



الهيئة العامة للطيران المدني
GENERAL CIVIL AVIATION AUTHORITY



SUMMARY OF DISCUSSION COLLECTIVELY DESIGNING THE FUTURE OF ATM POST COVID-19 WEBINAR

(15-16 JUNE 2020, 07:00 - 09:00 UTC)

1. INTRODUCTION

1.1 The Collectively designing the future of ATM Post COVID-19 Webinar was successfully held on 15-16 June 2020 from 07:00 to 09:00 UTC on both days using MS Teams Live Event Application. The Webinar was organized jointly by the General Civil Aviation Authority (GCAA) of UAE and ICAO MID Regional Office.

1.2 The objectives of the Webinar were to share knowledge and experiences amongst webinar participants about pandemic contingency planning & management in the civil aviation industry and to understand the challenges and concerns that the different industry members are having. The revised plans and strategies the industry is undertaking was addressed. The webinar further discussed collectively areas of common interest and priorities. Also, it proposed recommendations to the concerned industry members.

1.3 The Webinar recorded more than 862 participants from 144 organizations which comprised of Civil Aviation Authorities, ANSPs, ATM suppliers, Airlines, Travel agencies, universities and more from around the world.

The Webinar's detailed program is in **Attachment A**. Materials including, Presentations and the Summary of Discussion are available at the link <https://www.icao.int/MID/Pages/2020/ATM-Webinar.aspx>. The webinar recording is available at <https://www.icao.tv/covid-19-webinar-series/videos/webinar-gcaa-live-collectively-designing-the-future-of-atm-post-covid-19-day-1> and Webinar Day2 at <https://www.icao.tv/covid-19-webinar-series/videos/webinar-gcaa-live-collectively-designing-the-future-of-atm-post-covid19-day-2>

2. OPENING

2.1 H.E Saif Al-Suwaidi, the Director General of the UAE GCAA, welcomed all participants and thanked them for participation in the Webinar. He highlighted that the webinar will provide quality information, valuable advice and support to participants to provide contribution to the aviation industry at such a challenging time.

2.2 Mr. Al-Suwaidi stated that the webinar was an open and extended platform of knowledge and experience sharing in an atmosphere of transparency and good will. He further indicated that the webinar came at a perfect time as positive indications about air transport system restart have been observed after a shocking and painful pandemic.

2.3 He also invited the aviation industry to work collectively in harmony towards focused priorities, unified strategies and tireless efforts to enable the industry to shine again.

2.4 At the end, Mr. Al-Suwaidi thanked the moderators, panelists and participants and wished them a fruitful discussions and successful webinar.

3. DISCUSSIONS

First Session: The Strength of 3Cs- Cooperation, Collaboration and Communication

3.1 The panel presented the impact of the COVID-19 pandemic on Aviation industry; travel and tourism, passengers, traffic and economics as well as the estimated impact for 2020. The panel further presented the impact on International and Regional organizations' priorities and activities.

3.2 The panel underlined the role of effective communication during this crisis to support members in planning, implementation and responding to crisis. In this regard, it was noted that several platforms have been developed to communicate information to the aviation industry in a timely manner such as ICAOMID COVID-19 webpage, ICAO COVID-19 webpage, MID RPTF platform, ACAO webpage, CANSO guidance materials, etc. Furthermore, the panel encouraged the aviation industry to share their challenges and best practices.

3.3 The panel agreed that organizations should join efforts for a smooth and harmonized restart of operations in a safe, secured and sustainable manner. It was highlighted that inter-organizational collaboration is crucial to avoid duplication of efforts, obviate fragmented measures post COVID-19 and support the aviation industry's restart and recovery.

3.4 The panel highlighted that some airlines started to pick up and that the 3Cs between all stakeholders and supply chain players are essential to ensure a smooth restart.

3.5 It was noted that the International and regional organizations in the MID Region (AACO, ACAO, CANSO, IATA, ICAO, States and airlines) took the initiative to establish the high level MID Taskforce, Recovery plan taskforce (RPTF). The RPTF focuses on post COVID-19 crisis recovery and ensure regional implementation of global guidelines.

3.6 The panel underlined the necessity to foster the 3Cs among the industry to assist dealing with the following challenges:

- lack of aeronautical information;
- the need to ensure that the network remains available, emergencies and route alternatives;
- overflight approvals;
- crew restrictions;
- skilled staff availability;
- ATM infrastructure;
- Radio Navigation flight inspection; and
- safety risk management.

3.7 The Report of the council aviation recovery task force (CART) and its take off documents were presented as a success model of the aviation industry's 3Cs. Wide collaboration with States and international and regional organizations have taken place to develop CART recommendation and guidance.

