

## INTERNATIONAL CIVIL AVIATION ORGANIZATION

## Fourth Meeting of the APIRG Airspace and Aerodrome Operations Sub-Group (AAO SG/4), Virtual Meeting, 16 to 18 August 2021

Agenda Item 3 Planning and Implementation

Agenda Item 3.1: Airspace (Safety, Capacity and Efficiency) projects.

# REPORT OF THE AFI SSR CODE ALLOCATION AND ASSIGNMENT REVIEW (ASCAAR)

(Presented by ASCAAR PROJECT TEAM)

#### **SUMMARY**

ASCAAR is an AFI priority project No. 3 set up to review AFI SSR Code Allocation and Assignment Method. The project is coordinated by ICAO and managed by the Project Team established through the APIRG methodology to ensure that adequate SSR codes are available to FIRs/blocks of airspace for allocation in order to enable assignment to aircraft in a safe, effective and efficient manner.

The project team used guidelines provided by ICAO to develop a multiple Participating Areas (PA) as opposed to the existing single (PA) model.

All AFI FIRs/States were allocated SSR Codes for international and domestic assignment.

Aircraft will retain the assigned international code beyond the FIR or national boundary within a given PA and only change when leaving the PA.

Aircraft assigned domestic code will retain such codes only within a given FIR.

The project has reached the trial stage with commencement date set for all States with Secondary Surveillance Radar (SSR) being 7<sup>th</sup> October 2021.

### **REFRENCE(S):**

- 1. Operational requirements for CNS(OPREC) and RVSM & Operational Safety in ATS (ROSATS) priority projects
- 2. ICAO Doc 4444 PANS ATM
- 3. ICAO Annex 10 Vol. IV

## **Related ICAO Strategic Objective(s):**

- 1. Enhance global civil aviation safety
- 2. Increase the capacity and improve the efficiency of the global civil aviation system

#### 1. INTRODUCTION

1.1 ASCAAR Project Team members as constituted by Airspace and Airport

Operations SG are;

Kenya – Chairperson

Botswana – Member

Côte d'Ivoire - Member

Ghana – Member

South Africa – Member

Nigeria – Member

Senegal – Member

ASECNA – Member

IATA – Member

CANSO – Member

IFATCA – Member

East African Community – Invited Organization

EUROCONTROL - Invited Organization

- 1.2 The new code allotment plan is expected to provide FIRs in the AFI region with a means to coordinate the use of 4096 SSR codes in Mode A/3 in the safest, efficient and economical manner.
- 1.3 Two physical meetings were held in May 2018 and January 2020 both in Nairobi, Kenya. The rest of the work was conducted online.

### 2. DISCUSSION

- 2.1 The team updated the AFI SSR Code Management Plan (CMP) and assignment standards in order to make codes available to all airspaces and improve usage to increase availability of each code as follows:
  - a) Streamlined inter-FIR code allocation within given blocks of airspace.
  - b) Increased the efficiency of SSR code usage.
- 2.2 The SSR Codes allocation process ensured that:
  - a) All States/FIRs/blocks of airspaces are allocated SSR codes.
  - b) No multiple code allocations in States/firs/blocks of airspace.
  - c) FIRs/blocks of airspace code allocation/sharing schemes are considered.
  - d) Addressed concerns related to interoperability of CNS/ATM systems.
- 2.3 To address safety concerns, the process ensured that there was:
  - a) No conflict in code allocation.
  - b) Availability of SSR codes for allocation to States and assignment to aircraft.
  - c) Equitable distribution of allocated SSR codes.

- 2.4 Multiple PA concept consisting of four (04) PAs; Central, East, South and West were proposed by the project team, accepted by AAO –SG/2 in June 2018 and formally adopted by APIRG/22 in 2019.
- 2.5 As agreed during APIRG/22, a workshop was held in January 2019, hosted by ICAO ESAF in Nairobi, Kenya. 74 participants from AFI were in attendance and matters related to new code allocation were finalized.
- 2.6 Following completion of ICAO internal processes on the proposal for amendment, the roll out date proposed for 7th October 2021 with the first sixty (60) days being utilized as a trial period to address any challenges arising during implementation. All States/FIRs that use SSR are required to adhere to the implementation dates as per ICAO State Letter Ref: ES AN 4/27-0175 of 8th June 2021.
- 2.7 To enhance the project implementation process, PA coordinators were identified by the project team to champion activities within the respective PAs as follows:
  - a) West Ghana
  - b) Central ASECNA and D R Congo
  - c) South South Africa
  - d) East Kenya
- 2.8 The states are required to prepare for the trial period; ensuing review and update of the equipment as necessary, review of procedures and documentation, training of personnel involved, and notification to the users of the planned trial.

#### 3. ACTION BY THE MEETING

- 3.1 The meeting is invited to:
  - a) Take note of the progress made by the project team in the implementation of the ASCAAR project and implementation date.
  - b) Request States to prepare for the trial period commencing on 7<sup>th</sup> October 2021.
  - c) Request State Focal Points to coordinate with their respective PA coordinators for effective implementation (roll out on 7<sup>th</sup> October 2021).
  - d) Compile and submit to ICAO feedback on the trial, including any changes that require changes to be made to the SSR CMP.

