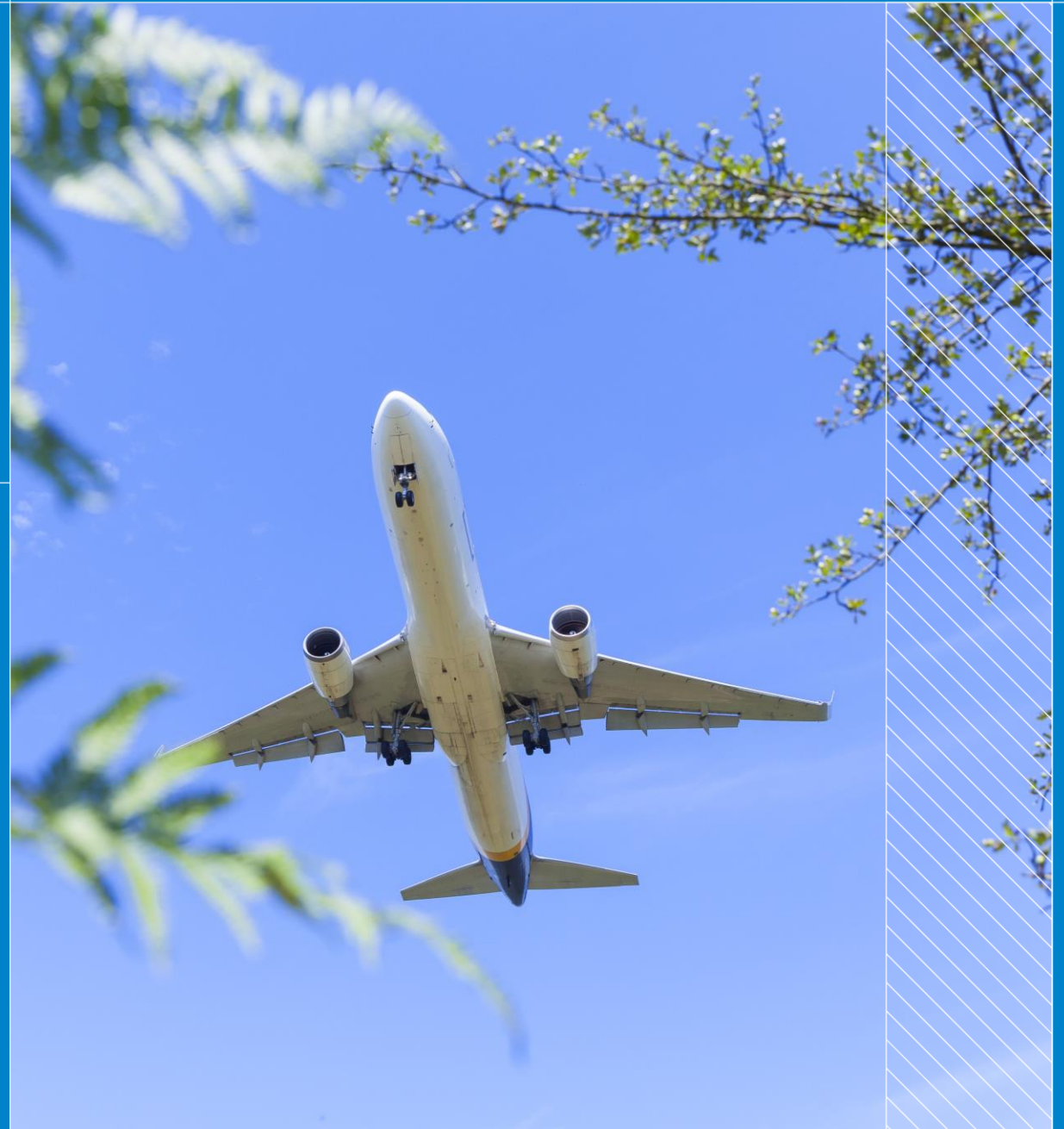


# Update on International developments

Charles Leboeuf  
Chief PCM – Validation Process

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Section Manager – Certification  
Director's Office



# Content

- BASA/Technical Implementation Procedures (TIP) with UK
- Update on international developments
  - USA
  - China
  - Japan
  - Other Partners (Brazil, Canada, India, Russia, IAC-AR)
  - Certification Management Team (CMT)

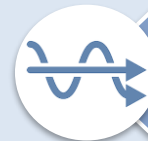
# EU/UK BASA Implementation (TIP)

