

SAFE SKIES.
SUSTAINABLE
FUTURE.



ICAO APAC/MID ATFM-FF-ICE Seminar 2025 Dubai, UAE, 23 – 26 February 2025

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EUROCONTROL NM Implementation of FF-ICE and Lessons learned



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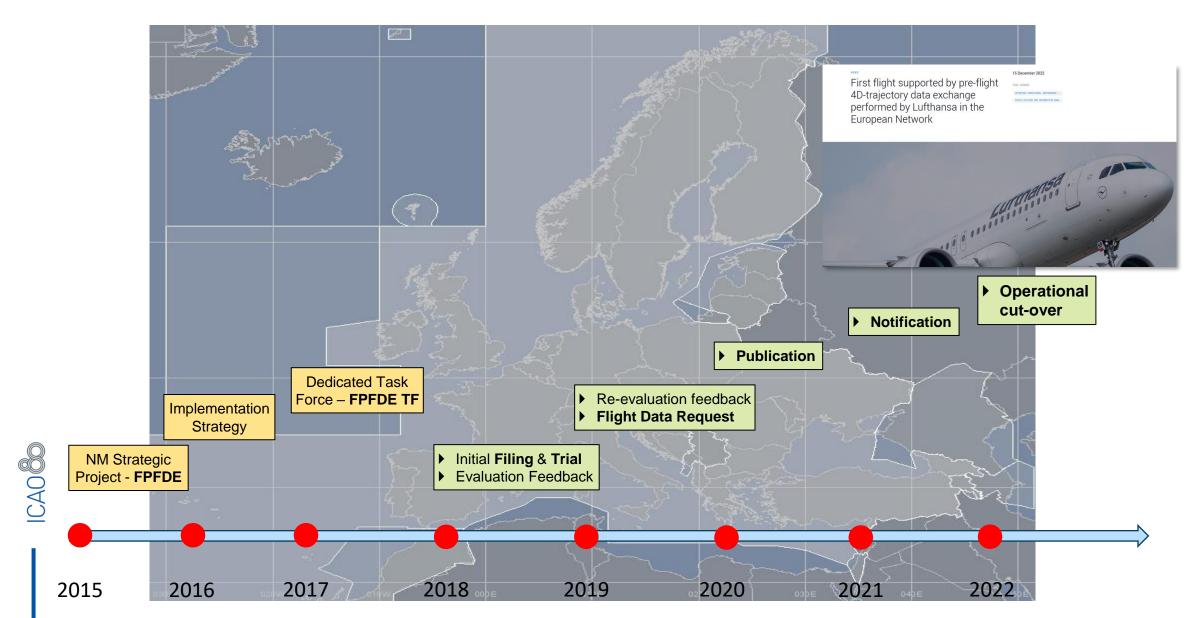
European NM implementation

2

Challenges and lessons learned

Mixed mode and transition operations

European Network Manager Implementation



Regulatory framework

Developed and consulted by all stakeholders

2014-2021



COMMON PROJECT ONE REG. (EU) N.116/2021



of XXX

on the establishment of the Common Project One supporting the implementation of the European Air Traffic Manage ment Master Han provided for in Regulation (EC) No. 6590,2004 of the European Parthament and of the Council, amending Commission Implementing Regulation (EL) No. 699,2013 and espaining Commission Implementing Regulation (EU) No. 699,2013 on 10-2014

(Text with EEA relevance)

THE EUROPEAN COMMISSION,

COMMISSION IMPLEMENTING REGULATION (EU) .../...

THE EUROPEAN COMMISSION,

Having regard to the Treaty on the Functioning of the European Union,

Having regard to Regulation (EC) No 550/2004 of the European Parliament and of the Council of 10 March 2004 on the provision of air navigation services in the single European sky (the service provision Regulation)¹, and in particular Article 15 a thereof.

(1) The Single European Sky ("SES) aims at modernising the European air traffic management ("ATM") by improving its safety and efficiency. It contributes to the reduction of greenhouse gas emissions. The Single European Sky Air Traffic Management Research and Development ("SESAR") project constitutes the technological pillar of the SES.

- Modernisation should be steered to achieving the European ATM Master plan's visit of a digital European sky.
- Effective ATM modernisation requires the timely implementation of innovative ATM modernisations from the based on technologies that increase the levels of automation, cyber-secure data sharing, and connectivity in ATM. Those technologies should also increase the levels of virtualisation of the European ATM infrastructure and aur traffic service provision in all types of airgace.
 Commission Implementing Regulation (EU) No 409/2013² establishes a framework.
- for SESAR deployment setting out the requirements for the content of commo projects, for their setup, adoption, implementation and monitoring.

 (5) Common projects should only include ATM functionalities that are ready for implementation, that require procheogical implementation and that contribute the contribute of the contribute of
- implementation, that require synchronised implementation and that contribute significantly to achieving Union-wide performance targets.
- (6) Common projects are implemented through projects coordinated by the deploy manager in accordance with the deployment programme.

