

#### **DANGEROUS GOODS PANEL (DGP)**

#### TWENTY-SEVENTH MEETING

Montréal, 16 to 20 September 2019

**Agenda Item 10: Other business** 

#### UPDATE ON FLIGHT AND FLOW INFORMATION FOR A COOPERATIVE ENVIRONMENT (FF-ICE)

(Presented by the Secretary of the Air Traffic Management Requirements and Performance Panel (ATMRPP))



# Update on Flight and Flow Information for a Cooperative Environment (FF-ICE)

Presented to Dangerous Goods Panel (DGP) On 12 September 2019



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#### Content

- Recap of previous discussions
- Recent developments
- Next steps



### Why FF-ICE?

Address limitations and constraints of the current flight planning mechanism





Enable transitioning to an environment where a flight trajectory is constantly optimized during all phases of a flight



### Why FF-ICE?



- Information content (additional information)
- ➤ Interactions between stakeholders (more coordination/negotiation)
- Mechanism to exchange information (IP-based, using exchange models, SWIM)



#### How to roll out?

- ➤ Primarily focus on interactions prior to departure (FF-ICE/R1), but allow for successive increments to address the evolution of FF-ICE
- ➤Introduce FF-ICE implementation on a voluntary basis, but in a standardized manner and accommodate the co-existence of FPL2012 and FF-ICE
- ➤ Sunset FPL2012 when sufficient experience is gained and all necessary tools for deployment of full FF-ICE in place



· Guidance for FIXM implementation for FF-ICE

General FIXM business rules
 FIXM XML Samples

### **ICAO Provisions**

- Continuous Improvement of draft provisions and guidance
  - Tabletop exercises
  - Local or regional validations
  - Inter-panel coordination
  - Coordination with FIXM CCB

Annex 2 PANS-AIM Definition of terms and contents of AIP ENR 1.0 flight planning Amendment Air traffic flow management of FF-ICE message Flight plan form PANS-ATM CE message exchange Submission of a flight plan Use of GUIFI Communication requirement flight data exchange models plementation considerations (ATFM, Doc 9965 Volume twork/Technology, Transition, Publication) Submission, update and cancellation of flight plan (Implementation Guida Information exchange (Arrival, Departure, Request, Route and Trajectory) Translation between FPL2012 and FF-ICE Procedure Diagrams & Scenarios Flight exchange model and data conventions Concept of Operation Doc 9965 Volume I (Concept) during the entire phases of a flight · Requirements on FIXM core/extensions usages

FIXM Implementation Guidance



#### **DG** Information

- > DGP-WG/16 in 2016 and RFF-WG/14 in 2017
  - Briefed on the work of ATMRPP related to FF-ICE, specifically on the need for additional information related to dangerous goods
  - Both DGP-WG and RFF-WG confirmed that any requirements for dangerous goods information in the flight plan should be limited to the content of NOTOC in accordance with Doc 9284



### **DG** Information

#### > FF-ICE Implementation Guidance (v0.93, 2019)

#### 12.3 DANGEROUS GOODS

- 12.3.1 The FF-ICE flight plan includes the possibility for the operator to provide additional detail concerning the carriage of dangerous goods. The information that can be provided is the same information that is required to be provided to the pilot-in-command via the NOTOC form, as described in B-2.8.
- 12.3.2 The information is intended to be used by the appropriate services in case of need, providing quick reference to the relevant information.
- 12.3.3 It is anticipated that the dangerous goods information will sometimes be provided as a late update to the filed flight plan given that the final manifest is often known at short notice.



### **ATMRPP On-going Discussion**

- How to accommodate additional information needs?
- Will FPL2012 be sun-setting eventually, if so when?





#### **Additional Information Needs**



From all ICAO expert groups

Operational need & Urgency of use

Which Means (FPL2012 and/or FF-ICE)



### **Considerations for Sun-setting FPL2012**

- 1. FF-ICE availability
- 2. Incremental implementation of FF-ICE services
- 3. SWIM availability and interoperability



### **Approaches to Sunsetting FPL2012**



Global

Regional

Local/national





# **Next Steps**

#### **>** By Q1 2020

- Finalize proposed amendment to Annexes and PANS
- Finalize implementation strategy

#### **>** By Q1 2022

- Continue local & regional validation and trials
- Finalize the FF-ICE Implementation guidance
- Finalize FF-ICE implementation strategy



