
ICAO
SAFE SKIES.
SUSTAINABLE
FUTURE.

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Outline of Discussion

01 USOAP Overview

Overview

Audit Areas and CEs

02 Evidence by CEs

02 General PQs

04 IFPD PQs

05 Interactive session on PQs

USOAP


ICAO's Universal Safety Oversight Audit Programme (USOAP) 1000 Activities (1999–2023)
Afghanistan: 2019 | Albania: 2001, 2003, 2009, 2012, 2014, 2022 | Algeria: 2000, 2004, 2011 | Andorra: 2001, 2007 | Angola: 2001, 2004, 2007, 2010, 2017, 2022 | Antigua and Barbuda: 2000, 2002, 2007, 2013 | Argentina: 2000, 2002, 2008, 2013, 2022, 2023 | Armenia: 2001, 2003, 2007, 2015, 2021 | Australia: 1999, 2001, 2008, 2016, 2017, 2017, 2022 | Austria: 1999, 2002, 2008, 2015, 2019 | Azerbaijan: 1999, 2001, 2007, 2015, 2018, 2020, 2022 | Bahamas: 2000, 2002, 2009, 2011, 2013, 2015, 2017, 2021 | Bahrain: 2000, 2004, 2010, 2013, 2018 | Bangladesh: 2000, 2004, 2009, 2012, 2017 | Barbados: 2001, 2004, 2009, 2013 | Belarus: 2001, 2003, 2009, 2015 | Belgium: 2000, 2002, 2006, 2013, 2016 | Belize: 2001, 2003, 2009, 2014 | Benin: 2000, 2004, 2007, 2012, 2014, 2015, 2015, 2016, 2018 | Bhutan: 1999, 2002, 2006, 2018, 2022 | Bolivia: 2000, 2001, 2008, 2013, 2014, 2016, 2017, 2018, 2019, 2021 | Bosnia and Herzegovina: 2000, 2004, 2011, 2018, 2019 | Botswana: 1999, 2001, 2006, 2013, 2015, 2018, 2022 | Brazil: 2000, 2003, 2009, 2015, 2015, 2018 | Brunei Darussalam: 1999, 2002, 2007 | Bulgaria: 1999, 2001, 2006, 2017, 2018 | Burkina Faso: 1999, 2003, 2007, 2014, 2017 | Burundi: 2013, 2019 | Cabo Verde: 2018 | Cambodia: 1999, 2001, 2007, 2009, 2014, 2016, 2018 | Cameroon: 2000, 2003, 2006, 2013, 2015 | Canada: 2000, 2003, 2005, 2021 | Cape Verde: 1999, 2003, 2009 | Central African Republic: 2001, 2007, 2018 | Chad: 2001, 2012, 2015, 2015, 2016, 2017 | Chile: 2000, 2003, 2008, 2017, 2018 | China: 1999, 2001, 2007, 2014, 2017, 2021, 2022 | China, Hong Kong SAR of China: 2000, 2004, 2009 | China, Macao SAR of China: 2001, 2004, 2009 | Colombia: 2001, 2003, 2007, 2011, 2017, 2021, 2022 | Comoros: 2000, 2004, 2008, 2019 | Congo: 2001, 2008, 2015, 2015, 2016, 2019 | Cook Islands: 1999, 2003, 2013 | Costa Rica: 1999, 2001, 2006, 2012 | Costa Rica: 2017 | Côte d'Ivoire: 2000, 2004, 2008, 2014, 2014, 2014, 2019, 2021 | Croatia: 2000, 2002, 2010, 2020 | Cuba: 1999, 2001, 2008, 2019 | Cyprus: 1999, 2002, 2007, 2016, 2019 | Czechia: 2000, 2003, 2005 | Democratic People's Republic of Korea: 2000, 2002, 2008 | Democratic Republic of the Congo: 2001, 2006, 2013, 2013, 2018, 2018, 2022, 2023 | Denmark: 1999, 2001, 2008, 2017, 2018, 2019 | Djibouti: 2000, 2008, 2021, 2022, 2022 | Dominican Republic: 2000, 2003, 2009, 2016, 2016, 2017 | * EU Aviation Safety Agency (EASA): 2005, 2008, 2015, 2017, 2018, 2019 | Ecuador: 2000, 2003, 2009, 2012, 2015 | Egypt: 1999, 2002, 2005, 2014, 2016, 2022 | El Salvador: 2000, 2002, 2006, 2015, 2016, 2019 | Equatorial Guinea: 2001, 2007, 2015, 2016, 2017, 2017 | Eritrea: 2001, 2010 | Estonia: 2000, 2004, 2010, 2018, 2018 | Eswatini: 1999, 2007, 2015, 2019 | Ethiopia: 1999, 2001, 2006, 2015, 2018, 2018, 2020 | Fiji: 2001, 2003, 2006, 2017, 2019 | Finland: 1999, 2001, 2010, 2015, 2016, 2017, 2018, 2018 | France: 1999, 2001, 2008, 2015, 2016, 2017, 2017, 2020 | Gabon: 2000, 2004, 2007, 2012, 2016, 2019 | Gambia: 1999, 2003, 2005, 2018, 2020 | Georgia: 1999, 2001, 2007, 2013, 2016, 2018 | Germany: 2000, 2002, 2005, 2015, 2016, 2017, 2020, 2021 | Ghana: 2001, 2003, 2006, 2019 | Greece: 2000, 2002, 2006, 2013, 2018 | Grenada: 2000, 2002, 2007, 2013 | Guatemala: 2000, 2002, 2007, 2013, 2015, 2018 | Guinea: 2001, 2004, 2012, 2014, 2016, 2023 | Guinea-Bissau: 2003, 2008 | Guyana: 2001, 2003, 2007, 2016, 2020 | Haiti: 2001, 2004, 2012 | Honduras: 2000, 2004, 2008, 2012, 2016, 2017, 2019, 2019 | Hungary: 2001, 2003, 2008, 2012, 2015, 2016, 2017, 2018 | Iceland: 2000, 2002, 2010, 2019, 2021 | India: 1999, 2001, 2006, 2012, 2013, 2015, 2017, 2018, 2022 | Indonesia: 2000, 2004, 2007, 2009, 2014, 2016, 2017 | Iran (Islamic Republic of): 2000, 2004, 2010, 2018, 2022 | Iraq: 2020 | Ireland: 2001, 2003, 2010, 2015, 2016 | Israel: 2001, 2007, 2014, 2015, 2016 | Italy: 2000, 2002, 2006, 2011, 2015, 2017, 2022, 2022 | Jamaica: 1999, 2001, 2007, 2013, 2016, 2016 | Japan: 2000, 2002, 2010, 2015, 2019 | Jordan: 2000, 2002, 2006, 2013, 2017 | Kazakhstan: 2000, 2003, 2009, 2014, 2016, 2021 | Kenya: 1999, 2001, 2008, 2013, 2018 | Kiribati: 2002 | Kuwait: 2000, 2003, 2005, 2016, 2017, 2021 | Kyrgyzstan: 2000, 2002, 2009, 2014, 2016, 2019, 2020 | Lao People's Democratic Republic: 1999, 2002, 2010, 2015 | Latvia: 2000, 2002, 2010, 2015, 2015 | Lebanon: 2000, 2002, 2008, 2012, 2014, 2016, 2017 | Lesotho: 2001, 2004, 