

International Civil Aviation Organization

MIDANPIRG Air Traffic Management Sub-Group

Fourth Meeting (ATM SG/4) (Amman, Jordan, 29 April – 3 May 2018)

Agenda Item 6: ATM Safety Matters

OUTCOME OF THE MIDRMA BOARD/15 MEETING

(Presented by the Secretariat)

SUMMARY

This paper presents the outcome of the MIDRMA Board/15 meeting.

Action by the meeting is at paragraph 3.

REFERENCES

- MIDRMA Board/15 Report

1. Introduction

- 1.1 The Middle East Regional Monitoring Agency (MIDRMA) has been established in accordance with the provisions of ICAO Annex 11, to monitor the height-keeping performance of aircraft operating between FL290 and 410 inclusive, in order to ensure that the continued application of the vertical separation minimum meets the safety objectives. The MIDRMA is composed of the fifteen (15) MID States and is hosted in Bahrain, and staffed with three full time experts equipped with the latest GPS-based Monitoring Units (GMUs).
- 1.2 It is to be highlighted that the MIDRMA has currently several tools to improve the monitoring of RVSM implementation such as:
 - Large Height Deviation (LHD) Online Reporting Tool;
 - MID Collision Risk Assessment Software (MID RAS);
 - Online Auto Minimum Monitoring Tool; and
 - Airspace Collision Risk Hot-spot Analysis software
- 1.3 Details on the MIDRMA activities and tools will be presented by the MIDRMA. States are invited to visit the MIDRMA website (www.midrma.com) for more information, reports and tools related to the RVSM implementation.
- 1.4 The Fifteenth meeting of the Middle East Regional Monitoring Agency Board (MIDRMA Board/15) was held in Muscat, Oman, from 29 to 31 January 2018. The meeting was attended by a total of thirty six (36) participants from eleven (11) States (Bahrain, Egypt, Iraq, Jordan, Kuwait, Lebanon, Oman, Qatar, Saudi Arabia, Sudan and UAE) and two (2) Organizations (IFALPA and MIDRMA).

2. DISCUSSION

Large Height Deviation (LHD) Reporting

- 2.1 The MIDRMA Board/15 meeting underlined that several FIRs with high volume of traffic continue to report NIL or very few LHDs, which have a negative effect on the computed Targets Level of Safety (i.e.: not representative/realistic). In this respect, the meeting urged States to take necessary measures to encourage the reporting of LHDs by air traffic controllers such as inclusion of the reporting of LHDs as part of their reporting system (SMS).
- 2.2 The MIDRMA Board/15 meeting reiterated MIDANPIRG Conclusion 15/6, and encouraged States to develop a simplified LHD Template containing the minimum data necessary to trigger the process of reporting LHDs by the air traffic controllers.
- 2.3 The MIDRMA Board/15 meeting reviewed, analyzed and validated the LHD Reports provided to the MIDRMA for the period 1 June 2016 to 31 December 2017.
- 2.4 The MIDRMA Board/15 meeting urged States to verify their LHDs prior to submission through the online LHD Reporting Tool to avoid the efforts spent on the analysis of false reports by concerned ATS Units. Some of the LHD Reports could not be reviewed and analyzed due to the absence of the concerned States.
- 2.5 The MIDRMA Board/15 meeting noted that most of the LHDs were related to coordination failures between adjacent ACCs. Accordingly, States were encouraged to implement AIDC/OLDI, which would improve significantly the coordination process and would reduce the amount of coordination failures, thus enhancing safety. The meeting noted that Baghdad ACC is in close coordination with Ankara for implementation of OLDI, which is expected to be completed by July 2018. In the same vein, Oman and UAE agreed to implement OLDI between Muscat and Sheikh Zayed Centre tentatively by 12 March 2018.
- The MIDRMA Board/15 meeting noted with concern the high level of LHDs reports at the interface between Iraq and Kuwait as well as Muscat with Mumbai and Karachi. The meeting noted that a Safety Protocol has been opened for the case of Muscat/Mumbai and that the MIDRMA and ICAO MID Office are in close coordination with concerned States, MAAR and ICAO APAC Office to resolve the issue. The meeting agreed that a Special Coordination Meeting between Iran, India, Oman and Pakistan with the presence of MAAR, MIDRMA and ICAO APAC and MID Regional Offices, to be held, as soon as possible, to agree on clear action plan to mitigate the risk associated with the high level of coordination failures at the interfaces between the above mentioned States.
- 2.7 The MIDRMA Board/15 meeting tasked the MIDRMA in coordination with the MID Office to develop a procedure for the processing of a Safety Protocol to be approved by the MIDRMA Chairman and presented for the MIDRMA Board/16 meeting for endorsement.
- 2.8 With a view to address the LHDs in an effective manner with the ATS Units concerned and to analyze the LHDs prior to presentation to the MIDRMA Board or ATM SG meetings for validation, the meeting agreed that the MIDRMA should conduct bilateral teleconferences with the adjacent ATS Units to analyze the relevant LHDs and present a consolidated report to the MIDRMA Board or the ATM SG meetings for validation in order to finalize the SMR for endorsement by MIDANPIRG.

