



AO-0307 — Wake Turbulence separations (for arrivals) based on Dynamic Aircraft Characteristics

Optimization of the ICAO wake turbulence separation classes by use of longitudinal wake turbulence dynamic pair-wise separation (D-PWS) minima on arrivals, applicable under given operating conditions in particular given weather conditions, and of the associated supporting tools, using dynamic input data. This allows conditional reduction or suspension of separation minima for most aircraft pairs, enabling runway throughput increase compared to ICAO scheme, whilst maintaining acceptable levels of safety.

Rationale The demand is high for airport capacity and efficiency at some European airports, and in particular for increased runway throughput.
Today's ICAO separations are based on certificated Maximum Take Off Mass (MTOM) and it includes three categories (i.e. HEAVY, MEDIUM or LIGHT) allocating all aircraft into one of them. Because the separations are static, this leads to over separation in many instances resulting in a loss of runway throughput. Using knowledge gained with static pair-wise separation (S-PWS) development and using dynamic input data, further optimization is possible.

Forecast V3 end date -

Benefits start date (IOC) 31-12-2029

Full benefits date (FOC) 31-12-2033

Current Maturity Level V1

Solution Data Quality Index -

Current Maturity Phase R&D

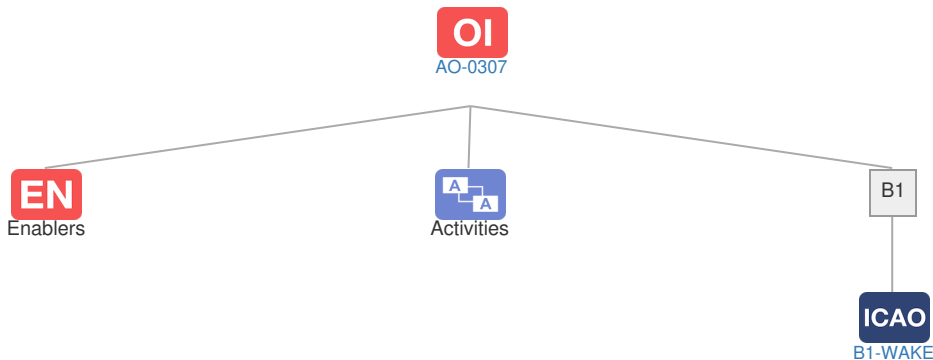
Scope -

Release -

PCP Status -

Context

Related Elements



EN Enablers

Code	Dates																										
	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	
AO-0307																											
🔒 A/C-37a		4																									
🔒 A/C-48a			FOC																								
🔒 AERODROME-ATC-16a																											
🔒 AERODROME-ATC-46																											
🔒 APP ATC 99																											
🔒 APP ATC 126																											
🔒 REG-0524																											
➔ A/C-33a																											
➔ AERODROME-ATC-60																											
➔ AIRPORT-08																											

OI Dependent OI Steps

Relationship	Code	Title	Related Elements
Has predecessor	AO-0306	Wake Turbulence Separations (for Arrivals) based on Static Aircraft Characteristics	SOL OI EN DS ICAO

SOL SESAR Solutions: No associated data

PCP PCP Elements: No associated data

OBJ Implementation Objectives: No associated data

ICAO Block Modules

Designator	Title	Related Elements
B1		
B1-WAKE	Increased Runway Throughput through Dynamic Wake Turbulence Separation	SOL OI PCP