

Thales Watchkeeper – Lessons from a review for Civil Certification of a Military RPAS

ICAO Remotely Piloted Aircraft Systems Symposium

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Thales Watchkeeper



CAA Objectives

- To understand –
 - the RPAS design and operation
 - The military certification approach

- To determine –
 - The assumptions made for the design and operation
 - How the military and civil requirements compare
 - How requirement gaps or inconsistencies could be addressed
 - If the traditional certification process requires changing
 - Potential cost implications

Methodology

- Series of meetings and discussions

THALES



Lessons (1)

- Regulations:
 - Regulation (EU) No 216/2008 of 20 February 2008
 - Commission Regulation(EU) No 748/2012 of 03/08/2012 (Part 21)
(rules for the airworthiness and environmental certification of aircraft and related products, parts and appliances, as well as for the certification of design and production organisations)
 - Commission Regulation (EU) No 1321/2014 (Part M & Part 145)
(continuing airworthiness of aircraft and aeronautical products, parts and appliances, and on the approval of organisations and personnel involved in these tasks)
 - Commission Regulation(EU) No 1178/2011
(technical requirements and administrative procedures related to civil aviation aircrew)
 - Commission Regulation(EU) No 965/2012
(technical requirements and administrative procedures related to air operations)

Lessons (2)

- Requirements:
 - Certification Specifications –
 - CS-23 – Small/Commuter Aeroplanes
 - CS-25 – Large Aeroplanes
 - CS-E – Engines
 - AMC-20 – General Acceptable Means of Compliance
- Process / Procedures
 - Certification
 - Organisation (Design – Production)
- Costs

Annex to ED Decision 2013/012/R

European Aviation Safety Agency

Certification Specifications
for
Normal, Utility, Aerobatic, and
Commuter Category
Aeroplanes

CS-23

for

Large Aeroplanes

CS-25

for

Engines

CS-E

Thank You