



International Civil Aviation Organization

**Aerodrome Operational Planning
Sub-Group (AOP SG)**

**Eighth Meeting
(Cairo, 13– 15 February 2012)**

Agenda Item 8: Review of Air Navigation Deficiencies in the AOP field

**REVIEW AND UPDATE THE LIST OF AIR NAVIGATION DEFICIENCIES
IN THE AOP FIELD**

(Presented by the Secretariat)

SUMMARY
This working paper presents the deficiencies in the AOP field for review, update and remedial actions.
Action by the meeting is at paragraph 3.
REFERENCES
- MIDANPIRG/12 Report

1. INTRODUCTION

1.1 The identification, assessment and reporting of air navigation deficiencies represent a regular task of the ICAO Planning and Implementation Regional Groups (PIRGs).

1.2 The standard definition of deficiency adopted by the ICAO Council in November 2001 should be used as basis to avoid different interpretations of the problems raised, which could be classified as complaints/mission findings rather than deficiencies:

“A Deficiency is a situation where a facility, service or procedure does not comply with a regional air navigation plan approved by the Council, or with related ICAO Standards and Recommended Practices, and which situation has a negative impact on the safety, regularity and /or efficiency of international civil aviation.”

2. DISCUSSION

2.1 The meeting may wish to note that the DGCA-MID/1 Meeting (Abu Dhabi, UAE, 22-24 March 2011) noted the concerns expressed by the various ICAO organs including the Council, the Air Navigation Commission (ANC) and MIDANPIRG on the serious impact the long standing deficiencies have on safety

2.2 The meeting may wish to recall that MIDANPIRG/11 and MIDANPIRG/12 noted with concern that many deficiencies continue to persist for a number of years.

2.3 The updating of the list of deficiencies, which is considered as a living document, is an on-going activity of the Secretariat to reflect the identified/reported air navigation deficiencies in the MID Region. The updated list of deficiencies in the AOP field is at **Appendix A** to this working paper.

2.4 The DGCA-MID/1 Meeting noted that MIDANPIRG/12 underlined that the lack of sufficient number of qualified technical staff is the highest contributing factor for the non-elimination of the safety deficiencies in the MID Region (both air navigation deficiencies and USOAP findings). The meeting noted that as part of the ICAO MID Regional Office Work Programme, Seminars, Workshops and Training Courses are being organized in the MID Region based on needs identified within the framework of MIDANPIRG or by ICAO (HQ and Regional Office). Nevertheless, the meeting recognized that more effort should be put in the training of technical staff and re-iterated MIDANPIRG/12 Recommendations and Conclusion on the subject, including, the call for States to organize at the National Level Seminars, Workshop and Training courses, in coordination with and with the support of the ICAO MID Regional Office, in order to touch a larger number of staff from the State.

2.5 The meeting may wish to note that the DGCA-MID/1 Meeting was of the view that a number of deficiencies were common to many States and accordingly encouraged States to work cooperatively towards the elimination of such deficiencies, in particular with a joint effort for the training of technical staff. It was also highlighted that the Regional Safety Oversight Organizations (RSOOs) could play an important and effective role in this respect.

2.6 The meeting may wish to note that the following brief analysis of the deficiencies in the AOP field was presented to and agreed by MIDANPIRG/12:

- The list of deficiencies in the AOP field with particular attention to the Action Plan supports their elimination. However, the non-participation of some MID States in the AOP SG Meetings and ANS Sub-Group Meetings results-in continue listing of their AOP deficiencies.
- AOP deficiencies in the MID Region were due to inadequate aerodrome facilities and inadequate aerodrome services. The main root of AOP deficiencies in the MID Region were caused by lack of effective State Safety Oversight System; financial reasons and lack of personnel experience.
- IATA and IFALPA review of the MID Region Air Navigation Deficiencies in the aerodrome field that affect Flight Safety and Operating Efficiency, raised a concern over the slow action by many States to correct ongoing deficiencies in the Region. Ongoing deficiencies in the Region that is also, IATA concern is the provision of some basic aerodrome operations' requirements across the Region, in particular the minimum dimensions of the Runway End Safety Area (RESA), and Runway Strip Dimensions which requires revisions.

