



Benefits of Mutual Recognition in support of the Typhoon programme

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Contents

The presentation will cover:

- Background to the requirement
- Stakeholders involved
- Methodology adopted
- Benefits gained
- Lessons identified

Background

In late 2013 - Ministers from 4-nations met and agreed that:

- Current methodology of introducing design change does not support the demands of the programme.
- Pace and volume of change remained high – increasing ‘retro’ change both to fix problems and address obsolescence.
- A structured approach to reducing the fixed cost base was needed.

2013 Approach to Certification

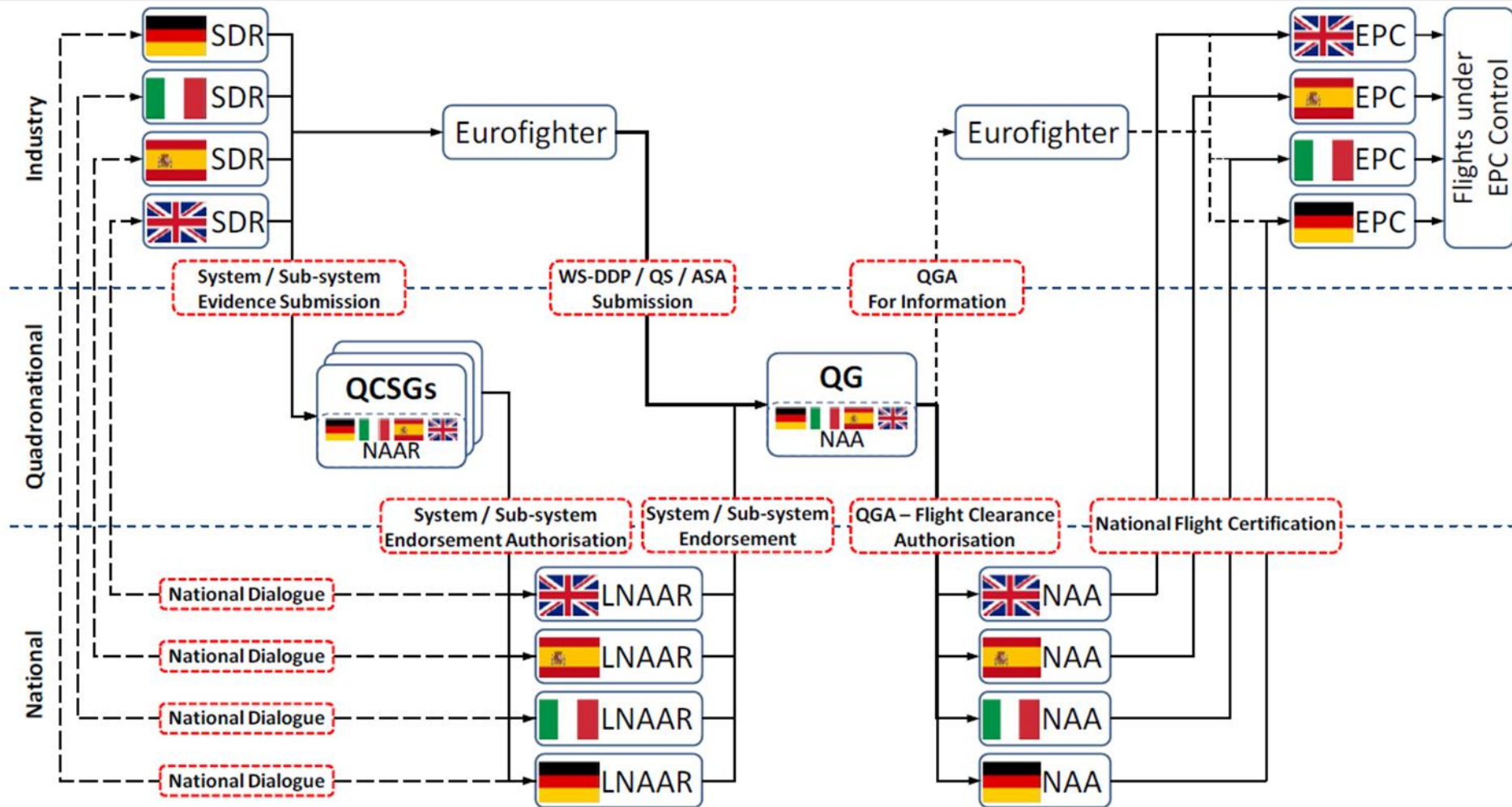


Figure 15 Certification working arrangements and process

Background

A focused Task Force was launched:

- To identify & develop key transformational proposals.
- Original NETMA proposal was to implement EMAR 21 wholesale.
- Respective TF2 members deemed this inappropriate.
- The use of privileges offered a better means to address the immediate issues.

Background

Previously accepted that use of harmonised airworthiness regulations could lead to significant benefits.

