



Airworthiness of type design

PR.CERT.00001-003

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DOCUMENT CONTROL SHEET**Reference documents****a) Contextual documents**

Certification Specifications - Certification Specifications

Chicago Convention Annex 10 - Aeronautical Telecommunications (International Standards and Recommended Practices)

Commission Implementing Regulation (EU) 2019/2153 - of 16 December 2019 on the fees and charges levied by the European Union Aviation Safety Agency, and repealing Regulation (EU) No 319/2014

Commission Regulation (EU) 748/2012 - amended Commission Regulation of 3 August 2012 laying down implementing rules for the airworthiness and environmental protection certification of aircraft and related products, parts and non-installed equipment, as well as for the certification of DPO

ED Decision 2024/014/ED - On the delegation of power of the Executive Director to certain members of the Agency's Certification Directorate

ED Decision 2024/029/ED - On the allocation criteria for certification and oversight tasks to National Competent Authorities (NCA).

ED Decision 2024/030/ED - On the allocation criteria for certification and oversight tasks to Qualified Entities (QE).

MB Decision 12-2007 - Decision of the MB of 1 Oct. 2007 concerning the general principles related to the certification procedures to be applied by the Agency for the issuing of certificates for products parts and appliances (hereinafter referred to as PCP Decision).

Regulation (EU) 2018/1139 - Regulation of the European Parliament and of the Council of 4 July 2018 on common rules in the field of civil aviation and establishing a European Union Aviation Safety Agency.

b) Internal documents

FO.CERT.00095 - Technical visa for type certificate / restricted type certificate

FO.CERT.00096 - Technical visa for post TC design approval

TE.CERT.00074 - Certification Review Item (CRI)

WI.CERT.00005 - Decisions and signatures for certification

WI.CERT.00012 - Electronic application review & task assignment

WI.CERT.00146 - CRI and CAI writing and management

WI.CERT.00172 - Certification Process for TC, RTC, STC, Changes, Repairs, ETSO Authorisations

WI.IMS.00134 - CT Records management and Filing Plan

Abbreviations/Definitions**a) Abbreviations**

CAI: Certification Action Item

CB: Certification Basis

CP: Certification Programme

CRI: Certification Review Item

CSP: Certification Service Provider (NAA, QE)

DOA: Design Organisation Approval





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DOA TL: DOA Team Leader
EASA: European Union Aviation Safety Agency
EU: European Union
LOI: Level of Involvement
MS: Member State
NAA: National Aviation Authority
NORA: Notification Of Application Received
PCM: Project Certification Manager
QE: Qualified Entity
TCDS(N): Type Certificate Data Sheet (Noise)
WI: Work Instruction

b) Definitions

Certification Project Team: Established group of panel experts including the PCM in charge of processing the certification in EASA or on behalf of EASA.

Note to Certification Phase I: Based on ARIS tool limitation, the certification phase I is divided into Part 1 and Part 2 to enable visualization of the flowchart. Both parts shall be considered as one phase.

Log of issues		
Issue	Issue date	Change description
001	02/09/2013	This procedure consolidates, replaces and cancels the previous process descriptions for TC (PR.TC.00001), STC (PR.STC.00001), Approval of changes to TC (PR.TCCH.00001) and Approval of repair design (PR.TCCH.00002). The content of the document has been written by the Certification Procedures Working Group.
002	01/09/2014	Issue 002. Migration of PR.CERT.00001-001 in compliance with Convergence project.
003	20/11/2024	Issue 003. Update of the certification process according to the latest work instructions.





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INTRODUCTION

Purpose and scope

This document describes how EASA discharges its responsibilities for certification activities of aeronautical products within its remit.

This procedure describes the technical process; it excludes the purely administrative aspects.

This procedure applies to the type certification of EU aeronautical products and to changes/repairs thereto, in accordance with Annex - Part 21 to Commission Regulation (EU) No. 748/2012.

The scope of this procedure extends to Type Certificates (TC), Restricted Type Certificates (RTC), Supplemental Type Certificates (STC), Major Changes and Minor Change Approvals, Major and Minor Repair Approvals and APU ETSO Authorisations.

The procedure does not explicitly include Validation projects, however, the principles as defined in this procedure should be followed.

In the case of a formal bilateral (recognition) agreement between the Community and a third country in accordance with Article 68 of Regulation (EU) No 2018/1139, this agreement, including the associated implementing procedures, may supplement, change or supersede process steps included in this procedure.

Basic Principles

All certification tasks, irrespective whether they are performed internally or allocated to a Certification Service Provider (CSP) shall be executed following the provisions of this procedure.

The certification project process can generally be divided in the following phases:

> Phase 0 - Definition and agreement of the working methods with the applicant

The objective of this phase is to check applicant's eligibility and establish the Team of experts.