2.7 The meeting may wish to note that MIDANPIRG/12 developed Conclusion 12/75 related to the Elimination of Air Navigation Deficiencies as follows:

CONCLUSION 12/75: ELIMINATION OF AIR NAVIGATION DEFICIENCIES IN THE MID REGION

That, MID States be urged to:

- a) review their respective lists of identified deficiencies, define their root causes and forward an action plan for rectification of outstanding deficiencies to the ICAO MID Regional Office prior to **31 March 2011**;*
- b) use the online facility offered by the ICAO MID Air Navigation Deficiency Database (MANDD) for submitting online requests for addition, update, and elimination of air navigation deficiencies;*
- c) accord high priority to eliminate all air navigation deficiencies with emphasis on those with priority "U"; in particular by allocating the necessary budget to ensure that their Civil Aviation Authorities have and retain a sufficient number of qualified technical personnel, who are provided with appropriate initial, on-the-job and recurrent training; and*
- d) seek support from regional and international organizations (i.e. ACAC, GCC, etc.) for the elimination of identified air navigation deficiencies.*

2.8 The meeting may wish to note that DGCA-MID/1 developed the following Conclusion:

CONCLUSION 1/2: ELIMINATION OF AIR NAVIGATION DEFICIENCIES IN THE MID REGION

That, States:

- a) accord high priority to the elimination of air navigation deficiencies; in particular by allocating the necessary budget to ensure that their Civil Aviation Authorities have and retain a sufficient number of qualified technical personnel, and provide appropriate initial, on-the-job and recurrent training;*
- b) work cooperatively towards the elimination of common deficiencies; and*
- c) consider the use of the Regional Safety Oversight Organizations (RSOOs) as an efficient mechanism for, inter-alia, the provision of appropriate training to technical staff and elimination of common deficiencies.*

2.9 As a follow-up action to the above Conclusions, the ICAO MID Regional Office issued on 25 May 2011 State Letter Ref.: AN 2/2 – 11/123 requesting States to review their list of air navigation deficiencies, define their root causes and forward an updated action plan for rectification of the outstanding deficiencies, to the ICAO MID Office, not later than **30 June 2011**. States were also strongly encouraged to use the online facility offered by the MANDD for submitting the updates and action plans for the Elimination of Air Navigation Deficiencies.

3. ACTION BY THE MEETING

3.1 The meeting is invited to:

- a) note the information contained in this working paper;
- b) review and update the list of deficiencies at **Appendix A** to this working paper in the AOP field;
- c) explore ways and means of eliminating them; and
- d) urge States to take necessary follow-up actions to implement MIDANPIRG/12 Conclusion 12/75 and the DGCA-MID/1 Conclusion 1/2.

APPENDIX A

MIDANPIRG/12
 Appendix 6.1A to the Report on Agenda Item 6.1

Deficiencies in the AOP Field

BAHRAIN

Item No	Identification		Deficiencies			Corrective Action				
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action	
1	Annex 14 Vol. 1.4.1, 1.4.4	Bahrain Intl Airport	Implementation of Certification of Aerodromes used for international operations.	Nov, 2006	Updated Information on Feb. 2009: Aerodrome Manual for Bahrain Intl Airport is ready awaiting the completion of legislations.	H	Need to approve the developed Aerodrome Manual for the international aerodrome and insure it includes a Safety management system prior to granting the aerodrome certificate.	BCAA	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: “F”= Financial

“H”= Human Resources

“S”= State (Military/political)

“O”= Other unknown causes

Deficiencies in the AOP Field

EGYPT

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
1	MID Basic ANP & FASID (Doc 9708)	Alexandria Int'l Airport	Runway is short and current distance is 7221 FT with runway all up weight maximum 68000kgs	Jul, 2004	Cannot be served as an alternate	F O	This restriction require runway upgrade and length extensionCAA has no plans, at the time being, to upgrade the said runway as it is not possible, from the engineering point of view, to upgrade these runways. However, Borg el Arab Airport runway can be used. List of alternate airports for Cairo FIR is to be revised. (PFA of MID FASID AOP1-Tables)	ECAA	Dec, 2011	A

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

6.1A-3

Item No	Identification		Deficiencies			Corrective Action				
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
2	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Luxor, Aswan, Borg El Arab, Alexandria, ALamainTaba, El-Arish, Shark El Owenat, Port Said, St. Cathrine Intl. Airports	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	F H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations. State: Implemented for 4 Airports .Cairo, Sharm El Sheikh,, Hurghada, Maersa Alam In Progress ASWAN, LuXer, Borg El-Arab, Taba, The rest is planned for Nov.2011	ECAA	Nov, 2011	U