2.9 Based on the above the meeting agreed to the following Draft Conclusion:

DRAFT CONCLUSION 15/1: MID RVSM SMR 2016

That, as part of the MIDRMA Scrutiny Group activities, the MIDRMA conduct bilateral teleconferences with the MIDRMA ATC focal points to analyze the relevant LHDs and present a consolidated report to the MIDRMA Board or the ATM SG meetings for validation in order to finalize the SMR for endorsement by MIDANPIRG.

Height Keeping Monitoring Requirements

2.10 The MIDRMA Board/15 meeting recalled the outcome of the MIDRMA Board/12 meeting (Kuwait, 17-19 December 2012) in particular to para 4.14:

"That further to the amendment of Annex 6 Part I and Part II concerning long term monitoring requirements for height keeping performance, and based on the MIDRMA Minimum Monitoring Requirements, States are required to ensure that a minimum of two aeroplanes of each aircraft type grouping of the operator have their height-keeping performance monitored, at least once every two years".

- 2.11 The MIDRMA Board/15 meeting noted that the MIDRMA has been using the two (2) years interval "validity" to reflect the status of height-keeping performance in the MID Region, which is available on the MIDRMA website. It was highlighted that the compliance with Annex 6 provisions related to height-keeping performance and associated national regulations is the prime responsibility of States.
- 2.12 The MIDRMA Board/15 meeting noted with concern that some State aircraft continue filing "W" in their flight plans while they were not RVSM approved. Accordingly, the meeting urged States to implement necessary measures for granting RVSM approvals to their State aircraft.
- 2.13 The MIDRMA Board/15 meeting noted with appreciation that the U.S.A Department of Treasury Office of Foreign Assets Control (OFAC) granted the MIDRMA, on 6 December 2015, a license allowing the use of the EGMU and the Altimetry System Error software for the monitoring of the Iranian aircraft. The MIDRMA succeeded to conduct height monitoring for 79 aircraft in Iran during the validity period of the OFAC License which expired on 31 December 2016. The License has been renewed in February 2018.
- 2.14 The MIDRMA Board/15 meeting noted with appreciation that OFAC granted the MIDRMA a waiver to use the EGMU to monitor the Sudanese aircraft. Accordingly, the meeting requested the MIDRMA to initiate the coordination with Sudan to ensure the monitoring of their aircraft in a timely manner.
- 2.15 The MIDRMA Board/15 MIDRMA thanked Iraq Civil Aviation Authority (ICAA) for their effective coordination for the monitoring missions conducted by the MIDRMA, which ensured the successful monitoring of all the Iraqi aircraft, in accordance with the MMR.
- 2.16 The meeting may wish to note that the MIDRMA managed to conduct GMU monitoring for **158** aircraft registered in the Middle East region since MIDRMA Board/14 reflecting a decrease in the percentage of the monitored aircraft registered in the MID Region to **86%** with known height monitoring results and **9%** less than the performance target for height monitoring set out by MIDRMA Board/12 meeting. This was due mainly to the slow response by some States to achieve their monitoring targets, the non-renewal of OFAC licence to monitor the Iranian aircraft and the RVSM approvals and monitoring constraints facing the Libyan aircraft.

2.17 Based on the foregoing, the MIDRMA Board/15 meeting agreed to the following Draft Conclusion:

DRAFT CONCLUSION 15/2: RVSM MINIMUM MONITORING REQUIREMENTS
AND CONDITIONS

That, the MIDRMA Member States be urged to:

- a) take necessary measures to ensure their aircraft operators fully comply with ICAO Annex 6 provisions related to long-term height monitoring requirements, based on the MMR Tables;
- b) comply with the MID RVSM MMR Conditions published in the MIDRMA website; and
- c) withdraw the RVSM Approvals of aircraft not complying with the State MMR before 1 September 2018.
- 2.18 The meeting agreed that a procedure should be developed and presented to the ATM SG/4 meeting related to the follow-up with the States and the issuance of warning related to RVSM approved aircraft without valid height-keeping performance monitoring results.