3.8 In the same vein, it was highlighted that ICAO's top priority is to support States in implementing CART recommendations and guidance in a harmonized manner. In this respect, it was highlighted that, the ICAO is developing the 'Global Implementation Roadmap' which will be complemented by Regional Implementation Roadmaps, presenting the activities, mechanisms and tools put in place by ICAO to support, coordinate and monitor States' implementation of the

recommendations and guidance issued by the CART. The ICAO's activities, including implementation support, coordination and monitoring activities, will continue to be performed in partnership with all stakeholders.

3.9 It was highlighted that COVID-19 pandemic is an unprecedented crisis, and that the aviation community should work collaboratively to build a robust, sustainable, safe and secure aviation system. The panel emphasized that clear communication, international obligations, lessons learned and high-level commitments are the pillars to build resilient aviation.

3.10 The panel encouraged ANSPs to take advantage of the time of low traffic density to undertake various infrastructure maintenance.

3.11 The panel recommended that States include ANSPs in their COVID-19 plans. It was highlighted that the decline in traffic amid COVID-19 caused a huge decline in ANSPs' revenue, the panel urged the aviation industry to show solidarity.

3.12 The panel emphasized that to ensure ANSPs' efficient and safe operation resumption, ANSPs should implement collaborative decision making (CDM). Collaboration and cooperation with adjacent ANSPs is crucial.

Second Session: United to Prevail amid COVID-19: A Cohesive outlook

3.13 The panel discussed different actions that were taken amid COVID-19 pandemic. The deployed actions include, inter-alia:

- reviewing contingency plans on a regular basis;
- resource optimization;
- raising awareness;
- focusing on repatriation flights to minimize impact on the supply chain;
- expanding cargo capacity by granting airline exemptions to carry cargo on passenger compartment;
- strengthening coordination with neighboring ANSPs;
- maintaining ATCOs proficiency by using simulators to manage complex ATS scenarios;
- enhancing some ATS routes on a temporary basis between Oman and UAE;
- ensuring that staff is ready to perform once operations restart;
- forming different committees dealing with different crisis management aspects;
- defining different scenarios/actions to manage the crisis based on the safety risk management methodology.

3.14 The panel advised ANSPs to take advantage of this low traffic period to prepare for the future users' demands. The panel discussed the UAE initiative of refining ANS strategy to optimize resources/costs and enhance existing procedure and strategies.

3.15 In connection with the above, the panel stressed that the safety of staff, crew and customers was the top priority amid the crisis. Moreover, the panel underlined that the main objectives were to minimize disease outbreak through air transport and ensure business continuity.

3.16 The panel discussed different views on measures that should be implemented post COVID-19 era and how to apply the experience gained and lessons learned.

3.17 The panel recommended reviewing regulations to consider economic/operational challenges during such a crisis.

3.18 The panel highlighted the need for Regional ATFM to optimize the network in the Middle East Region.

3.19 The panel reiterated the necessity to collaborate and coordinate at national and regional levels and forming cross-sector platforms. Industry experts should work together to refine existing strategies for the way forward, and to find the most expeditious, efficient and cost effective solutions to take the industry to a new era.

3.20 The panel further underlined the need to create a new version of collaboration; and initiate homogenous projects (joint projects) for cost optimization in consultation with users, using existing ATM systems instead of newly customized ones to reduce costs.

3.21 The panel underlined that technology and human capital are the key investments for the future, technology has enabled aviation industry to maintain effective communication and collaboration amid the crisis. ANSPs should explore the feasibility of new technologies deployment such as remote tower.

Third Session: MID Region Aviation Restart and Recovery

3.22 The panel objective was to discuss how to reduce the spread of COVID-19 by air transport and to protect the health of air travellers and aviation personnel while maintaining essential air transport operations and ensuring an orderly return to normal operations in due course.

3.23 It was highlighted that ICAO MID in coordination with the international and regional organizations established the MID Region Recovery Plan Task Force (RPTF). The objectives of the RPTF are to:

- become a single Regional source of information, Guidance materials and best practices to States and stakeholders;
- support the response to crisis, restart and recovery in the Region & encourage harmonization; and
- support cross-border restart and recovery.

3.24 The panel presented the RPTF composition, main mandate and working arrangement. The RPTF consists of four technical work streams:

- Stream 1: Public Health Requirements/measures and Airport infrastructure
- Stream 2: Operational Safety Measures
- Stream 3: Security and Facilitation
- Stream 4: Air Traffic Management

The panel presented the main key activities and expected deliverables of each stream and how they could contribute to the restart of the aviation industry in the region.

