

SESAR		Achieved							ECAC	
AOM20		Implement ATS Route Network (ARN) - Version 7								
REG	ASP	MIL	APO	USE	INT	IND	NM	MET	AIS	USP

Subject matter and scope

Implement ATS Route Network Version 7 (ARN V7) as a response to the Airspace Action Plan and the 2015 Airspace Concept and Strategy for the ECAC States.

Develop, validate and implement ARN V7 in accordance with Advanced Airspace Scheme (AAS) principles taking into account military requirements.

The objective will ensure the progressive deployment of the AAS route network and consolidate into a network approach the first FAB developments, Free Route Airspace (FRA) implementation, and Terminal Airspace System (TAS) developments.

The progressive implementation of ARN V7 will ensure the delivery of the airspace structure elements of SESAR Deployment Baseline.

Applicability Area(s) & Timescale(s)

Applicability Area					
Timescales:		From:	By:	Applicable to:	
Initial operational capability		01/05/2011		Applicability Area	
Full operational capability			31/10/2013	Applicability Area	

References

European ATM Master Plan

Ol step -	[AOM-0205]-Modular Temporary Airspace Structures and Reserved Areas									
	Enablers -	AAMS-08 AOM19.5	NIMS-14a	PRO-009	PRO-082	PRO-185				
Ol step -	[AOM-0401]-Multiple Route Options & Airspace Organisation Scenarios									
	Enablers -	None								
Ol step -	[AOM-0402]-Further Improvements to Route Network and Airspace incl. Cross-Border Sectorisation and Further Routing Options									
	Enablers -	None								
Ol step -	[AOM-0504]-Optimum Trajectories in Defined Airspaces at Particular Times									
	Enablers -	PRO-241								
Ol step -	[AOM-0801]-Flexible Sectorisation Management									
	Enablers -	NIMS-10	PRO-026							
Ol step -	[AOM-0802]-Modular Sectorisation Adapted to Variations in Traffic Flows									
	Enablers -	NIMS-10	PRO-016	PRO-191						

Legend:	WXYZ-001	Covered by SLoA(s) in this objective	WXYZ-002 zzz	Covered by SLoA(s) in another objective Objective covering the enabler	WXYZ-003	Not covered in the Implementation Plan
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Applicable legislation

-none-

Essential Operational Changes

- none -

SESAR Solution

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ICAO GANP - ASBUs

- none -	
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Deployment Programme

- none -	
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European Plan for Aviation Safety

- none -	
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Operating Environments

En-Route Network

Stakeholder Lines of Action (SLoAs)

SLoA ref.	Title	From	By	
AOM20-ASP01	Implement national airspace structure changes	01/05/2011	31/10/2013	
AOM20-ASP02	Ensure compatibility of en-route and terminal airspace	01/05/2011	31/10/2013	M
AOM20-USE01	Adapt flight planning	01/05/2011	31/10/2013	M
AOM20-INT01	Amend ICAO EUR Regional Plan	FINALISED		M
AOM20-AGY01	Adapt Flight Planning and ATFCM systems, processes and procedures	01/05/2010	31/10/2012	

Description of finalised and deleted SLoAs is available on the eATM Portal @ https://www.eatmportal.eu/working/depl/essip_objectives

Expected Performance Benefits

Safety:	Some enhancement through reduction in controller workload.
Capacity:	Increased through reduction in conflict points, and specialization of routes and sectors to enhance productivity and reduce controller workload.
Operational Efficiency:	-
Cost Efficiency:	Savings in route distances in some States as well as better fuel efficiency through increased use of preferred flight profiles and improved sectorisation.
Environment:	Reductions in emissions through use of more optimal routes.
Security:	N/A

