

International Civil Aviation Organization

## **MID Region Flight Procedure Programme Steering Committee**

Fifth Meeting (MID FPP SC/5) (Doha, Qatar, 14 December 2023)

## Agenda Item 4: MID FPP Work Plan for the Year 2024

#### MID FPP WORK PLAN FOR THE YEAR 2024

(Presented by the Manager MID FPP)

#### **SUMMARY**

This paper presents the proposed Work Plan for the Year 2024 for discussion and approval of the MID FPP Steering Committee meeting.

Action by the meeting is at paragraph 3.

#### REFERENCES

- Report of the Third Meeting of the MID Region Flight Procedure Programme Steering Committee (MID FPP SC/3)

#### 1. Introduction

- 1.1 The Work Plan Y2022 was focused on (1) capacity building activities and (2) provision of services based on the current capabilities/resources available within the Programme considering the contribution of Donor States and Partners.
- 1.3 MID FPP Steering Committee (SC/3) meeting (virtual, 25 January 2023) agreed that in the Work Plan Y2023 and beyond, the activities should be customized to the needs of the member States and concentrated mainly on the requests for airspace/procedure design projects as well as on customized PANS OPS training courses and PBN-related classes.

#### 2. DISCUSSION

- 2.1 The **Year 3** (2024) of the Programme is continuing to be an essential year for the MID FPP in fulfilling its main objectives of providing support for States with training activities and consultancy/assistance services.
- 2.2 The proposed Work Plan 2024 activities are based on (1) use/management of the enlarged team (19 experts) of Programme's pool of resources and (2) consolidating the training experience & project consultancy expertise as delivered by the Programme during the Year 2022 and 2023.

- 2.3 The MID FPP services activities for 2024 would focus on final deliverables for specific IFPD/Regulatory Approval projects incepted in 2023.
- 2.4 The MID FPP training portfolio is containing PBN-related classes and workshops as well as custom-made/off-the-shelf PANS OPS Design (module-based) initial trainings respectively; MID FPP would also offer a PANS OPS class addressed to the CAA Oversight inspectors and guidance to States through workshop for the development of a National PBN Implementation Plan.
- 2.5 The meeting may wish to notice the high interest of Participating States for the MID FPP PBN 3-class package: (1) Navigation Database Procedure coding, (2) Inter-relationship Design Coding Charting/AIP and Regulatory Oversight & OPS Approval as follows: total of 7 training classes, 29 attendees from 7 States (Iraq, Jordan, Libya, Oman, Pakistan, Sudan, UAE), APAC FPP and United ATS.
- 2.6 Furthermore, in order to diversify the trainings spectrum, MID FPP portfolio for 2024 would include new topics, namely, PANS OPS for ATC, Oversight of IFPD and its quality assurance process requirements, airspace and routes (airways) design and a Webinar clarifying and enlightening new specifications of Doc. 9613 "PBN Manual", new 5<sup>th</sup> edition.
- 2.7 The meeting may wish to note that MID FPP trainings program for 2024 is continuing to count on the dedicated support of (1) DGAC France and ENAC within the frame of the Technical Agreement (TA), (2) the fruitful inter-collaboration with the regional APAC and Africa FPP respectively and, finally, on the sustenance of United for Aviation Technology Services (UATS) company as Donor organization to the Programme and important partner.
- 2.7 Consequently, the MID FPP Objectives for Year 2024 are as follows:
  - To consolidate MID FPP operations as a "building block" upon Year 1 and Year 2 groundworks.
  - To focus on customer-oriented projects and consultancy for IFPs and Airspace Design to States.
  - To develop and strengthen MID States capability for Procedure/Airspace Design by organizing new tailored/off-the-shelf PANS OPS Training courses.
  - To support MID States expertise by conducting educational or "case study" PBN-related workshops.
- 2.8 In view of the foregoing, the following Conclusion is proposed:

#### DRAFT CONCLUSION 5/X: MID FPP WORK PLAN FOR THE YEAR 2024

That, the MID FPP Work Plan for the year 2024 is endorsed.