3.25 The panel presented the focus areas of the ANS work stream as follow:

- ATM
 - Operational flexibility, Regional ATFM measures alleviation
 - Route Network operational improvement flight & Fuel efficiency
- Aeronautical information Management;
- ANS Business continuity and recovery;
- Regional Network operations capability; and
- Overflight permissions

3.26 The panel reiterated the need for aviation industry's 3Cs. Furthermore, the panel shared the lessons learned from the COVID-19 Pandemic:

- Importance of staff training
- Role of technology and further investment
- The necessity of collaboration

3.27 The panel presented UAE's experience in 4Rs "React-Restart- Recover-Resilience" and Steps taken towards aviation resumptions. It was noted that UAE measures are in line with the CART, WHO and IATA recommendations.

Fourth Session: Technology VS COVID-19

3.28 The last panel was focused towards Technology and its role during and after the COVID-19 Pandemic where a few the globally leading ANS Suppliers discussed various topics and provided insight into the Business and projects side of ATM during and post the COVID-19 Pandemic. The session addressed the topics below:

- Managing Worldwide ATM systems deployment and maintenance during the pandemic.
- The planning and change processes during and post COVID-19 for the recovery and resumption of projects around the world.
- Show the future path of ATM systems and identify where new areas are created and where current ones might change.
- Give a glimpse of what is being prepared for launch by the suppliers in the near future to support their Customers.

3.29 The panel started off by stating the impact of COVID-19 on the business and divided this into three phases namely Initial, Current and Future phases. In the initial phase of the pandemic the suppliers stated that the safety of their personnel and security of their assets took first priority. The challenges during that phase were mainly revolving towards access to their facilities and effects on the supply chain. While during the current and future phases the challenges were more on the products and investment priorities.

3.30 It was stated that technology allowed for many functions to resume almost immediately and some changes to activities that was previously exclusively done with the physical presence of the customers such as Factory Acceptance Tests (FAT) and Site Acceptance Tests (SAT). These were conducted successfully via remote access and virtual conferencing applications.

3.31 The panel explained how they maintain their support to safety critical systems such as ATM systems through a combination of local and remote solutions. Local solutions included physical support personnel and the use of support and maintenance training allowing the customers to conduct these activities under the supervision of the suppliers. Remote solutions utilized Remote access to the systems through secure connections.

3.32 Cyber security role was highlighted and all panelists stressed the importance of investing adequately in cyber security through the explanation of the rising threats due to various factors including:

- Increase of personnel stress levels which makes them prone to mistakes leading to cyber security vulnerabilities.
- Lack of personnel's knowledge and awareness of correct cyber security measures.
- Hackers' targeting of critical infrastructure as they are considered as high value targets.

3.33 The dominating factors of recovery planning was shared by the suppliers and it was explained how survival and business continuity came first, followed by re-prioritisation of products and services and reaching to looking for new opportunities using data analysis and think tanks.

3.34 Enhanced communication between the suppliers and their customers proved extremely valuable to the extent that initiatives are being established to keep this communication level in place through digital forums.

3.35 The panel stated that Cooperation and Collaboration is seen to be key for the near and long future investments. This was observed first hand by some suppliers that this collaboration cleared “Grey areas” that could have led to safety implications.

3.36 The Panel shared their view of the future from the technological aspect explaining how it holds many promising innovative technologies such as the revised aviation system architecture where it is seen as a single system of many interlinked systems connecting not only ANSPs but Airlines, Airports, Flight data providers, Meteorological Agencies and many more stakeholders providing the right information to the right recipients at the right time.

3.37 The panel recommended that all aviation stakeholders use the opportunity we have to correctly plan the future of civil aviation and gave an example of having Greener skies as everyone has a role to play to reduce the CO2 footprint and emissions of the aviation sector.

3.38 One of the evident changes in priorities is Capacity. The panel discussed how capacity is no longer a high priority for the time being; with robustness and cost effectiveness being of a higher priority now. The panel shared that through a Value stream analysis conducted regarding the air transport cycle, it was observed that huge resources are wasted and that costs can be reduced in some areas by as much as 90%.

3.39 The panel gave examples of the different ways they are trying to support their customers, such as:

- Uncoupling Operational Control Rooms and service delivery
- Contingency solutions
- Validation of functionality remotely
- Prioritizing remote technologies and enablers such as virtual centres, remote towers and full IP VCCS.
- Transferring the purchasing models from Capital Expenditure to Operational Expenditure