- TIP entered into force upon signature following the first EASA/UK CAA Certification Oversight Board (COB) on 17th May 2021.
- Implementation of principles and provisions of Annex 30 on Airworthiness and Environmental Certification
- Mutual recognition of Design and Production oversight systems
- Process for export of products
- Mechanisms for cooperation and Continuous Qualification of Authorities
- Straight identification of processes to follow

## CERTIFICATE APPROVALS: PROCESSES



Automatic Acceptance



Streamlined Validation



Technical Validation



# Automatic Acceptance



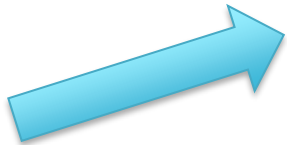
- the Validating Authority (VA) recognises and accepts the Certifying Authority's (CA) certificates without any technical investigation or validation exercise
- Certificate of the CA is recognised by the VA as equivalent to its own certificate **issued in accordance with its legislation and procedures**
- The VA does not issue its own corresponding certificate

- Approval is recognized as valid in the VA system without showing of compliance with applicable VA requirements
- For EU certificates, Automatic Acceptance for all EU Repairs (Minor/Major); EU Non-significant Changes to TC (incl. STC); Minor design changes and ETSOAs

# Validation of certificates and approvals

→ For approvals not eligible to automatic Acceptance: risk-based approach establishes two paths for validation:

CA Approval



**Streamlined validation limited to technical familiarisation without involvement of the VA in the showing of compliance**

**Technical validation in accordance with LoI principles**

→ Both validation processes (Streamlined or Technical Validation) require:

- ❖ a formal application to the VA
- ❖ a CA's statement that the design complies with the VA certification basis
- ❖ and issuance of a VA design approval or certificate



→ TIP §2.4.x gives details on each step of the applicable process for each validation path

# EU Applicants - Application to UK CAA

For EU projects subject to EASA certification through EASA is necessary

- Need for an EASA CSVD
- Thorough preparation of streamlined validation
- Use of UK CAA Form S To be found @ <https://www.caa.co.uk/airworthiness/Type-design-approvals/Validation-of-design>
- EASA will submit the

**APPLICATION FOR CERTIFICATION APPROVAL**

This form is applicable to applications for Type Certificates, Restricted Type Certificates (RTC), Supplemental Type Certificates (STC), Statements of Technical Satisfaction (SOTS), Major Changes/Repairs, Major Modification via Airworthiness Approval Notes (AAN), Minor Changes/Repairs, Operational Suitability Data (OSD), MRBR, UKTSOA and Transfer Certificates.

Please complete this form online or in BLOCK CAPITALS using black or dark blue ink. For submission instructions see Section 10.

**FALSE REPRESENTATION STATEMENT**  
It is an offence under the United Kingdom Air Navigation Order to make, with intent to deceive, any false representation for the purpose of procuring the grant, issue, renewal or variation of any certificate, license, approval, permission or other document. This offence is punishable by a fine, and on conviction on indictment with an unlimited fine or imprisonment or both.

**1. Applicant's Detail** *(The Applicant is the person responsible for payment of CAA charges)*  
This application will be considered in respect of and, if appropriate, granted or issued to, the applicant(s) named below.

**a) Individual (including sole traders and partnerships)**

Title: Forename: Surname:  
Address:  
Country: Postcode:  
Telephone: Fax:  
E-mail: Mobile Telephone:  
Trading Name: (if applicable)  
Website address:  
In the case of a partnership, please complete details of all partners. continued on a separate sheet ☐

**This application will be considered in respect of and, if appropriate, granted to, the Company Name as registered under the Company Number provided on this form.**

**b) A Company**

Registered Company Name (in full):  
Registered Company Number:  
Country of Company Registration:  
Registered Office Address:  
Postcode:  
Telephone: Fax:  
E-mail:  
Trading Name: (if applicable)  
Trading Address (primary site):  
Country: Postcode:  
Website address:

**Authorised Representative of Company**  
This application is to be signed by either a Director or Company Secretary or a person authorised by the Board to act on behalf of the Company.  
Title: Forename: Surname:  
Position in Company:  
Telephone No: E-mail:  
If you are not a Director or Company Secretary and have been authorised to sign the application form on behalf of the Company, proof of that authority must be provided with the completed application form.