#### 3. ACTION BY THE MEETING

3.1 Considering the available resources of the MID FPP and the Steering Committee decisions with regard to the future/sustainability of the programme, the meeting is invited to:

- a) discuss and review the proposed MID FPP Work Plan for the year 2024 as outlined in the **Appendix A** to this Working Paper; and
- b) endorse the Conclusion at para. 2.8.

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# "MID FPP Work Plan for the Year 2024"

#### MID FPP Objectives for Year 3

The **Year 3** (2024) of the MID FPP 3-year Phase I is continuing to be an essential year for the MID FPP in fulfilling its main objectives of providing support for States with training activities and consultancy/assistance services. The purpose of the Program is to provide opportunities to use the available training activities and services proposed by the Program for Participating States.

The proposed Work Plan 2024 activities are based on (1) use/management of the enlarged team (19 experts) of Programme's pool of resources and (2) consolidating the training experience & project consultancy expertise as delivered by the Programme during the Year 2022 and 2023.

The MID FPP services activities for 2024 will focus on final deliverables for specific IFPD/Regulatory Approval projects incepted in 2023.

The MID FPP training portfolio is containing PBN-related classes and workshops as well as custom-made/off-the-shelf PANS OPS Design (module-based) initial trainings respectively; MID FPP will be also offering a PANS OPS class addressed to the CAA Oversight inspectors and guidance to States through workshop for the development of a National PBN Implementation Plan.

Specifically, the MID FPP training portfolio for 2024 is newly including aspects of PANS OPS for ATC, Oversight of IFPD and its quality assurance process requirements, airspace and routes (airways) design and a webinar clarifying and enlightening new specifications of Doc. 9613 "PBN Manual", new 5<sup>th</sup> edition.

Consequently, the MID FPP Objectives for Year 2024 are as follows:

- To consolidate MID FPP operations as a "building block" upon Year 1 and Year 2 groundwork.
- To focus on customer-oriented projects and consultancy for IFPs and Airspace Design to States.
- To develop and strengthen MID States capability for Procedure/Airspace Design by organizing tailored/off-the-shelf PANS OPS Training courses.
- To augment and sustain MID States knowledge on PBN concept by organizing am interrelationship PBN design coding charting/AIP.
- To support MID States expertise by conducting educational or "case study" PBN-related workshops and webinar.

## **Description of MID FPP Activities for 2024**

#### 1) Inter-relationship PBN Design – Coding – Chart/AIP course (4 days) [5-8 Feb]

**Description:** The course is not simply intended to familiarize the participants with ARINC 424 standard and its database coding requirements, but additionally, it will be bringing the inter-disciplinary overview on each database element, where applicable, perceived from design, charting and/or AIS/AIP perspective. The course content includes a rich number of examples illustrating the inter-dependency between the three domains. The course is addressed to procedure designers/airspace planning professionals as well as to AIS & Charting experts involved in the State AIP production.

• Instructor: MID FPP Manager

Sponsorship: NILMaterial: MID FPP

• Facility: Physical (GCAA SZC Training Center, Abu Dhabi)

# 2) Initial PANS OPS tailored course for Iraq (6 weeks), [Q1, tentatively]

**Description**: There is a training request from Iraq ANSP (GCANS) for a customized initial PANS OPS training course. The tailoring is considering the course syllabus and duration as adapted to the specific needs. This training was deferred from 2023 at Iraq GCANS request.

• Instructor: United ATS Trainer

• Sponsorship/Project Owner: General Company for Air Navigation Services (GCANS)/MID FPP

Material: United ATS

• Facility: Baghdad/Iraq, 10 attendees.