2007 | Liberia: 2006, 2016, 2016, 2022 | Libya: 2001, 2007, 2020 | Lithuania: 1999, 2001, 2009, 2015, 2017, 2018 | Luxembourg: 2001, 2003, 2006, 2011, 2022 | Madagascar: 2000, 2004, 2008, 2012, 2014, 2015, 2018 | Malawi: 1999, 2004, 2009, 2018 | Malaysia: 2000, 2002, 2005, 2016, 2020 | Maldives: 1999, 2001, 2010, 2014 | Mali: 2000, 2003, 2008, 2011, 2014, 2014, 2015 | Malta: 2000, 2003, 2010, 2016, 2018, 2018, 2021 | Marshall Islands: 2001, 2010 | Mauritania: 1999, 2004, 2008, 2012, 2012, 2013, 2014, 2014, 2018 | Mauritius: 2000, 2004, 2007, 2015 | Mexico: 2000, 2004, 2007, 2012 | Micronesia (Federated States of): 2001, 2010 | Monaco: 2001, 2003, 2007 | Mongolia: 1999, 2001, 2010, 2017 | Montenegro: 2001, 2004, 2010, 2019 | Morocco: 1999, 2004, 2009, 2014, 2014, 2014, 2016, 2021 | Mozambique: 2000, 2003, 2010, 2011, 2014, 2017, 2018, 2018 | Myanmar: 2000, 2003, 2010, 2013, 2018, 2020, 2021, 2022 | Namibia: 2001, 2004, 2006, 2014, 2016 | Nauru: 2001, 2008 | Nepal: 1999, 2002, 2009, 2013, 2014, 2016, 2017, 2022 | Netherlands: 2000, 2003 | Netherlands, Curaçao: 2000, 2008, 2019 | Netherlands, Netherland Antilles and Aruba: 2003 | New Zealand: 1999, 2001, 2006, 2016 | Nicaragua: 2001, 2003, 2008, 2017, 2017 | Niger: 2001, 2004, 2007, 2015, 2015 | Nigeria: 2001, 2003, 2006, 2016, 2021 | North Macedonia: 2001, 2003, 2009, 2016 | Norway: 2000, 2002, 2006, 2015, 2017, 2018 | * Organisation of Eastern Caribbean States (OECS): 2019, 2022 | Oman: 2001, 2003, 2010, 2013, 2020 | Pakistan: 2000, 2004, 2011, 2020, 2020, 2021 | Palau: 2000, 2003, 2010 | Panama: 2001, 2003, 2005, 2015, 2017 | Papua New Guinea: 2001, 2003, 2009, 2013, 2018, 2018 | Paraguay: 1999, 2001, 2009, 2016, 2016, 2023 | Peru: 1999, 2001, 2007, 2014, 2018 | Philippines: 1999, 2001, 2009, 2012, 2013, 2013, 2017, 2017, 2022 | Poland: 2000, 2003, 2008, 2018, 2020 | Portugal: 2000, 2003, 2009, 2014, 2014, 2014, 2017, 2019 | Qatar: 2001, 2003, 2010, 2013, 2018 | Republic of Korea: 2000, 2002, 2008, 2019 | Republic of Moldova: 2001, 2004, 2009, 2014, 2022 | Romania: 1999, 2001, 2009, 2012, 2017 | Russian Federation: 2000, 2003, 2008, 2014, 2015, 2022, 2022 | Rwanda: 2001, 2007, 2012, 2017, 2017, 2019 | Saint Kitts and Nevis: 2000, 2002, 2007, 2013 | Saint Lucia: 2000, 2002, 2007, 2013 | Saint Vincent and the Grenadines: 2000, 2002, 2007, 2013 | Samoa: 2001, 2003, 2010 | San Marino: 2000, 2007, 2015, 2020 | Sao Tome and Principe: 2001, 2010 | Saudi Arabia: 1999, 2002, 2009, 2014 | Senegal: 2000, 2003, 2006, 2014, 2016, 2017, 2018, 2019 | Serbia: 2001, 2004, 2009, 2016, 2019 | Seychelles: 2000, 2004, 2007, 2014, 2018, 2019, 2022 | Sierra Leone: 2006, 2014 | Singapore: 2000, 2002, 2010, 2018, 2021, 2022, 2022 | Slovakia: 1999, 2001, 2009, 2000, 2002, 2010, 2018, 2019, 2021, 2022 | Solomon Islands: 2006, 2011 | South Africa: 1999, 2001, 2007, 2013, 2017, 2018, 2020, 2023 | Spain: 2000, 2003, 2010, 2018, 2019, 2019, 2021 | Sri Lanka: 2000, 2004, 2010, 2018, 2020 | Sudan: 2000, 2004, 2006, 2011, 2012, 2014 | Suriname: 2000, 2003, 2009, 2012 | Sweden: 2000, 2003, 2008, 2016 | Switzerland: 2000, 2003, 2010, 2015, 2015, 2021 | Syrian Arab Republic: 2000, 2004, 2008 | Tajikistan: 2000, 2002, 2008, 2015, 2016 | Thailand: 1999, 2001, 2005, 2015, 2016, 2017, 2019, 2021 | Timor-Leste: 2010 | Togo: 2000, 2003, 2007, 2015, 2015, 2016 | Tonga: 2000, 2003, 2010, 2014, 2019 | Trinidad and Tobago: 1999, 2004, 2007, 2017, 2017 | Tunisia: 2001, 2004, 2009, 2020 | Türkiye: 2000, 2003, 2007, 2013, 2017, 2019 | Turkmenistan: 2000, 2002, 2010, 2019 | Uganda: 1999, 2001, 2008, 2014 | Ukraine: 2000, 2003, 2008, 2011, 2016, 2017, 2019, 2020 | United Arab Emirates: 1999, 2002, 2007, 2014, 2015, 2016, 2019 | United Kingdom: 2000, 2004, 2009, 2018, 2022, 2022 | United Kingdom, Bermuda (U.K.): 2000, 2004, 2019 | United Kingdom, Turks and Caicos Islands (U.K.): 2000, 2004 | United Republic of Tanzania: 2000, 2003, 2008, 2013, 2016, 2017, 2019 | United States: 1999, 2001, 2007 | Uruguay: 2001, 2004, 2008, 2014, 2016, 2018, 2019 | Uzbekistan: 2000, 2003, 2008, 2017 | Vanuatu: 2001, 2003, 2006, 2016, 2016 | Venezuela: 1999, 2004, 2009, 2013 | Viet Nam: 2000, 2003, 2007, 2011, 2016 | * World Food Programme (WFP): 2022 | Yemen: 2000, 2004 | Zambia: 1999, 2004, 2009, 2012, 2016 | Zimbabwe: 2001, 2004, 2010, 2019, 2022
UNIVERSAL SAFETY OVERSIGHT AUDIT PROGRAMME
1000
USOAP ACTIVITIES 2023
INTERNATIONAL CIVIL AVIATION ORGANIZATION
Audit: Full-scope, documentation-based and focused audits
Other: Other USOAP activities such as evaluation and validation missions
ICVM: ICAO Coordinated Validation Mission
SSPIA: State Safety Programme Implementation Assessment
* International Organizations
USOAP-1000
Activities 2023