- Roadmap for European Airworthiness Harmonisation (EDA MAWA)

Recognition was seen as key to facilitate:

- Certification of major change by one nation could be accepted by other nations.
- Granting of privileges by one nation to its Industry for & develop key transformational proposals.

Background

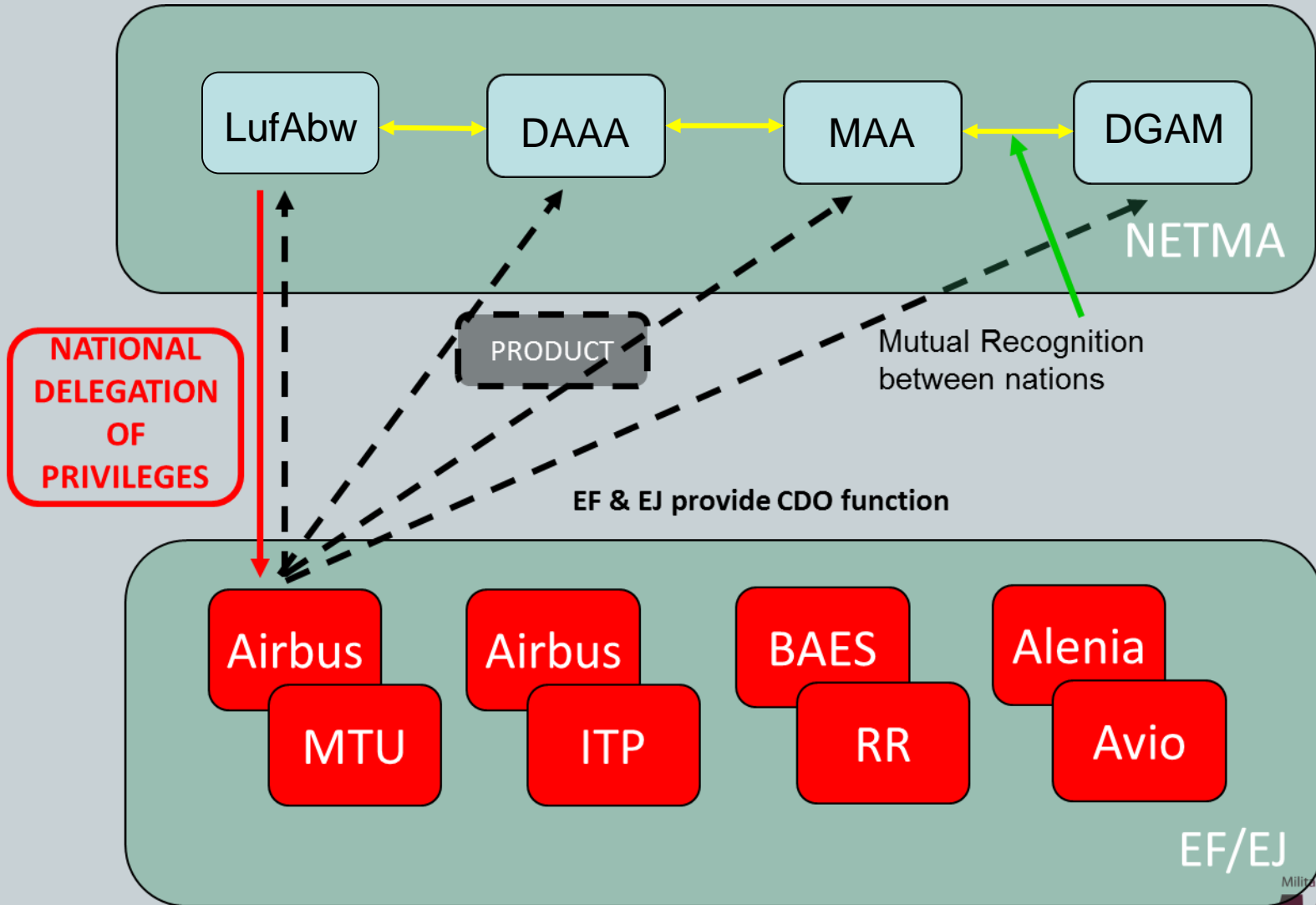
Initially, the scope of privileges was limited to:

- Classify changes to type design and repairs as ‘major’ or ‘minor’;
- Approve minor changes to type design and minor repairs.

This may seem a small step...



A Future Construct for Certification?



Regulators

Military Aviation Authority

MAA



Stakeholders




EUROJET



Process

Recognition Agreement




EUROPEAN MILITARY AIRWORTHINESS DOCUMENT

EMAD R

RECOGNITION

Edition Number	1.1
Edition Date	23 Sept 2014
Status	Approved



**MILITARY AIRWORTHINESS
AUTHORITIES FORUM**

NATO UNCLASSIFIED

Recognition Agreement between the
National Military Airworthiness
Authorities of:
Germany,
Italy,
Spain
And
United Kingdom

Edition Number : 1.1	Edition Date : 05/02/2015	Status: Final	Page 1
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Methodology

Establish the scope of the Recognition Agreement:

- Determine which Sections are applicable to the business need.