#### 3) Initial PANS OPS Procedure Design class (4 weeks), [17 June – 12 July]

**Description:** The course aimed to support States/Administrations in developing their instrument flight procedure design capacity. This course consists of (1) basics, including definitions, abbreviations, units of measurements, frame of reference, (2) criteria for the fundamental instrument procedure design, including en-route, arrival procedures (STAR), departure procedures (SID), MSA, holding, NPA and ILS procedures based on ground navigation aids and (3) charting and documentation. The training is organized around courses, exercises and assessments to apply all the regulatory criteria addressing conventional procedures. The pillars of this training include a case study from ICAO Doc 9368 and a published procedure. At the end of the course, an individual assessment report could be provided to on-site participants as required.

• Instructor: APAC FPP Expert

Sponsorship: NILMaterial: APAC FPP

• Facility: Online, three (3) seats for MID FPP

#### 4) PANS OPS Training for CAA Inspectors course (5 days), [Date TBD]

**Description:** The course aimed to support States/Administrations in strengthening its Oversight Inspectors knowledge and expertise with the guidance for quality assurance in the elements of procedure design, the requirements and process steps of Instrument Flight Procedure Design (IFPD) in general and particularly of the core process of Flight Procedure Design (FPD) as laid down in ICAO Doc. 9905, Vol. I "Flight Procedure Design Quality Assurance System". It also provides familiarity and awareness towards the IFP supporting processes (software validation, training, etc.) and the upstream and downstream processes e.g., data origination, AIS, database coding. The course is open primarily to State CAA inspectors as well as to Lead/Chief Design personnel of the IFPD organizations.

Instructor: ENAC Expert

• Sponsorship: ENAC/DGCA France

· Material: ENAC

• Facility: Toulouse/France, two (2) seats for MID FPP attendees

# 5) Advanced (part I)/Advanced (part II) PANS OPS course (2 weeks), [Date TBD]

**Description:** The course aimed to support States/Administrations in developing their PBN procedure design capacity. This course is considered as the advanced step of a thorough training to design IFR procedures. The course is made of two modules as part of UATS iGAT training courses package. The instruction consists of lectures, exercises, progress tests and examinations. The practical task consists of an PA (LPV/SBAS CAT I) and Baro-VNAV (LNAV/VNAV) type of procedures. The course is open to participants who have completed the PANS-OPS flight procedure design initial training course. Upon request and following States interest, the PBN HEL Point in Space (PinS) course may also be delivered.

• Instructor: United ATS trainer • Sponsorship: United ATS

• Material: United ATS

• Facility: TBD (maybe Cairo at UATS premises)

### 6) National PBN Implementation Plan workshop (5 days), [September, Date TBD]

**Description:** The ICAO Assembly Resolution A37-11 requires States to develop a PBN implementation plan. The workshop aimed to support States/Administrations Civil Aviation Authority and/or Air Navigation Service Provider (ANSP) in providing guidance on how to develop a PBN implementation and transition plan and suggesting what such a plan could contain.

Whilst it is not possible to provide a tailor made PBN plan outline and, even less desirable to create a 'onesize fits all" transition plan, the workshop will suggest a generic architecture of what this plan should be.

Instructor: Africa FPP facilitators

Sponsorship: NIL Material: Africa FPP

Facility: Dakar/Senegal, seats for MID FPP to be coordinated.

#### 7) PANS OPS Oversight + IFPD Quality Assurance workshop (2 weeks), (July, Date TBD]

**Description:** The workshop is based on ICAO Doc. 9997 "PBN Operational Approval Manual" and conducts to support States in developing their operational approval capability for approving PBN operations and air operators in obtaining PBN OPS approvals, it introduces PBN and its purpose and the way PBN specifications are introduced in the oversight process. It focuses on the quality assurance processes associated with procedure design activities and the enforcement of PBN operations by aircraft operators and the associated oversight. The purpose of the course is to provide experienced flight operations inspectors, personnel from CAA (or National Supervisory Authority), procedure designers and air operators' staff with a comprehensive understanding of the requirements for PBN operational approval. The course is open to participants involved in PBN flight operations.