ICAO

What is the Universal Safety Oversight Audit Programme (USOAP)?

- The Universal Safety Oversight Audit Programme (USOAP) is a programme through which ICAO monitors the fulfillment of the safety oversight obligations by its Member States.

- ICAO carries out audits and other monitoring activities to determine the safety oversight capabilities of its Member States.

USOAP Audits

The approach for USOAP audits is based on:

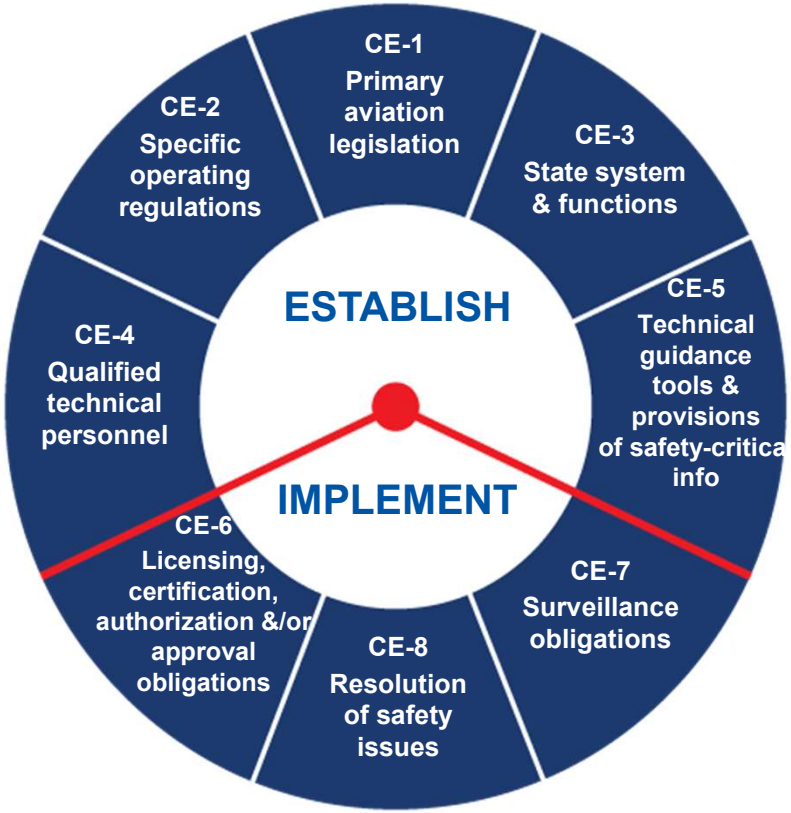
"…the implementation of a *structured process and methodology* for the planning, preparation, conduct, reporting, follow-up and evaluation of ICAO safety oversight audits, in order to determine States' capability for safety oversight."

ICAO Doc 9735 and MOU signed between the State and ICAO.