> Phase I – Technical Familiarisation and establishment of the Initial Certification Basis

The objective of this phase is to provide technical information about the project to the team of experts to enable the issuance of the initial EASA Certification Basis for the applied project.

> Phase II – Agreement of the Certification Programme and Level of Involvement

The objective of this phase is the definition of the means and methods of compliance with the complete certification basis and environmental protection requirements, the identification of the certification team's Level of Involvement and the issuance of the final EASA certification basis for the applied project.

> Phase III – Compliance determination

The objective of this phase is to demonstrate and verify compliance with the applicable Certification Basis and environmental protection requirements.

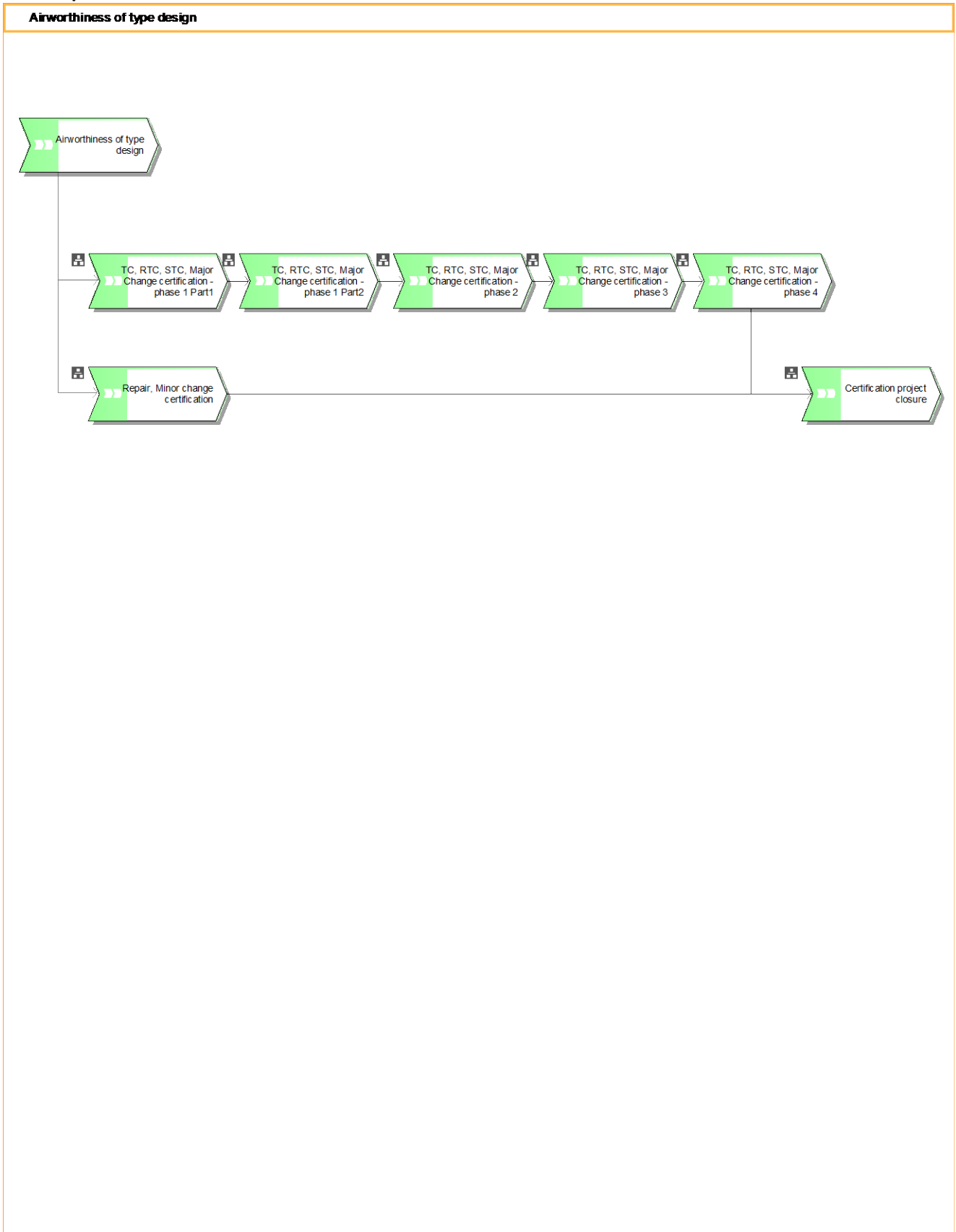
> Phase IV- Technical closure and issue of the Approval

The objective of this phase is the applicant's declaration of compliance with the applicable certification basis, closure of EASA oversight activities and issuance of the Certificate.