Detailed SLoA Descriptions

AOM20-ASP01	Implement national airspace structure changes	From: 01/05/2011	By: 31/10/2013
Action by:	ANS Providers		
Description & purpose:	Implement airspace structure modifications and necessary sector changes, in accordance with ARN V7. Amend supporting systems, amend and publish route changes in accordance with Aeronautical Information Regulation and Control (AIRAC) requirements, and train staff in new route/sector configurations.		
Supporting material(s):	EUROCONTROL - European ATS Route Network (ARN) Version 2013-2015 06/2013 Url : http://www.eurocontrol.int/sites/default/files/publication/files/ernip-part2-arn-v-2013-2015-07062013.pdf		
Finalisation criteria:	1 - Publication of amendments to AIP documents in accordance with ARN V7 has been done.		
AOM20-ASP02	Ensure compatibility of en-route and terminal airspace	From: 01/05/2011	By: 31/10/2013
Action by:	ANS Providers		
Description & purpose:	Ensure viability and connectivity between en-route and terminal airspace changes.		

AOM20		Implement ATS Route Network (ARN) - Version 7	
Supporting material(s):	EUROCONTROL - European ATS Route Network (ARN) Version 2013-2015 06/2013 Url : http://www.eurocontrol.int/sites/default/files/publication/files/ernip-part2-arn-v-2013-2015-07062013.pdf EUROCONTROL - European Airspace Design Methodology Guidelines - General Principles and Technical Specifications for Airspace Design - Edition 1.1 / 05/2012 Url : http://www.eurocontrol.int/articles/operations-planning EUROCONTROL - Route Availability Document (RAD) - Edition 1.1 / 05/2012 Url : http://www.eurocontrol.int/articles/operations-planning EUROCONTROL - European Route Network Improvement Plan - Framework Document - Edition 1.1 / 05/2012 Url : http://www.eurocontrol.int/articles/operations-planning		
Finalisation criteria:	1 - Publication of amendments to AIP documents in accordance with ARN V7.		
AOM20-USE01	Adapt flight planning	From: 01/05/2011	By: 31/10/2013
Action by:	Airspace Users		
Description & purpose:	Adapt flight planning procedures and systems to take account of ARN V7 airspace structure.		
Supporting material(s):	ICAO - EUR Region Plan for Implementation of Amendment 1 to the 15th edition of the PANS-ATM Document 'New FPL Contents for 2012' - Edition v1.28 / 06/2012 Url : http://www.eurocontrol.int/articles/icao-flight-planning-modifications-2012-documentation-related-links		
Finalisation criteria:	1 - Changes to airspace users' flight planning systems, procedures and to FMS have been completed.		
AOM20-INT01	Amend ICAO EUR Regional Plan	From: 01/05/2011	By: 31/03/2012
Action by:	EUROCONTROL Agency		
Description & purpose:	Gain States endorsement of route changes and co-ordinate changes to ICAO EUR Regional Plan to reflect ARN V7 airspace structures.		
Supporting material(s):	ICAO - EUR-Doc 7754 - EUR ANP, Vol II, Facilities and Services Implementation Document (FASID) - Working copy 07/2007 Url : http://www.paris.icao.int/documents_open/files.php?subcategory_id=36		
Finalisation criteria:	1 - Amendments to the ICAO Air Navigation Plan reflecting ARN V7 implementation have been published.		
AOM20-AGY01	Adapt Flight Planning and ATFCM systems, processes and procedures	From: 01/05/2010	By: 31/10/2012
Action by:	EUROCONTROL Agency		
Description & purpose:	Adapt Flight Planning and ATFCM systems, processes and procedures as necessary to ensure optimal use of the ARN V7 airspace structure, including FRA.		
Supporting material(s):	EUROCONTROL - DMEAN Concept of Operations - Edition P1 / 09/2004 Url : http://www.eurocontrol.int/dmean/public/standard_page/Concept_of_operations.html		
Finalisation criteria:	1 - NM Flight Plan Processing systems, processes and procedures have been adapted to support the various elements of ARN V7 implementation, including FRA. 2 - NM ATFCM systems, processes and procedures have been adapted to support the various elements of ARN V7 implementation, including FRA.		