Audit Areas


Effective State Safety Oversight System
Personnel Licensing
Annexes 1 & 19
Aircraft Operations
Annexes 2, 6, 18, 19 & PANS-OPS
Airworthiness of Aircraft
Annexes 6, 7, 8, 16 & 19
Legislation and Regulations
Chicago Convention & Annex 2
Organization & Safety Oversight Functions
SAAQ
Aerodromes
Annexes 14, 19 & PANS - Aerodromes
Air Navigation Services
Annexes 2, 3, 4, 5 10, 11, 12, 15, 19 & PANS-ATM PANS-AIM PANS-OPS
Accident & Incident Investigation
Annexes 13 & 19

Critical Elements (CEs) of a Safety Oversight System



Eight CEs of a State safety oversight system

Definitions of CEs: in Annex 19 — *Safety Management*, Appendix 1 (2nd edition, July 2016)

Guidance for CEs:
Doc 9734 — *Safety Oversight Manual*, Part A — *The Establishment and Management of a State Safety Oversight System* (3rd edition, 2017)*.

** Available on ICAO-Net and CMA Library of the CMA OLF.*

USOAP CMA Protocol Questions

- The primary tool used in USOAP for assessing the level of effective implementation of a State's safety oversight system based on the critical elements, the Convention on International Aviation, ICAO
- Standards and Recommended Practices (SARPs), Procedures for Air Navigation Services (PANS) and related guidance material.

Enable standardization in the conduct of USOAP CMA activities.

Percentage of "Satisfactory" PQs is reflected in the EI.

Evidence-based approach:

- **Show me!**
- **Lack of evidence or lack of sufficient evidence = PQ status becomes or remains N/S.**

N/S PQ generates a finding and since 2014, each finding is PQ-specific.

USOAP Updates

- AN-CONF/14 IP05 Evolution of the Universal USOAP Safety Oversight Audit Programme Continuous Monitoring Approach (USOAP CMA)
  - Integration of SSPIA into traditional activities
    - First draft of SSP and SMS PQs 30 Apr. 2024
    - External comments on the SSP and SMS PQs 14 June
    - 2024 version of the USOAP PQs (including both the SSP and SMS PQs as well as the updated safety oversight PQs) 30 Sep. 2024
    - Beta test of the integrated methodology Q2 of 2025

Evidence by CEs

Evidence by CEs - Examples

CE-1 Primary aviation legislation

- Legislative instruments related to civil aviation activities and established entities (laws, treaties, etc.), promulgated and published versions;
- bilateral agreements on Article 83 bis of the Chicago Convention or other equivalent topics.
- Legislation is collective term combining
  - Primary air law, binding for all citizens
  - Specific operating regulations, binding for actors and participants in aviation activity only

CE-2 Specific operating regulations

- Regulatory instruments (regulations; directives); promulgated and published versions;
- procedures for the amendment of regulations;
- procedures for identifying and notifying differences, if any, to ICAO;
- copy of list of differences published in the AIP;
- (policy on the granting of exemptions and examples of granted exemptions)

Evidence by CEs - Examples

CE-3 State system and functions

- Documents related to nomination, delegation, cooperation, etc. (MOU, letters, etc.);
- organizational charts;
- documents describing functions and responsibilities;
- sample of job descriptions;
- sample of credentials.
- documents on the authorities funding and approved budget;
- documents on the process to determine staffing needs;
- procedure for the delegation of tasks to other entities or individuals;
- letters of nomination or designation with respect to the delegation of tasks

Evidence by CEs - Examples

CE-4 Qualified technical personnel

- Document defining the minimum qualification and experience requirements;
- document on the recruitment process;
- training policy;
- training programmes;
- training plans;
- completed OJT forms;
- documents on the system for keeping training records (copies of training records are not required).

Evidence by CEs - Examples

CE-5 Technical guidance, tools and provision of safety-critical information

- Process or procedure for making necessary documents available to technical staff (annexes to the CC, regulations, etc.), document control and/or system for maintaining the documents up-to-date;
- handbooks, procedures, checklists and other guidance material;
- Ensure that procedures provide sufficient detail on WHO does WHAT, WHEN, HOW and in coordination with WHOM

Evidence by CEs - Examples

CE-6 Licensing, certification, authorization and approval obligations

- Completed check-lists used for licensing/ certification/ approval and/or authorization processes
- Issued licences, certificates, approvals and/or authorizations;
- Copies of exchange of letters with the industry

CE-7 Surveillance obligations

- Surveillance policy;
- surveillance programme and plans
- Copies of inspection or audit reports and/or monitoring activities.

Evidence by CEs - Examples

CE-8 Resolution of safety issues

- Processes, procedures, checklists
- Exchange letters with the industry regarding deficiencies and corrective actions
- Enforcement procedures
- Evidence of actual enforcement actions (imposed fines or restriction/limitations, suspended or revoked licenses/certificates/ approvals/authorizations)

Summary

CE-1	• Laws, treaties • Bilateral agreements on Article 83 bis of the Chicago Convention
CE-2	• Regulations, directives • Procedures for the amendment of regulations; • Procedures for identifying and notifying differences, if any, to ICAO
CE-3	• Documents related to nomination, delegation, cooperation, etc. (MOU, letters, etc.); • Organizational charts; • Documents describing functions and responsibilities; • Sample of job descriptions; Sample of credentials; • Budget decisions • Documents on the process to determine staffing needs
CE-4	• Document defining the minimum qualification and experience requirements • Training policy, programmes, training plans; • Completed OJT forms, Training records
CE-5	• Manuals, Handbooks • Procedures • Checklists
CE-6	• Completed check-lists used for licensing/ certification/ approval and/or authorization processes • Issued licences, certificates, approvals and/or authorizations; • Copies of exchange of letters with the industry
CE-7	• Surveillance policy; • Surveillance programme and plans • Copies of inspection or audit reports and/or monitoring activities;
CE-8	• Exchange letters with the industry regarding deficiencies and corrective actions • Enforcement procedures • Evidence of actual enforcement actions (imposed fines or restriction/limitations, suspended or revoked licences/certificates/ approvals/authorizations;

General PQs

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.031	Has the State established an organizational structure with functions related to the safety oversight of ANS providers?	1) Confirm current approved organizational structure for CAA and ANS safety oversight, including clear functions and responsibilities and reporting lines. 2) Note names and acronyms of the established authorities and each section dealing with ANS safety oversight activities. ~~3) Cross-check State Aviation Activity Questionnaire (SAAQ).~~	GM Doc 9734 Part A, C3 STD A19 3.2.3		CE-3