Application to the UK CAA

for Validation) – EASA Form 41  
Paragraph 2.4.1.2 & 2.4.3.4 in case

[www.caa.co.uk/airworthiness/Type-design-](https://www.caa.co.uk/airworthiness/Type-design-approvals/Validation-of-design)

UK CAA ([apply@caa.co.uk](mailto:apply@caa.co.uk))



# EU/UK BASA and TIP - Practical questions?

*Check our EASA webpage:*

*<https://www.easa.europa.eu/the-agency/faqs/brexit>*



*Do not hesitate to ask for support to your favourite EASA DOATL / EASA PCM!*



# US – FAA (1/2)



- Software and Airborne Electronic Hardware Working Group
  - Abstraction Layer (a tool to assess alternative standards):
    - Fully supported by EASA and FAA
    - Work to continue under the oversight of the Certification Oversight Board (COB)
    - Separate presentation
- Environmental Protection
  - TIP guidance in development for Basic/Non-Basic classification and examples
  - To be implemented before Technical Implementation Procedures (TIP) update when ready
- Next TIP update in planning to capture recent rulemaking changes including:
  - Part 26 Aging Aircraft
  - Release of Parts without Form 1 (need for TIP amendment still under review)



# US – FAA (2/2)



- Exchanges on Master Minimum Equipment Lists (MMEL)
- Safety Emphasis Item (SEI) Lists
  - FAA & EASA working on improving control and oversight of SEI lists
  - Bilateral discussion on list content
  - Management vetting process & mutual consultation before publication
- Establishment of a post-approval lessons learnt review group

# China – CAAC (1/2)

## → Achievements since mid-2020:

- 01/09/2020: entry into force of the Bilateral Aviation Safety Agreement (BASA) – TIP signature on 03/09/2020
- Agreements with CAAC on:
  - Acceptance of validation without demonstration of compliance for some Jet Fuel additives, and
  - Validated Type Certificate Data Sheet (VTCDS) updates for automatically accepted design changes
- CAAC flexibility for customer letter of intent requirements
- Termination of several pre-BASA Working Arrangements
- Agreed Frequently Asked Questions (FAQ) to be published soon

# China – CAAC (2/2)

- On-going discussions:
  - Projects under transition (i.e. initiated before BASA entry into force)
  - Delays for projects submitted after entry into force of TIP
  - Metrics on TIP implementation
  - Phasing out of “Independent certificates”
- Two COB meetings already held. Next one planned for 28 October 2021
- Overall objective: full implementation of the BASA and TIP

# Japan – JCAB

- BASA entered into force on 22/06/2020
- TIP signed on 09/07/2020
- Discussion of a TIP amendment for:
  - Validation of Significant Supplemental Type Certificates (STC) for aircraft not holding a JCAB Type Certificate (TC)
  - Update of VTCDS for accepted design changes
  - Revision of Aircraft Flight Manual (AFM)/Marking & Placard written in Japanese

# Brazil, Canada

## → ANAC – Brazil:

- Cooperation on Operational Suitability Data (OSD)
- Exchanges on validation activities, including Continued Airworthiness (CAW)
- Discussions on validation of Light Sport Aeroplanes (LSAs)
- Potential TIP update

## → TCCA – Canada

- Lightweight Workplan Concept to be implemented
- Escalation process agreed
- A posteriori review of Validation Projects (AMAC – Annual Meeting on Aircraft Certification)

# India, Russia, IAC-AR

## → DGCA – India

- Signature of a Working Arrangement on Airworthiness (14/09/2021)

## → Russia / FATA:

- On-going negotiations with FATA on Implementing Procedures to Working Arrangement

- In parallel, exchanges between EASA and FATA on validation projects

## → IAC-AR

- Started discussions for Working Arrangement update



# Certification Management Team (CMT)

- Annual meeting held remotely in September 2021 – Main points discussed:
  - CMT subgroups work programme (highlights):
    - CATA: Flight crew alerting, Human factors, Fire protection
    - CAPP: ETOPS, endurance testing and icing
    - EACTB: Fire prevention, In-flight engine restart, Functional and Reliability testing
  - Improving interface between aircraft certification and operational evaluation activities
- Future of CMT along the following direction:
  - “Conventional” policy / harmonisation work
  - Cooperation on Post MAX activities (E.g. Safety Management Systems (SMS), Changed Product Rule (CPR), Operational evaluation)
  - Coordination on innovation and new products

# Certification Management Team (CMT) – Industry

## → Fruitful exchanges took place on:

- Validation metrics
- Use of validation workplans
- Level of Involvement during Validation activities
- Several on-going developments such as SMS, Innovation, Electric and Hybrid Propulsion Systems, regulatory framework for drones

## → Industry expressed:

- Appreciation for a number of successes e.g. business continuity during the COVID crisis, acceptance of Airworthiness Directives and Alternative Means of Compliance
- Expectation for consistency, transparency, predictability on validation activities



# THANK YOU