Facilitator/Instructor: Africa FPP experts

Sponsorship: NIL Material: Africa FPP

Facility: Accra/Ghana or Yaoundé/Cameroon, seats for MID FPP to be coordinated.

## 8) PBN Flight Procedure Design for ATC workshop (2 days), [27-28 February]

Description: The workshop aimed to support States/Administrations in developing their PBN procedure design capacity. This course of (1) basics of PBN instrument flight procedure (IFP) design and (2) operational factors to consider in the PBN IFP design. This course is mainly for the new/potential procedure designers and air traffic controllers, but also available to other relevant personnel such as regulators of CAA inspectors, pilots, AIS and airports personnel. At the end of the workshop, a certificate of participants will be issued but no individual assessment report to participants.

Facilitator/Instructor: APAC FPP Experts

Sponsorship: NIL Material: APAC FPP

Facility: Online, three (3) seats for MID FPP attendees.

## 9) PBN Manual (Doc. 9613, new 5<sup>th</sup> edition) webinar (2 days), [Date TBD]

Description: The webinar is organized together with ICAO MID office and it's aimed to familiarize States/Administrations experts with the new 5<sup>th</sup> edition of Doc. 9613 changes affecting RNP implementation including updated technical standards from the Radio Technical Commission for Aeronautics (RTCA) and the European Organization for Civil Aviation Equipment (EUROCAE), expansion of RNP applications where authorization is required (AR), lessons learned from RNP procedures publication and updated PBN regulatory guidance material.

• Facilitator: MIDFPP, ICAO MID, IATA, partner organizations

• Sponsorship: Industry/Stakeholders

• Material: ICAO MID & FPP

• Facility: Webinar

## 10) Airspace and Routes (airways) Design workshop (2 weeks), [Date TBD]

**Description:** The participants will learn the basics of Airspace and Routes Design (Conventional & PBN mixed environment) in order to be able to be efficiently part of an airspace design project team. The objective of this course is to provide theoretical background in the design of airspace, particularly in lower airspace and terminal areas. A practical workshop during the second week will allow participants to take part in the different steps of the design of a new Airspace with Routes based on real traffic data. The targeted audience are ATS managers, supervisors, controllers, and technicians involved in airspace and procedure design.

• Instructor/Facilitator: ENAC experts

• Sponsorship for MID FPP: ENAC France

Material: ENAC

• Facility: Toulouse/France, two (2) seats for MID FPP Pool of Experts.

## Provision of specific projects and consultancy for IFPs/Airspace design to States.

The MID FPP provides support to member States through consultancy service (based on specific requests coming from States). These services are including a broad spectrum of support provided thru the Programme resources/experts already in place as follows:

#### (1) IFPD Conv. STARs/IAPs Kirkuk Intl Airport/ORKK project (incepted in 2023)

**Description:** Conducting from survey/data gathering up to preparation of regulatory approval package and support for publication of the following Instrument Flight Procedures (IFP): ILS/DME runway 31, VOR/DME runway 13 and VOR/DME 31 as well as the design of feeder/arrival routes connecting to the Initial Approach Fix (IAF) rwy 13 and 31 respectively. Also, handling procedure design/procedure re-assessment for ILS rwy 31 and new VOR rwy 13 & 31, ground validation, support of safety activities, creation of draft charts & associated tabular description, flight validation package support, project management.

**Note:** The Terrain and Obstacles data survey as well as the Flight Validation activities are envisaged to be provided thru United ATS company.

- Facilitator: MID FPP Pool of Experts (PoE), UATS (refer to Note above)
- Sponsorship/Project Owner: Kirkuk Intl Airport
- Duration/Date: According to the Project Plan/TBD
- Facility: Remote.

# (2) IFPD Risk Assessment & Regulatory approval for Sulaymaniyah Intl Airport/ORSU (incepted in 2023)

**Description**: Sulaymaniyah Intl Airport (ORSU) requested MID FPP to conduct a Risk Assessment for their new instrument procedures consisting of Conventional SIDs, STARs, ILS CAT I and VOR/DME for both runway 13 & 31. The initial procedure design was created by the airport experts under the supervision of an external experienced designer. The procedures were also successfully flight validated through a commercial specialized service provider.