Frequent shortcomings		
Some States CAA' s are dependent on the ANS provider, for ensuring both some regulatory and service provision responsibilities.	States did not establish a structure addressing all the technical areas applicable, with respect to functions related to safety oversight.	States fulfil their responsibilities through arrangements with other States or an RSOO. The responsibilities, functions and duties of are not clearly defined.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.037	Has the State developed procedures to assist ANS inspectors in carrying out their safety oversight functions in a standardized and effective manner?	1) Verify that inspector's procedures and checklists are detailed and based on the State's requirements. Note to the auditor: Procedures may be compiled into an inspector's handbook or manual.	GM Doc 9734 Part A, C3		CE-5

Frequent shortcomings		
Some States have not developed procedures for the ANS Safety inspectorate staff to effectively carry out their safety oversight duties and responsibilities.	The checklist was found to be inadequately detailed and did not align with regulatory requirements.	Procedures for a specific task or activity do not address the following: Who does what, how, when and in coordination with whom

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.039	Are the relevant ICAO documents and other technical and regulatory publications readily available to all ANS inspectorate personnel?	1) Verify accessibility of the following documents: a) Primary aviation legislation and ANS specific operating regulations. b) Annexes 1, 2, 3, 4, 5, 10, 11, 12 and 15. c) PANS, guidance material and other ANS-related publications. d) World Meteorological Organization (WMO) documentation. e) Other technical/regulatory publications. 1) Review the document control system and method to determine currency of documents. Note to the auditor: Check for field/regional offices as well as Headquarters.	GM Doc 9734 Part A, C3		CE-5

Frequent shortcomings		
Documents and other technical and regulatory publications are not available to all ANS inspectorate personnel	States have not developed document control system and method to determine currency of documents.	Essential documents were unavailable, and the electronic library utilized by the organization was outdated.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.042	Have ANS inspectors been issued credentials to facilitate access to ANS facilities in the State and access to service providers' documentation for the purpose of inspections and enforcement?	1) Review credentials to ensure: 1) Reference to empowering legislation. 2) Method established to control currency of credential. 3) Inspector's photo.	GM Doc 9734 Part A, C3		CE-3

Frequent shortcomings		
Some States technical personnel do not possess appropriate credentials (with the empowering legislation indicated) identifying them as technical experts employed by the State authorities,	Some credentials with no indication of the right to unlimited and unrestricted access to aircraft, aviation-related documents, aerodromes, ATS and other relevant facilities and the associated inspection powers.	Lack or deficiencies in the method established to control the currency of credentials.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.051	If the State is involved in the provision of ANS, is there a distinct separation between the regulatory and the service provision functions for all fields in ANS?	1) Review the organizational structure and confirm effective separation of regulatory function from service provision functions for: 2) Air traffic services, 3) Aeronautical information services (including cartography), 4) Flight procedures design service, 4) CNS services, 5) Meteorological service, and 6) Search and rescue services. Note to the auditor: If a "functional" separation is in place, the State must demonstrate that the regulatory function operates completely independently, including the use of enforcement actions..	GM Doc 9734 Part A, C2		CE-3

Frequent shortcomings		
In some States, there is no distinct separation between the regulatory and the service provision for all fields in ANS.	Absence of clear delineation that could potentially compromise the impartiality and objectivity of regulatory oversight, leading to conflicts of interest.	The regulatory authority and service provider report to the same higher level management, without demonstrating that a “functional” separation does exist.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.109	If the State has initiated the implementation of performance-based navigation (PBN), are the prescribed navigation specifications appropriate to the level of communications, navigation and air traffic services?	1) Where applicable, review the mechanism for safety assessments to be conducted before and after implementation. 2) Where applicable, review documented evidences that the safety of the system is assured: a) Procedure design capabilities b) Flight plan adopted for PBN (letter "R" in item 10) c) World Geodetic System - 1984 (WGS-84) implementation.	STD A11 2.7 PANS Doc 4444 (ATM) App. 2 GM Doc 9613		CE-7

Frequent shortcomings		
Some States have not prescribed NAVSPECs	NAVSPECs are not verified to be appropriate to the level of communications, navigation and air traffic services	Safety assessments are not conducted before and after implementation.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.110	Does the State ensure that ATS routes and significant points are established and designated in accordance with the requirements of Annex 11?	1) Review mechanism to ensure implementation of principles set forth in Annex 11. 2) Verify the process implemented for coordination with ICAO Regional Offices (including the elimination of five-letter name-code (5LNC) duplicates).	STD A11 2.13 & 2.15 App. 1, App. 2 & App. 3		CE-6

Frequent shortcomings		
No mechanism established to ensure implementation of principles set forth in Annex 11	Absence of process for coordination with ICAO Regional Offices	No procedures established for the elimination of duplicated five-letter name-code (5LNC).

Instrument Flight Procedures PQs

ICAO

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.201	Has the State promulgated regulations as bases for instrument flight procedures design?	1) Verify regulatory requirements. 2) If criteria other than Doc 8168, Vol. II are used, verify that they provide an equivalent level of safety.	STD A11 2.34 & App. 7, 3 GM Doc 10068 2.1.3		CE-2

Frequent shortcomings		
Some States have not promulgated regulations as bases for instrument flight procedures design	The States have promulgated specific operating regulations which are not comprehensive, clear, consistent and up to date	Some States use the should in their specific operating regulations. (PANS and Annexes are not written in a manner that supports transposing the SARPs verbatim into a State's regulations).

