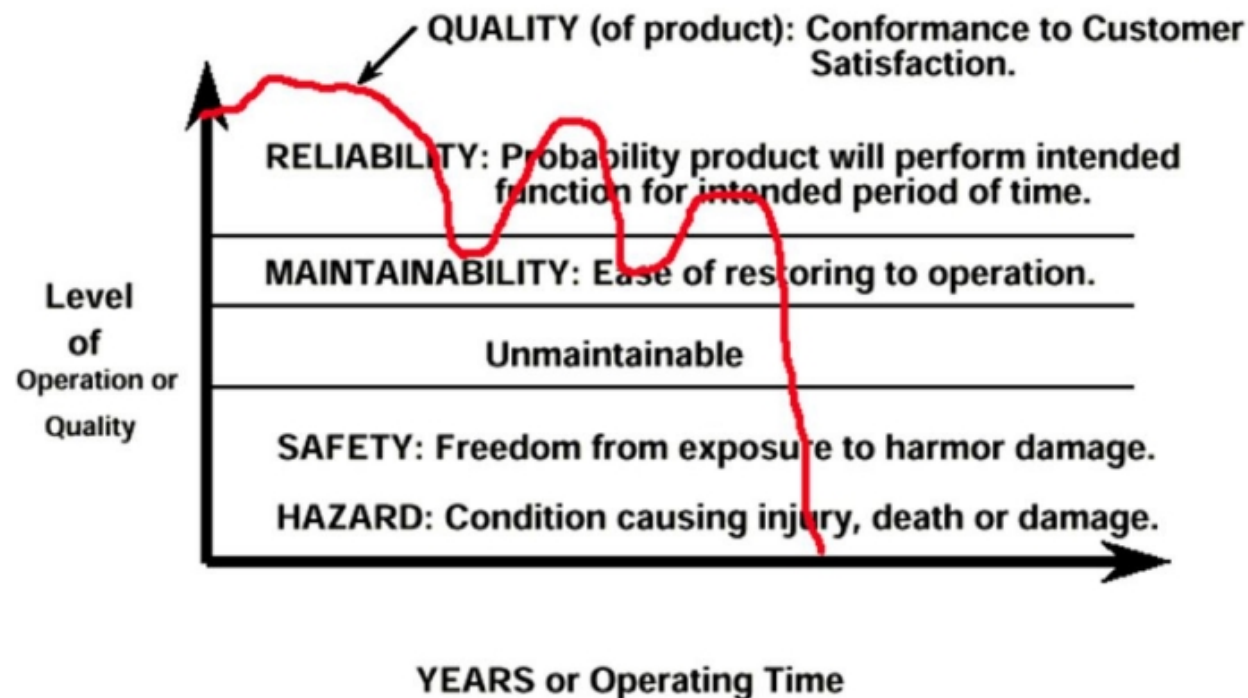
Pilot Owner Maintenance / Flying Mechanic



The scope of the limited Pilot-owner maintenance shall be specified in the aircraft maintenance programme referred to in point M.A.302.

Limitations specified in Part M appendix VIII

RELATIONSHIP: QUALITY -- RELIABILITY-- SAFETY





Regulation Amendments



Regulation (EU) 2023/989 (applicable from June 2024)

- Efficiency in aircraft maintenance licencing (OJT, legacy aircraft type endorsement, basic knowledge)
- Imminent adoption of related AMC/GM, including update of the aircraft type ratings





Regulation Amendments



Regulation (EU) 2023/203 (applicable 22 Feb 2026)

- Management of cybersecurity risks for aviation safety for CAMO and P145 organisation* and competent authorities (including P66 licensing authority) (*except those solely involved with Part Part-ML aircraft)
- AMC/GM published 13 Jul 2023





Rules development overview



- **Unmanned aircraft Systems** (RMT.0230)
CAW of certified UAS operated in the 'specific' category
Opinion No 03/2023 published on 30-Aug-2023
- **New Air Mobility** (RMT.0731 subtask 1)
Continuing airworthiness of non-conventional aircraft,
including electric and hybrid propulsion aircraft
Opinion Q4/2023





Rules development overview



- **Review of Part-147 (RMT.0544)**
Improve structure/consistency in Part-147 and address fraud & language proficiency NPA Q4/2023
- **Enabling electronic personnel licences (RMT.0737)**
Electronic aircraft maintenance licences
NPA Q1/2024
- **ACAM (RMT.0588)**
ToR 2027



Rules development overview



- **Import of Aircraft + Airworthiness Review (+ Occurrence Reporting) (RMT.0278/RMT.0521/RMT.0681)**
Opinion Q3/2024
- **Responsibility of B1/B2 certifying staff and support staff (RMT.0097)**
Webinar and policy paper Q1/2023
Opinion 2025
- **Non-installed equipment (RMT.0727 Subtask 3)**
Contribution for CAW aspects



Questions and Answers