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

Item No	Identification		Deficiencies			Corrective Action				
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
3	Annex 14 Vol. 1.4.1, 1.4.4	Luxor, Aswan, Borg El Arab, Alexandria, Almaza, Taba, Alamain, El-Arish, Shark El Owenat, Port Said, St. Cathrine Intl. Airports	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H	Need to develop an Aerodrome Manual for each listed international aerodrome and insure it includes a safety management system prior to granting the aerodrome certificate. State: implemented: Cairo, Sharm El-Sheikh, Hurghada, Mersa Alam, In Progress: Luxor, Aswan Borg Al-Arab, Taba The rest is planned for Nov 2012	ECAA	Nov, 2012	U
4	Annex 14 Vol. IFASID Table AOP-1MID/3 Rec. 1/3	Alexandria Intl Airport	No runway demarcation lines available on RWY 18/36, to identify the entry position to RWY 04/22	May, 2007	-	F	need to have a visual cues to define a safe holding position prior to the intersection point of RWYs 18/36 and 04/22 and not to be left to the pilot judgment to decide where to hold and how far from the RWY edge.	EAC	Nov, 2011	U

⁽¹⁾ Rationale for non-elimination: “F”= Financial

“H”= Human Resources

“S”= State (Military/political)

“O”= Other unknown causes

6.1A-5

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
5	Annex 14 Volume I, Chapter 5	Cairo Int`l Airport	Taxiway marking to Stands are confusing as old markings are not removed.Problem exacerbated at night and when wet. Stop markings at new Terminal 2 difficult to interpret	Jan, 2008	-	F H O	Remove old markings	CAC	Dec, 2011	A
6	Annex 14 Volume I, Chapter 5	Aswan Int`l Airport	First 200m RWY 35 unusable. No displaced threshold markers	Jan, 2008	-	F H	Markers required	EAC	Nov, 2012	A

⁽¹⁾ Rationale for non-elimination: “F”= Financial

“H”= Human Resources

“S”= State (Military/political)

“O”= Other unknown causes

Deficiencies in the AOP Field

IRAN

Item No	Identification		Deficiencies			Corrective Action				
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action	
1	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Emam Khomainsi, Mehrabad, Esfhan, Shahid Hashmi Nejad, Shiraz, Tabriz and Zahedan Intl. Airports	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	F H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations	CAO & IAC	Dec, 2011	U
2	Annex 14 Vol. 1.4.1, 1.4.3, 1.4.4	Emam Khomainsi, Mehrabad, Esfhan, Shahid Hashmi Nejad, Shiraz, Tabriz and Zahedan Intl. Airport,	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H	Need to establish an appropriate regulatory framework. Need to establish a criteria for the certification of aerodromes. Need to develop an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granting Certification of Aerodrome.	CAO & IAC	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: “F”= Financial

“H”= Human Resources

“S”= State (Military/political)

“O”= Other unknown causes

6.1A-7

Deficiencies in the AOP Field

IRAQ

Item No	Identification		Deficiencies			Corrective Action				
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action	
1	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Baghdad /Basrah/Erbil /Sulaymaniyah/ Al Najaf Int'l. Airports	Implementation of Aerodrome Operations Safety Management Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H O	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations State: Dec 2010 except for Baghdad & Najaf June 2011	ICAA	Dec, 2011	U
2	Annex 14 Vol. 1.4.1, 1.4.3, 1.4.4	Baghdad/ Basrah/ Erbil /Sulaymaniyah / Al Najaf Intl. Airports	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H O	Need to establish an appropriate regulatory framework. Need to establish a criteria for the certification of aerodromes. Need to develop an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granting certification of aerodrome. State: Dec, 2010 except for Baghdad & Najaf June 2011	ICAA	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

Deficiencies in the AOP Field

JORDAN

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
1	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Amman/Queen Alia, Amman/Marka, King Hussien/Aqaba Intl. Airports	Implementation of Aerodrome Operations Safety Management	Nov, 2006	State Safety Programme has been established, SMS is implemented at King Hussein Int.l Aerodrome only.	S	Need to ensure implementation of SMS for aerodrome operations at Queen Alia, and Marka Int'l Aerodromes in order to achieve an acceptable level of safety	Jordan CARC	Sep, 2011	U

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

6.1A-9

Deficiencies in the AOP Field

KUWAIT

Item No	Identification		Deficiencies			Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action
No Deficiencies Reported									