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.205	Has the State established for flight procedures inspectors: a) job descriptions; b) appropriate minimum qualifications; and c) experience requirements?	1) Review job descriptions for flight procedures inspectors (including tasks related to the approval process of flight procedures). 2) Verify that qualifications criteria include: a) aeronautical certificates commensurate with their job responsibilities, and b) operational and technical work experience compatible with the activities they are required to perform.	GM Doc 9734 Part A, C3 Doc 10068 2.1.4 & 2.1.5		CE-3

Frequent shortcomings		
Some States have not developed job descriptions and minimum qualification and experience requirements for PANS-OPS Inspectors.	Qualifications criteria for PANS-OPS Inspectors do not include aeronautical certificates commensurate with their job responsibilities, and operational and technical work experience as procedure designer	Job descriptions are generic and do not indicate clearly the responsibility for the oversight of the development, maintenance and approval process for the flight procedures of an IFPDS provider.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.209	Does the flight procedures inspectorate have sufficient human resources to carry out its functions?	1) Review ability to attract new inspectors as well as existing vacancies and level of turnovers in past years. 2) Review methodology established for determining staffing needs to carry out all safety oversight-related tasks including: a) review and revision of regulations, b) training, c) development of guidance material, d) issuance of approvals, e) conducting of surveillance, and f) resolution of identified safety concerns. Note to the auditor: This PQ is linked to ORG PQ 2.053.	GM Doc 9734 Part A, C3 Doc 10068 2.1.4		CE-3

Frequent shortcomings		
No methodology established for determining staffing needs to carry out all safety oversight-related tasks.	The states have not taken necessary measures, such as remuneration and conditions of service, to ensure that qualified personnel performing safety oversight functions are recruited and retained	Personnel from the service provider are designated by the CAA to carry out fundamental CAA inspection functions.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.211	Has the State developed a formal training programme detailing the type of training to be provided to its flight procedures inspectors?	1) Review contents of training programme. 2) Confirm inclusion of initial, on-the-job, recurrent and specialized training, including timelines to be provided, as applicable.	GM Doc 9734 Part A, C3 Doc 10068 2.1.5		CE-4

Frequent shortcomings		
Some States have confused the training programme and training plan.	The States have developed generic programme.	The training programme does not include all the training required for the FPI to acquire and maintain the necessary competencies including initial training, OJT, recurrent training and all the specialized training necessary, with the minimum content for each type of training.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.215	Is the training programme appropriately implemented for flight procedures inspectors?	1) Review most recent training plan. 2) Verify that the most recent training plan is in accordance with the programme and includes: a) Detailed training types; b) Priorities; and c) Time frames. 3) Verify that each inspector's training is detailed. 4) Verify that the type and frequency of training provided (initial, OJT, recurrent and specialized) is sufficient to acquire/maintain the required level of knowledge, skills, competence and qualifications in accordance with the duties and responsibilities assigned to each technical staff member. 5) Verify that OJT is provided by an experienced senior inspector.	GM Doc 9734 Part A, C3 Doc 10068 2.1.5		CE-4

Frequent shortcomings		
Training programme is not implemented for FPI.	Training plan is not aligned with the programme.	training plan does not include detailed training types; priorities and time frames.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.229	Does the State ensure that appropriate minimum qualification requirements for flight procedures designers are met?	1) Review the mechanism established to ensure effective implementation. 2) Review qualifications required for new procedures design staff.	GM Doc 9734 Part A, C3 Doc 10068 2.1.7.4		CE-6

Frequent shortcomings		
No mechanism established to ensure effective implementation	minimum qualification requirements for flight procedures designers are not met,	No requirements of qualifications related for FPD staff.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.231	Has the State established and implemented a formal surveillance programme for the continuing supervision of the instrument flight procedure design service (IFPDS) provider?	1) Review that surveillance programme includes: a) Types of surveillance activities (audits, inspections, safety events analyses, etc.), b) Time frames or frequency of the activities, and c) Scope of the activities. 2) Confirm if plan is in compliance with surveillance programme, including unannounced and follow-up inspections (Implementation may be adapted using a risk-based method). 3) Sample checklists and audits/inspections reports of previous and current years.	GM Doc 9734 Part A, C3		CE-7

Frequent shortcomings		
Some States have confused the training programme and training plan	Surveillance plan is not in compliance with surveillance programme.	lack of effective oversight and proactive monitoring of FPDSP activities.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.233	Has the State established and implemented a mechanism/system with time frame for elimination of deficiencies identified by flight procedures inspectors?	1) Review the list of deficiencies that have been identified through surveillance and the remedial actions planned or taken. 2) Review mechanism to advise, establish deadlines, review and accept, and follow up on actions to verify effective implementation of corrective action plans (CAPs). 3) Review effective resolution of safety issues or appropriate enforcement (commensurate with the safety risk).	GM Doc 9734 Part A, C3		CE-8

Frequent shortcomings		
State has not established and implemented a mechanism/system with time frame for elimination of deficiencies identified by flight procedures inspectors	The states have not developed of a documented process to take appropriate actions, up to and including enforcement measures, to resolve identified safety issues.	No established deadlines, and follow up on actions to verify effective implementation of corrective action plans (CAPs)

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.234	Does the State ensure that instrument flight procedures (IFPs) are reviewed periodically (including validation) to ensure that they continue to comply with changing criteria and meet user requirements?	1) Review mechanism established to ensure effective implementation. 2) Sample documentation regarding periodic reviews done and verify that they are still valid in terms of minimum obstacle clearances. 3) Confirm that maximum interval for review is five years. Note to the auditor: The flight validation of the periodic reviews is not the same as the one done for the initial certification.	STD A11 App. 7, 6 PANS Doc 8168 (OPS) Vol. II, Part 1, Section 2, C4 4.4.3	Yes	CE-7

7.234

ICAO References

APPENDIX 7. STATE RESPONSIBILITIES CONCERNING AN INSTRUMENT FLIGHT PROCEDURE DESIGN SERVICE

(Chapter 2, 2.34 refers)

1. A State shall:

a) provide an instrument flight procedure design service; and/or

b) agree with one or more Contracting State(s) to provide a joint service; and/or

c) delegate the provision of the service to external agency(ies).

2. In all cases in paragraph 1 above, the State concerned shall approve and remain responsible for all instrument flight procedures for aerodromes and airspace under the authority of the State.