- Facilitator: MID FPP Pool of Experts (PoE)
- Sponsorship/Project Owner: Sulaymaniyah Intl Airport (ORSU)
- Duration/Date: According to the Project Plan/TBD
- Facility: Remote.

# (3) IFPD Consultancy IFP Regulatory Approval Erbil Intl Airport/ORER (incepted in 2023)

**Description:** Erbil requested for MID FPP consultation service for finalizing the outstanding project with CGX Aero company (France) on the new Instrument Flight Procedures (IFPs) package. The MID FPP consultancy service shall be performed in support of the regulatory approval package by Iraq CAA of the Conventional and PBN Instrument Flight Procedures SIDs, STARs, ILS and RNP runway 18 & 36, respectively.

- Facilitator: MID FPP Pool of Experts (PoE)
- Sponsorship/Project Owner: Erbil Intl Airport (ORER)
- Duration/Date: According to the Project Plan/TBD
- Facility: Remote.

# **MID FPP Work Plan 2024**

<b>Activity Type</b>	Subject	Location*	Duration	Date	Remarks
Training PBN	Inter-relationship PBN Design – Coding – Chart/AIP Course	Abu Dhabi/SZC	4 days	5-8 Feb	Max ten (10) attendees.
	PANS OPS Initial training (tailored syllabus Iraq)	Baghdad/Iraq	6 weeks	TBD	Ten (10) participants. Training
				(Q1 tentatively)	deferred from 2023 at Iraq request.
	Initial PANS OPS Procedure Design	Online	4 weeks	17 June-12 July	APAC FPP training class. Three
					(3) seats for MID FPP
Trainings PANS OPS	PANS OPS for CAA Inspectors	Toulouse/France	5 days	TBD	ENAC training class. Two (2) seats
					for MID FPP.
	Advanced (part I) PANS OPS	Onsite/TBD	2 weeks	TBD	United ATS (iGAT portfolio).
	Advanced (part II) PANS OPS and/or PinS HEL	Onsite/TBD	2 weeks	TBD	United ATS (iGAT portfolio for
				(Q3 tentatively)	2024). PinS on request only.
	National PBN Implementation Plan	Dakar/Senegal	5 days	TDB	Africa FPP facilitators. Seats for
				(September)	MID FPP to be coordinated.
	PANS OPS Oversight + IFPD Quality Assurance	Accra/Ghana or	2 weeks	TBD	Africa FPP. Alternate to above as
Workshops		Yaoundé/Cameroon		(July)	based on request/interest only.
	PBN Flight Procedure Design for ATC	Online	2 days	27-28 Feb	APAC FPP workshop. Three (3)
					seats for MID FPP.
	PBN Manual (Doc. 9613, new 5 <sup>th</sup> edition) webinar	Onsite/TBD	2 days	TBD	MID FPP, ICAO MID, IATA. No
					seats limitation.
	Airspace and Routes (airways) Design	Toulouse/France	10 days	TBD	ENAC. Two (2) seats for MID FPP
					PoE *
	IFPD Conv. STARs/IAPs Kirkuk/ORKK (incepted in 2023)	MID FPP PoE *	Project Plan	TBD	Project deliverables: 70% in 2024
	IFPD Risk Assessment & Regulatory approval for	MID FPP PoE *	Project Plan	TBD	Project deliverables: 70% in 2024
	Sulaymaniyah/ORSU (incepted in 2023)				
Customer-oriented	IFPD Consultancy IFP Regulatory Approval Erbil/ORER	MID FPP PoE *	Project Plan	TBD	Project deliverables: 70% in 2024
Projects	(incepted in 2023)				

<sup>\*</sup> **SZC** = GCAA Sheikh Zayed Air Navigation Training Center (MID FPP premises) \* **PoE** = Pool of Experts