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

Deficiencies in the AOP Field

LEBANON

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
1	Annex 14 Vol. 1.4.1, 1.4.4	R.B.H. Beirut Intl. Airport	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H	Need to develop an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granting the aerodrome certificate	LCAA	Dec, 2011	U
2	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	R.B.H. Beirut Intl. Airport	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	F H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations	LCAA	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: “F”= Financial

“H”= Human Resources

“S”= State (Military/political)

“O”= Other unknown causes

6.1A-11

Deficiencies in the AOP Field

OMAN

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
1	Annex 14 Vol. 1.4.1, 1.4.4	Muscat/ Salalah Intl. Airports	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H	Need to devlope an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granting the aerodrome certificate	DGCAM	Dec, 2011	U
2	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Muscat/ Salalah Intl. Airports	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	F H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations	DGCAM	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

Deficiencies in the AOP Field

QATAR

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
1	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Doha Intl. Airport	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations	CAA	Dec, 2011	U
2	Annex 14 Vol. 1.4.1, 1.4.3, 1.4.4	Doha Intl. Airport	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	H	Need to establish an appropriate regulatory framework. Need to establish a criteria for the certification of aerodromes. Need to devlope an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granti	CAA	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

Deficiencies in the AOP Field

SAUDI ARABIA

Item No	Identification		Deficiencies			Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action
No Deficiencies Reported									

⁽¹⁾ Rationale for non-elimination: “F”= Financial

“H”= Human Resources

“S”= State (Military/political)

“O”= Other unknown causes

Deficiencies in the AOP Field

SYRIA

Item No	Identification		Deficiencies			Corrective Action				
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action	
1	Annex 14 Vol. IFASID Table AOP-1MID/3 Rec. 1/3	Damascus int'l Airport	Apron lighting inadequate	Sep, 2003	-	F H	Apron lighting is to be improved	CAA	Dec, 2011	U
2	Annex 14 Vol. IFASID Table AOP-1MID/3 Rec. 1/3	Damascus int'l Airport	Runway surface rough and damaged. Runway markings unsatisfactory	Sep, 2003	-	F H	RWY Surface to be repaired and refurbished, Markings are to be improved	CAA	Dec, 2011	A
3	Annex 14 Vol. IFASID Table AOP-1MID/3 Rec. 1/3	Damascus int'l Airport	DAM/DVOR 116 MHZ Out of Service	Jun, 2004	-	F	The VOR/DME to be replaced	CAA	Dec, 2011	A
4	Annex 14 Vol. 1.4.1, 1.4.4	Damascus, Aleppo, Bassel Al-Assad Int'l. Airports	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H	Need to develop an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granting the aerodrome certificate	CAA	Dec, 2011	U
5	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Damascus, Aleppo, Bassel Al-Assad Intl. Airports	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	F H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations	CAA	Dec, 2011	U

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

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6.1A-15

Deficiencies in the AOP Field

UAE

Item No	Identification		Deficiencies			Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination	Description	Executing Body	Date of Completion	Priority for Action
No Deficiencies Reported									

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes

Deficiencies in the AOP Field

YEMEN

Item No	Identification		Deficiencies				Corrective Action			
	Requirement	Facilities/ Services	Description	Date First Reported	Remarks/ Rationale for Non-elimination		Description	Executing Body	Date of Completion	Priority for Action
1	Annex 14 Vol. 1.5.1, 1.5.2, 1.5.3 & 1.5.4	Sanaa, Aden, Hodeibah, Taiz Intl. Airports	Implementation of Aerodrome Operations Safety Management	Nov, 2006	-	F H	Need to establish a State safety programme and implement an SMS in order to achieve an acceptable level of safety in Aerodrome Operations	DGCA	Dec, 2011	U
2	Annex 14 Vol. 1.4.1, 1.4.3, 1.4.4	Sanaa, Aden, Hodeibah, Taiz Intl. Airports	Implementation of Certification of Aerodromes used for international operations	Nov, 2006	-	F H	Need to establish an appropriate regulatory framework. Need to establish a criteria for the certification of aerodromes. Need to devlope an Aerodrome Manual for each international aerodrome and insure it includes a safety management system prior to granti	GCAA	Dec, 2011	U

-END-

⁽¹⁾ Rationale for non-elimination: "F"= Financial

"H"= Human Resources

"S"= State (Military/political)

"O"= Other unknown causes