Assessment of Non-RVSM Approved Aircraft operating in the MID Region

- 2.19 The MIDRMA Board/15 meeting noted that the MIDRMA has been carrying out periodic checks of the approval status of operators and aircraft using the MID RVSM airspace.
- 2.20 The data is compared against the collective approvals database as received from all RMAs on a monthly basis which is always updated to reflect the valid RVSM approvals only. Any of these operations for which an RVSM approval was not found will be separated on a list for further examination and verification.
- 2.21 The verification process includes cross-checks with late update of RVSM approvals by RMAs, typo mistakes in the traffic data, code-sharing and lease arrangements between airline operators which will keep aircraft as RVSM approved duplicated in two countries at the sometime.
- 2.22 Once the verification process is completed and there is assurance that the finding is valid, the concerned State Airworthiness Authority will be contacted for clarification of the discrepancy and requested to reply with their findings and corrective action taken to resolve the issue.
- 2.23 Experience has shown that the primary systematic reason for failure to match operations and approvals is the delay in State notification of the approval status of some operators to the appropriate RMA. Thus, the importance of timely notification by States of operator approval status to RMAs is emphasized by these results.
- 2.24 The MIDRMA Board/15 meeting reviewed the MIDRMA Bulletin of the Non-RVSM Approved aircraft operating within the ICAO MID Region (based on Bahrain traffic data).
- 2.25 Based on the above, the MIDRMA Board/15 meeting agreed to the following Draft Conclusion:

DRAFT CONCLUSION 15/3: MIDRMA BULLETIN OF NON-RVSM APPROVED AIRCRAFT

That,

- a) the MIDRMA post on the MIDRMA website and share with the MIDRMA Board Members and focal points the Bulletin of non-RVSM approved aircraft on monthly basis; and
- b) States be encouraged to:
 - i. develop a mechanism to identify the non-RVSM approved aircraft operating in the RVSM Airspace without compliance with Annex 6 provisions;
 - ii. submit their RVSM traffic data including aircraft registrations to be used for the RVSM risk analysis; and
 - iii. coordinate with the MIDRMA in case they are able to provide their RVSM traffic data on a monthly basis.
- 2.26 The MIDRMA Board/15 meeting noted with appreciation that Jordan would provide the MIDRMA with the traffic data on monthly basis.

MID RVSM Safety Monitoring Report (SMR) Cycle

2.27 The MIDRMA Board/15 meeting recalled that the SMRs have been issued once for every MIDANPIRG cycle (18 months). The SMRs should be reviewed by a Technical MIDANPIRG Subsidiary Group before presentation to MIDANPIRG for endorsement. Taking into consideration the continuous traffic growth and the changes of the airspace structures in the Region, the meeting agreed to change the duration of the SMR to be issued once every year. Accordingly, the meeting agreed to following Draft Conclusion:

DRAFT CONCLUSION 15/4: MID RVSM SAFETY MONITORING REPORT CYCLE

That, starting from 2018, the MID RVSM Safety Monitoring Report should be issued on annual basis (12 months) to facilitate tracking the risk trend of RVSM implementation in the MID Region.

Development of the MID RVSM Safety Monitoring Report (SMR) 2018

- 2.28 The MIDRMA Board/15 meeting agreed that for the development of the MID RVSM SMR 2018, the Flight Plan/Traffic Data will be collected for the period $\underline{1-31 \text{ August 2018}}$.
- 2.29 It was reiterated that the required data must be submitted in the right format and in the formulated excel sheet designed for this purpose which is the only sheet recognized by the MID Risk Analysis Software (MIDRAS). Any data received in a different format, or in an excel sheet different from the one available on the MIDRMA website (www.midrma.com) will not be acceptable.
- 2.30 Based on the above, the MIDRMA Board/15 meeting agreed to the following Draft Conclusion:

DRAFT CONCLUSION 15/6: MID RVSM SMR 2018

That,

a) the FPL/traffic data for the period 1 – 31 August 2018 be used for the development of the MID RVSM Safety Monitoring Report (SMR 2018);

- b) only the appropriate Flight Data form available on the MIDRMA website (www.midrma.com) should be used for the provision of FPL/traffic data to the MIDRMA; and
- c) the final version of the MID RVSM SMR 2018 be ready for presentation to and endorsement by MIDANPIRG/18 or ATM SG/5 meetings.

ADS-B Height Monitoring System (AHMS)

- 2.31 The MIDRMA Board/15 meeting was apprised of the advantages and the challenges related to the use of ADS-B for height-keeping performance monitoring.
- 2.32 The MIDRMA Board/15 meeting supported in principle the concept related to the use of ADS-B for height-keeping performance monitoring in the MID Region. However, the meeting requested the MIDRMA to conduct further studies and analysis and present them along with a draft roadmap to the MIDRMA Board/16 for appropriate action. The meeting agreed the technical issues related to ADS-B implementation should be addressed by the CNS SG.
- 2.33 The MIDRMA Board/15 meeting encouraged States, that have already implemented ADS-B, to share their ADS-B data for height monitoring purposes, which would foster the testing process.

3. ACTION BY THE MEETING

3.1 The meeting is invited to review and support the Draft Conclusions emanating from the MIDRMA Board/15 meeting.