2021-2027

SESAR DEPLOYMENT **PROGRAMME** SESAR **SESAR Deployment Programme** 2021 Delivering ATM modernisation in Europe togethe

Workplan for CP1 Deployment

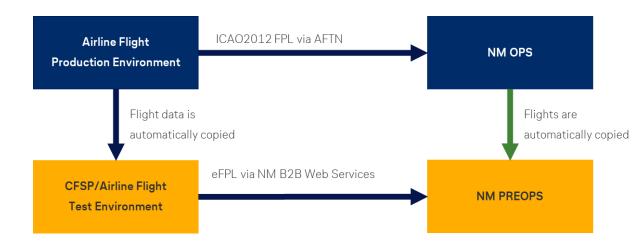
Framework for SESAR Deployment





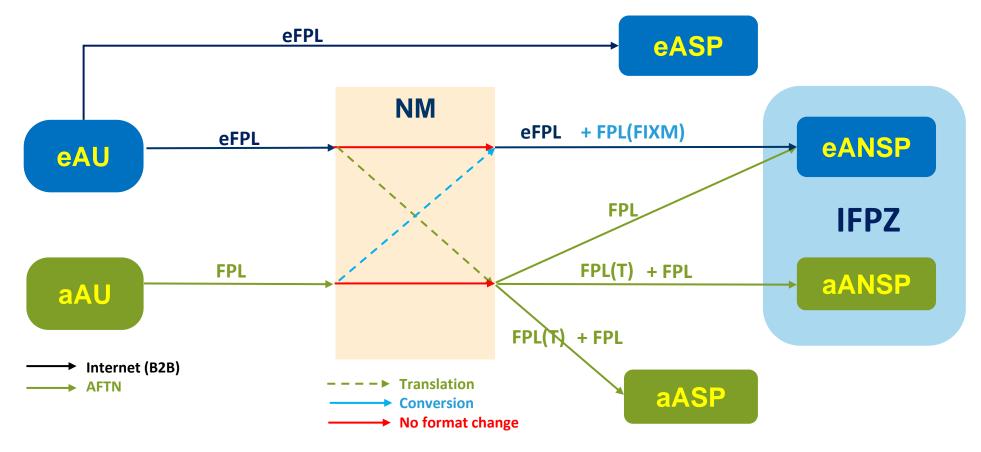
Challenges and lessons learned

- Attract main players
- Education through discussions
 - Guided by use cases and scenarios
- Address identified concerns
 - Promote collaboration for solution finding
- Implement test & development platform (mirroring OPS)
- Transition measures and mixed mode operations
 - NM to support until FPL2012 sunset date



ICAO

Mixed mode and Transition operations



- NM implemented FF-ICE while supporting FPL2012 over AFTN/AMHS
 - Translation of FF-ICE FPLs to FPLs and distribution via AFTN/AMHS to non-migrated ANSPs
 - Allows to decouple the migration of the AUs from the migration of ANSPs
 - Predictability improvements already expected by the AUs migration
 - Allows for a smooth and progressive migration of all actors

ICA0

Mixed Mode (1)

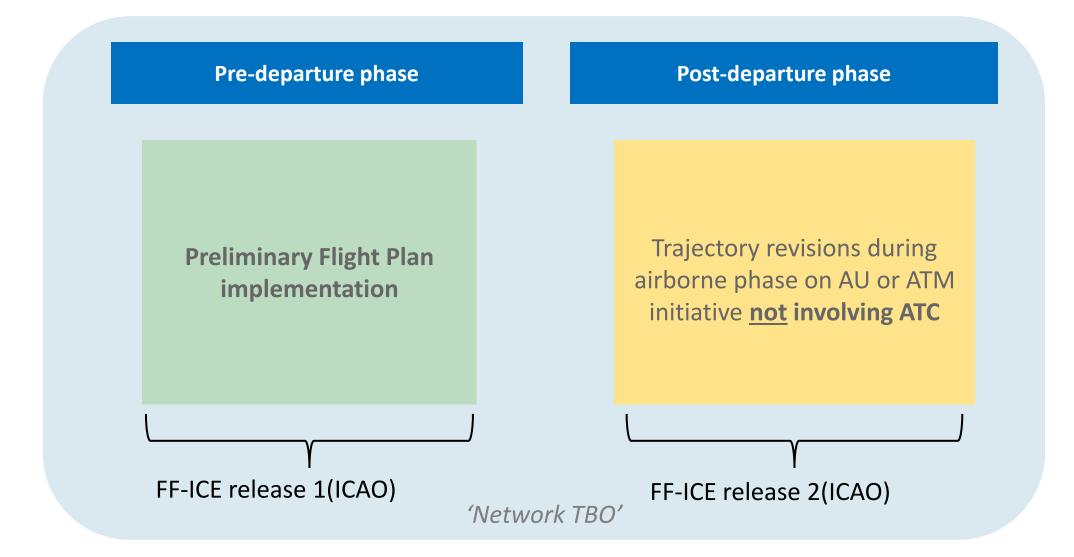
Input message type	ICAO 2012 flight plan	FF-ICE flight plan
FPL	- No change	- Reject FPL
CHG	 No change (- Process message; Integrate into existing FPL data) 	Process messageIntegrate into existing eFPL data
DLA	 No change (- Process message; Integrate into existing FPL data) 	Process messageIntegrate into existing eFPL
CNL	- No change (Cancel flight plan)	- Cancel flight plan

Mixed Mode (2)

Input message type	ICAO 2012 flight plan	FF-ICE flight plan
eFPL	 Process, even if from different originator Update FPD with eFPL data, including GUFI The resultant FPD becomes eFPL (FF-ICE) 	- Reject eFPL
eFPL Update	 Process Update FPD with eFPL data, including GUFI The resultant FPD becomes eFPL (FF-ICE) 	Processupdate eFPL data
eFPL Cancel	- Cancel flight plan	- Cancel flight plan



Future Developments



Documentation

- The IFPS Users Manual (<u>https://www.eurocontrol.int/publication/ifps-users-manual</u>)
- NM B2B Reference Manual (<u>https://ost.eurocontrol.int/sites/B2BWS/default.aspx</u>)
- FPFDE NFPM Implementation Guidelines (<u>https://www.eurocontrol.int/publication/fpfde-nfpm-implementation-guid</u>
- Implementation Strategy for FPFDE NFPM (https://www.eurocontrol.int/publication/implementation-strategy-fpfde-nfpm)





Thank You

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South American

(SAM) Office

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