Agree the timeline:

- Build in sufficient time for allocated resources to review the documents and allow for one or more site visits.

Complete the MARQ Responses and exchange:

- Conduct self-assessment and provide sufficient information to enable an adequate assessment to be made.

Desktop review of the MARQ Responses:

- Determine if any 'Goals' have not been adequately addressed by the other nation(s).

Timeline

Initial workshops – Feb 14

Ministerial buy-in – Apr 14

Further workshops - Aug 14

Recognition Agreement - Apr 15

NMAA visits – Jul/Aug 15

Recognition Certificates – Jan 16

Comparative Recognition Partner Authority Structure, Experience and Responsibility

5.2 We, the Recognition Partners, have declared our comparative level of Authority structure, experience and scope of responsibility to each other. It has been determined that the comparative levels will need to be addressed so as not to hinder achievement of recognition. Therefore we, the Recognition Partners, commit to address the baseline differences that are included in Section 8.

Section 6 Timeline/Plan

	Action	Target Date (dd/mm/yyyy)	Details/Actionees
1	Register agreement with the Coordinating Support Function	20/02/2015	
2	Identify/agree facilitation of support from Coordinating Support Function	20/02/2015	
3	Resolve agreement differences Identified in Section 8 e.g. Level of EMAR implementation and complete appropriate EMAR Question Sets.	30/04/2015	
4	Complete MARQs (see Section 7)	30/04/2015	
5	Exchange MARQ responses	30/04/2015	All MARQ responses and supporting reference material to be provided in English.
6	Recognition Partners review each other's MARQ responses	30/06/2014	
7	Perform Audit or visit if necessary	30/08/2015	
8	Determine unmet goals	30/09/2015	
9	Resolve/Sentence/Agree unmet goals.	31/12/2015	Review Regulation Changes since MARQ exchange.
10	Issue Recognition Certificate(s)	29/01/2016	Technical Agreement ² should be available for RC signature.
11	Register Recognition Certificates with Coordinating Support Function	29/02/2016	
12	Liaise with Coordinating Support Function to incorporate this review phase into the overall review activity	31/03/2016	
13	Set plan for the realisation of potential benefits e.g. adopting joint approvals	29/01/2016	As defined in the Technical Agreement. ²
14	Date that recognition certificate validity expires	30/11/2019	
15	Commence recognition review	31/05/2019	

Table 5

² The Technical Agreement will provide detail on the practical application of the Mutual Recognition agreement within the EF2000 Typhoon Weapon System programme. Responsibilities for the production of the Technical Agreement and appropriate signatories are yet to be agreed.

The On Site Visits

MAA
Bristol
7-9 Jul



LufABw
Cologne
1-3 Sep

DGAM
Madrid
15-17 Sep

DAAA
Rome
29 Sep –
1 Oct

Certificate Signing - 28 Jan 16 (1 day early!)



L-R Major General Dr. Ansgar Rieks (LufABw), Major General Francesco Langella (DAAA), Lieutenant General Juan Garcia Montano (DGAM), Air Vice-Marshal Martin Clark (MAA)

Benefits gained

Since Feb 16

- Eurofighter Partner Companies (EPC) have submitted a total of 6 privileged changes (obsolescence, manufacturing process).
- Anticipated that BAE Systems will submit a further 30 privileged changes by end 2016 (with a similar number expected by other EPCs).
- Full scope of minor change privilege expected to be invoked by EPCs by Sep/Oct 16.
- Anticipate steady state of circa 70 privilege activities (by all EPCs) per year.

Benefits gained

Recognition is being used to claim credit for:

- NETMA independent certification activity for Rook 25 & P2La major clearances in 2016.
- Allowing NMAAs to devote Q&C resource to systems under their responsibility – thereby lack of national resource will not delay clearances.
- UK has shared national Q&C evidence for P1Eb clearance with IT & ES – which have been accepted under Recognition.

This allows the international programme to accept the future clearances and encourage future sharing of Q&C evidence.

Lessons identified

Reducing resources drive the need to work together.

Need to build trust and respect.

- Not only among Regulators but also with Industry.

Establish a method of recording the process

- Contractual, auditable, and repeat/improve the process.

Harmonised regulations are a great idea, but only if used in the same way.

Lessons identified

Not all Regulators are the same; different structure and different regulated community.

Be realistic about benefits to be gained – Recognition is not a ‘silver bullet’.

- It is still a requirement for the recognising Regulator to have the required level of assurance.

Military Aviation Authority

MAA



Thank you for listening