TWENTIETH SYMPOSIUM AND EXHIBITION ON THE ICAO TRAVELLER IDENTIFICATION PROGRAMME (TRIP)

(Montréal, Canada, 4 to 6 November 2025)

PROGRAMME OUTLINE

States and the wider stakeholder community have invested significantly in seamless and contactless passenger processing for years. The importance of these efforts has grown, particularly in responding to increased traveller volumes post-pandemic. To address security risks, border control authorities, the air industry and travel document issuing agencies seek more efficient and secure ways to identify and process travellers. Integrating technology in each TRIP Strategy element enhances the passenger experience.

Overall picture: The Symposium will focus on advancing Machine Readable Travel Documents (MRTD) technologies to enhance seamless traveller mobility. Emphasizing innovation and technology leverage, discussions will explore strategies to enhance electronic Machine Readable Travel Document (eMRTD) solutions for contactless travel processes. Key digital solutions, including ICAO Digital Travel Credentials (DTC) and the use of interoperable 2D barcodes following the ICAO Datastructure for Barcode (IDB), including for Digital Travel Authorizations (DTA) will be highlighted. The Symposium will be a platform for ICAO to share the anonymized results of recent interoperability tests for the new required method of encoding and decoding the facial image stored on eMRTDs, as conducted by ISO SC17/WG3. Overall, the Symposium aims to improve border management, travel facilitation and security, with a specific focus on travel document and identity management, crucial for international travellers, including migrants and refugees crossing borders. Subsequent sessions will delve into topics related to the five TRIP elements, as follows:

- a) Evidence of identity. Establishing and verifying an identity to a high degree of confidence is complex: each context is different, and all authorities need to balance the risk of identity fraud against the provision of efficient services to genuine citizens and low-risk travellers. States should apply an Evidence of Identity (EOI) approach to designing robust and secure processes that consider the full range of data, documents and information available, covering both the foundational ('legal') and physical identity of the individual. Both technology and generational changes are likely to have an impact on how legal identity could be packaged and shared in the future. Smartphones are able to verify physical identity using biometrics stored in passport issuing and central civil registry eco systems. Automation allows for credible evidence of identity involving the tracing and verification of identity against breeder documents to ensure the authenticity of identity;
- b) Machine Readable Travel Documents (MRTDs). ICAO has designed the Digital Travel Credential as a secure and globally interoperable digital companion and/or substitution to a physical eMRTD, designed to support seamless travel. The ICAO DTC is based on the existing eMRTD concept consisting of a Virtual Component (VC) and a Physical Component (PC), maintaining a cryptographic link to the issuing authority. The DTC needs to conform with ICAO technical specifications and has been standardized to enables immigration officers to quickly and efficiently control travellers and take appropriate measures against individuals who pose a threat.

In that regard, ICAO has decided to enhance the Doc 9303 specifications to encode the facial image contained on the chips of eMRTDs to allow for larger portrait images or more meta data including quality and security information. This upgrade requires States to migrate the biometrics application profile for encoding facial images in eMRTDs to ISO/IEC Standard 39794-5 by 1 January 2030 at the latest. To maintain global interoperability, ICAO Annex 9 has placed an obligation on all States to update their border control systems to read (or decode) both the current and new facial image encoding specification from 1 January 2026 onwards. Between 2026 and 2029, States issuing eMRTDs can use both the current and new facial image encoding as specified in Doc 9303. During this four-year transition period, interoperability and conformity testing will be essential. The ISO Interoperability Testing Event (6 and 7 November 2025) to be held at ICAO Headquarters is designed for both eMRTD issuers and border control agencies.

- c) **Document issuance and control**. The modernization of issuance processes is central to digital transformation. This session will discuss best practices in digital issuance workflows, secure credential delivery, and lifecycle management of both physical and digital documents. Particular focus will be on secure issuance of DTCs, mobile IDs, and non-physical visas or authorizations to travel (DTA, ETA, etc.) as well as backend systems that ensure integrity, accountability, and resilience. Going digital can enable better customer service but needs to be correctly implemented to address security gaps. Issuing authorities are moving towards centralized document issuance supported by modernized systems, with an aim to better utilize the technologies that are available, including biometric capture, identification and verification to better manage the flow and tracking of the authorized holders, while preventing theft, tampering and loss;
- d) Inspection systems and tools. Inspection systems and tools for the efficient and secure reading and verification of MRTDs and eMRTDs, including use of the ICAO Public Key Directory (PKD) is critical, especially in terms of validating the authenticity of eMRTD data. Pre-travel registration and authorization systems, DTC Virtual Components and biometrics can simplify international travel as they allow for States, on a risk-based approach, to eliminate the need to inspect physical passports. Border control authorities are strongly encouraged to conduct Passive Authentication (PA) on all types of eMRTDs, especially as they increasingly implement Automated Border Control (ABC) gates and self-service kiosks; and
- e) **Interoperable applications**. Combining ePassport data (also in a DTC Virtual Component form), facial recognition, public key certificates from PKD and the use of ABCs opens the possibility of automating partially or fully the passenger identification process through the traveller's journey. This is made possible thanks to globally interoperable applications and protocols that provide for timely, secure and reliable linkage of MRTDs and their holders to available and relevant data during inspection operations. There will be a special focus on Advance Passenger Information (API) and Passenger Name Record (PNR) data.