3. Instrument flight procedures shall be designed in accordance with State-approved design criteria.

4. Each State shall ensure that an instrument flight procedure design service provider intending to design an instrument flight procedure for aerodromes or airspace under the authority of that State meets the requirements established by that State's regulatory framework.

Note.— Guidance material for regulatory framework for the oversight of instrument flight procedure design service is contained in the Manual on the Development of a Regulatory Framework for Instrument Flight Procedure Design Service *(Doc 10068).*

5. A State shall ensure that an instrument flight procedure design service provider utilizes a quality management system at each stage of the instrument flight procedure design process.

Note.— This requirement can be met by means of a quality assurance methodology, such as that described in PANS-OPS (Doc 8168), Volume II. Guidance for implementing such a methodology is contained in the Quality Assurance Manual for Flight Procedure Design *(Doc 9906).*

6. A State shall ensure that maintenance and periodic review of instrument flight procedures for aerodromes and airspace under the authority of the State are conducted. Each State shall establish an interval for periodic review of instrument flight procedures not exceeding five years.

Note.— Guidance on maintenance and periodic review is contained in the Quality Assurance Manual for Flight Procedure Design *(Doc 9906).*

a) airport, navigation aid, obstacle, and terrain coordinate and elevation data, based on verified surveys and complying with ICAO Annex 11, 14 and 15 requirements;

b) airspace requirements;

c) user requirements: needs of Air Traffic Service provider and operators who will use this procedure;

d) airport infrastructure such as runway classification, lighting, communications, runway markings, and availability of local altimeter setting;

e) environmental considerations; and

f) any other potential issue associated with the procedure.

4.4 PROCEDURE DESIGN

4.4.1 Procedures shall be designed according to State-approved criteria, taking into account all design inputs. Coordination with all concerned parties should continue throughout the procedure design and validation process to ensure that the procedure meets the needs of the user and the community.

4.4.2 Each new or revised procedure shall be verified by a qualified procedure designer other than the one who designed the procedure, to ensure compliance with applicable criteria.

4.4.3 Published procedures shall be subjected to a periodic review, including validation (4.6), to ensure that they continue to comply with changing criteria, to confirm continued adequate obstacle clearance and that they meet user requirements. The individual States shall establish the interval for periodic review of instrument flight procedures according to the needs of the State. The maximum interval for this review is five years.

Frequent shortcomings		
IAPs, SID and STARs charts maintenance are taken, as if they were IFPs review.	Lack of mechanism established to ensure effective implementation	IFPs published are due to review

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.243	Does the State ensure that the flight procedure designers of the service providers are properly trained for their assigned functions and tasks? 2024: Does the State ensure that the flight procedure designers have acquired and maintained the competency level through training?	1) Review mechanism established to ensure effective implementation. 2) Review documented training programme and verify if it includes, ~~when applicable,~~ initial, recurrent or specialized training. 3) Review method used by the State to confirm that training records are maintained.	PANS Doc 8168 (OPS) Vol. II, Part I, Section 2, C4, 4.7 GM Doc 9734 Part A, C3 Doc 9906 Vol. 2		CE-7

Frequent shortcomings		
No mechanism established to ensure effective implementation.	The states have not conducted or inappropriate surveillance and monitoring activities of IFPDSP training and qualification's (generic checklist).	Industry visit revealed that training records are not maintained or does not exist.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.247	Does the State ensure that all IFPs comply with measures that control the quality of the process (including obstacles check)? 2024: Does the State ensure that the quality management system is utilized at each stage of the instrument flight procedure design process (including flight validations)?	1) Review mechanism established to ensure effective implementation of: a) initial certification; and b) periodic reviews of existing IFPs. 2) Verify reports and results of flight validations (including assurance that adequate obstacle clearance has been provided). 3) Review how the State ensures that IFP packages also include a list of relevant obstacles and identification and description of controlling obstacles.	STD A11 App. 7, 5 PANS Doc 8168 (OPS) Vol. II, Part I, Section 2, C4, ~~4.1.2 & 4.6.1~~ Doc 9906 Vol. 1 & Vol. 5	Yes	CE-6

7.247

ICAO References

a) airport, navigation aid, obstacle, and terrain coordinate and elevation data, based on verified surveys and complying with ICAO Annex 11, 14 and 15 requirements;

b) airspace requirements;

c) user requirements: needs of Air Traffic Service provider and operators who will use this procedure;

d) airport infrastructure such as runway classification, lighting, communications, runway markings, and availability of local altimeter setting;

e) environmental considerations; and

f) any other potential issue associated with the procedure.

4.4 PROCEDURE DESIGN

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4.4.2 Each new or revised procedure shall be verified by a qualified procedure designer other than the one who designed the procedure, to ensure compliance with applicable criteria.

4.4.3 Published procedures shall be subjected to a periodic review, including validation (4.6), to ensure that they continue to comply with changing criteria, to confirm continued adequate obstacle clearance and that they meet user requirements. The individual States shall establish the interval for periodic review of instrument flight procedures according to the needs of the State. The maximum interval for this review is five years.

4.5 PROCEDURE DESIGN DOCUMENTATION

4.5.1 The documentation provided by the procedure designer is divided into three categories and includes:

a) documentation required for publication in the States' AIP in accordance with ICAO Annexes 4 and 15;

b) documentation required to maintain transparency concerning the details and assumptions used by the procedure designer, which should include supporting information/data used in the design, such as:

1) controlling obstacle for each segment of the procedure;

2) effect of environmental considerations on the design of the procedure;

3) infrastructure assessment;

4) airspace constraints;

5) the results of the periodic review and, for modifications or amendments to existing procedures, the reasons for any changes;

6) for any deviation from existing standards, the reasons for such a deviation and details of the mitigations applied to assure continued safe operations; and

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b) agree with one or more Contracting State(s) to provide a joint service; and/or

c) delegate the provision of the service to external agency(ies).

2. In all cases in paragraph 1 above, the State concerned shall approve and remain responsible for all instrument flight procedures for aerodromes and airspace under the authority of the State.

3. Instrument flight procedures shall be designed in accordance with State-approved design criteria.

4. Each State shall ensure that an instrument flight procedure design service provider intending to design an instrument flight procedure for aerodromes or airspace under the authority of that State meets the requirements established by that State's regulatory framework.

Note.— Guidance material for regulatory framework for the oversight of instrument flight procedure design service is contained in the Manual on the Development of a Regulatory Framework for Instrument Flight Procedure Design Service *(Doc 10066).*

5. A State shall ensure that an instrument flight procedure design service provider utilizes a quality management system at each stage of the instrument flight procedure design process.

Note.— This requirement can be met by means of a quality assurance methodology, such as that described in PANS-OPS (Doc 8168), Volume II. Guidance for implementing such a methodology is contained in the Quality Assurance Manual for Flight Procedure Design *(Doc 9906).*

6. A State shall ensure that maintenance and periodic review of instrument flight procedures for aerodromes and airspace under the authority of the State are conducted. Each State shall establish an interval for periodic review of instrument flight procedures not exceeding five years.

Note.— Guidance on maintenance and periodic review is contained in the Quality Assurance Manual for Flight Procedure Design *(Doc 9906).*

Frequent shortcomings		
Some States have confused the flight validation with flight inspections for NAVAIDs	The States have not developed an approval process of the IFP, including guidance for the industry	Some States easily dispense or omit the need to perform flight validations without requesting alternative means to ensure the accuracy and completeness of all obstacles.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.249	Does the State ensure that the IFPDS provider publishes obstacle clearance altitude/height (OCA/H)?	1) Review mechanism established to ensure effective implementation. 2) Review AIP AD 2.24 to see if published. 3) If aerodrome operating minima have been established by the State, verify if they are shown.	STD A4 11.10.7.2 A11 2.23 PANS Doc 8168 (OPS) Vol. II, Part I, Section 4, C5, 5.4 & C9, 9.4.3.1	Yes	CE-6

Frequent shortcomings		
No mechanism established to ensure effective implementation.	No checks conducted as part of the approval process.	AOM are not published.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.253	Does the State ensure that flight procedures are in accordance with the criteria promulgated by the State?	1) Review mechanism established implemented approval process to ensure effective implementation. 2) Verify that AIP procedures have been approved ~~in accordance with the criteria promulgated by the State.~~ before their publication in the AIP. 3) Sample approval records of flight procedures published in the AIP ~~as applicable:~~ ~~a) SID procedures (departures and arrivals)~~ ~~b) Approach procedures~~ ~~c) Circling procedures~~ ~~d) En-route procedures~~ ~~e) Holding procedures~~ ~~f) Noise abatement procedures~~ ~~g) Altimeter setting procedures~~ ~~h) Procedures for simultaneous operations on parallel runways.~~ ~~i) Procedures for SSR and transponder.~~	STD A11 2.34 & App. 7 ~~PANS Doc 8168 (OPS) Vol. II~~ GM Doc 9906 Vol. 1, 7.10 7.13	Yes	CE-6

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4. Each State shall ensure that an instrument flight procedure design service provider intending to design an instrument flight procedure for aerodromes or airspace under the authority of that State meets the requirements established by that State's regulatory framework.

Note.— Guidance material for regulatory framework for the oversight of instrument flight procedure design service is contained in the Manual on the Development of a Regulatory Framework for Instrument Flight Procedure Design Service *(Doc 10068).*

5. A State shall ensure that an instrument flight procedure design service provider utilizes a quality management system at each stage of the instrument flight procedure design process.

Note.— This requirement can be met by means of a quality assurance methodology, such as that described in PANS-OPS (Doc 8168), Volume II. Guidance for implementing such a methodology is contained in the Quality Assurance Manual for Flight Procedure Design *(Doc 9906).*

6. A State shall ensure that maintenance and periodic review of instrument flight procedures for aerodromes and airspace under the authority of the State are conducted. Each State shall establish an interval for periodic review of instrument flight procedures not exceeding five years.

Note.— Guidance on maintenance and periodic review is contained in the Quality Assurance Manual for Flight Procedure Design *(Doc 9906).*

2.34 Instrument flight procedure design service

States shall ensure that an instrument flight procedure design service is in place in accordance with Appendix 7.

7.10 APPROVE IFP (STEP 10)

The IFP must be approved by the State or by an authority designated by the State, prior to publication. This approval process must ensure that all the appropriate steps within the IFP process have been completed, documented and signed off by the competent authority.

Frequent shortcomings		
No mechanism established to ensure effective implementation	Published IFPs in the State AIP have not been approved.	Lack of an effective approval process.

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.255	Does the State ensure that IFPDS providers retain all procedure design documentation, so as to allow any data anomalies or errors found during the production, maintenance or operational use of the procedure to be corrected?	1) Review mechanism established to ensure effective implementation. 2) Review procedures, working files, documentation and data.	PANS Doc 8168 (OPS) Vol. II, Part I, Section 2, C4, 4.5.2		CE-7

Frequent shortcomings		
No mechanism established to ensure effective implementation.	Lack of oversight to ensure that IFPDS providers retain all procedure design documentation.	Industry visit revealed that IFPs documentation are not maintained or does not exist

PQ No.	Protocol Question	Guidance for Review of Evidence	ICAO References	PPQ	CE
7.393	Does the State ensure that requirements for flight inspection are established and periodical flight inspections are provided for radio navigation aids?	1) Review mechanism established to ensure effective implementation. 2) Review flight inspection regulations and procedures. 3) Verify flight inspection reports.	STD A10 Vol. I, 2.2 & C3 GM Doc 8071 Vol. I, C1 to C7	Yes	CE-7

Frequent shortcomings		
NAVAIDS at Airport have not been calibrated no in accordance with guidance material	VOR (DVOR) installation at one International Airport was installed and commissioned without conducting flight checks	Operational status of navigation aids is not promptly transmitted to the appropriate air traffic service (ATS) organizations

Interactive session on PQs related to IFPs

Thank You

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