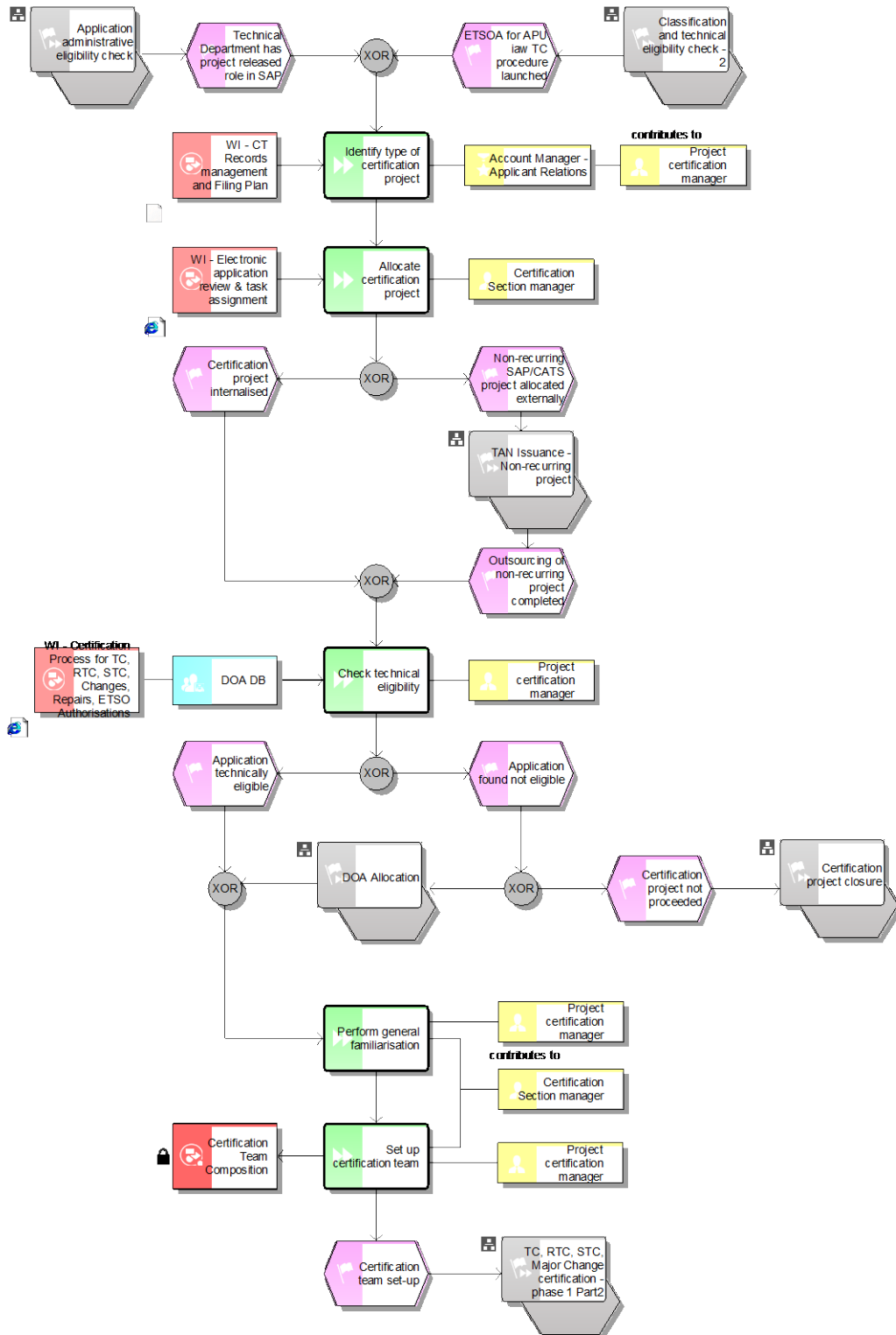


Structure of process charts





TC, RTC, STC, Major Change certification - phase 1 Part 1





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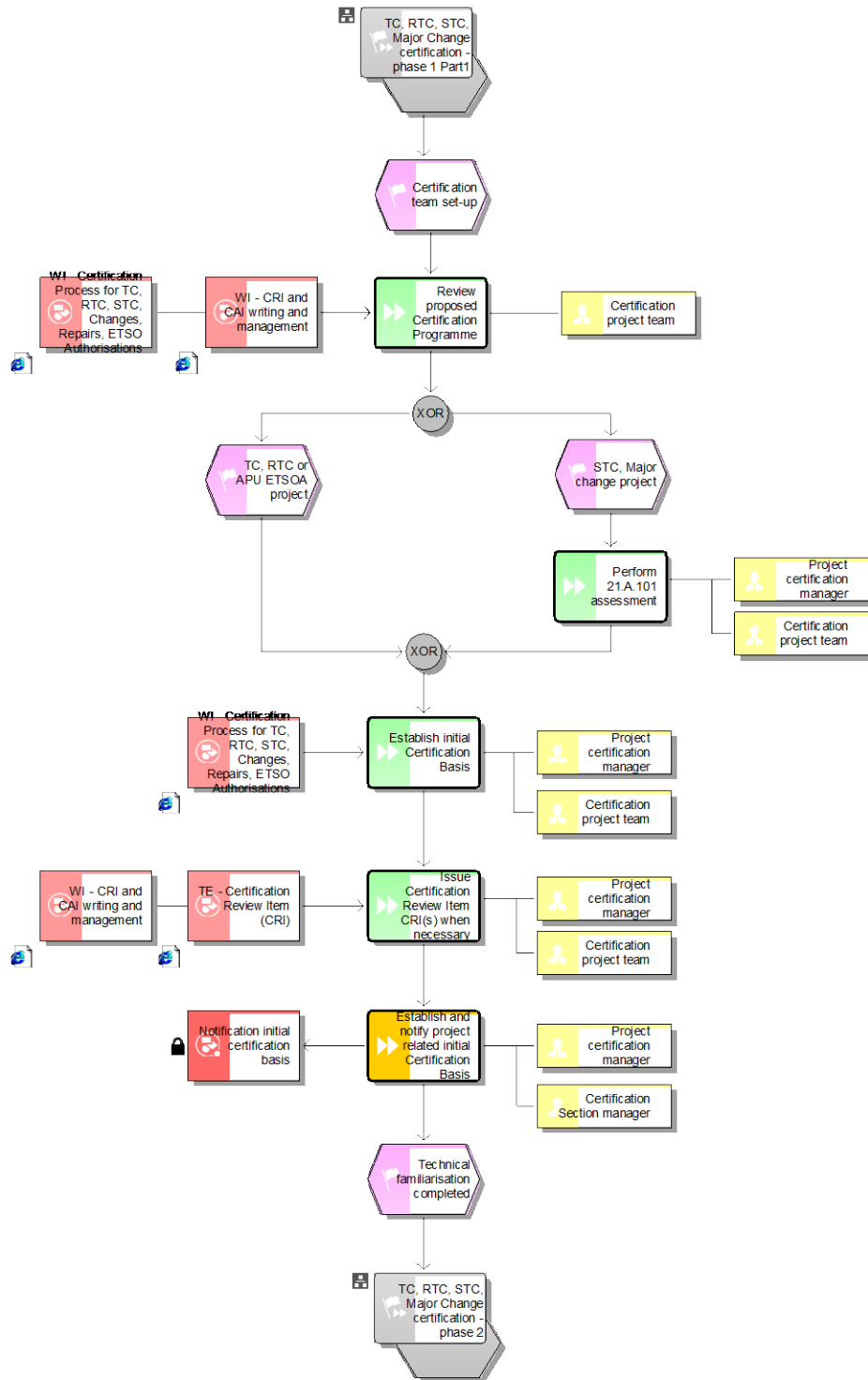
Activity	Description to the process activity
Identify type of certification project	Identify the kind of product, kind of application, affected department and section. General for the complete process: Archive all records during the complete project according to "WI.IMS.00134 CT Records management and Filing plan"
Allocate certification project	Administrator of the responsible department releases the task in SAP and provides support to the responsible Section Manager of the Partner Relations section. - In case of task allocation to National Aviation Authority (NAA) or Qualified Entity (QE) initiates a Purchase Order (PO). - In case of EASA internal allocation, the task is allocated to a PCM. WI.CERT.00012 to be followed.
Check technical eligibility	In line with WI.CERT.00172. Checking applicability of Bilateral Agreement (BA), Working Arrangement (WA) or amended Regulation (EU) No. 748/2012. If there is no BA, WA in place and also the amended Regulation (EU) No. 748/2012 is not applicable, the certification process cannot be proceeded. The application and certification programme submitted by the applicant shall be reviewed. Contact the applicant and/or experts whenever necessary. Purpose of the check is to understand nature and complexity of the project. This includes checking of applicant's eligibility and capability as per WI.CERT.00172.
Perform general familiarisation	Applicant is requested to provide detailed descriptive information with application and certification programme. This information is to be reviewed for completeness and adequacy for decision on team and conditions. Contact applicant (preferably in writing) if further information, data, documents necessary. There is no need to contact applicant if no further information is necessary at this stage of the project. See details in WI.CERT.00172 of the certification process.
Set up certification team	On basis of project complexity PCM is coordinating with responsible Section Manager about the necessary team size and panels and the team members. Agreed team is recorded and notified to applicant. See definition of Certification Project Team above.

Internal Process Interfaces
Application administrative eligibility check Classification and technical eligibility check - 2 TAN Issuance - Non-recurring project DOA Allocation Certification project closure TC, RTC, STC, Major Change certification - phase 1 Part2





TC, RTC, STC, Major Change certification - phase 1 Part 2





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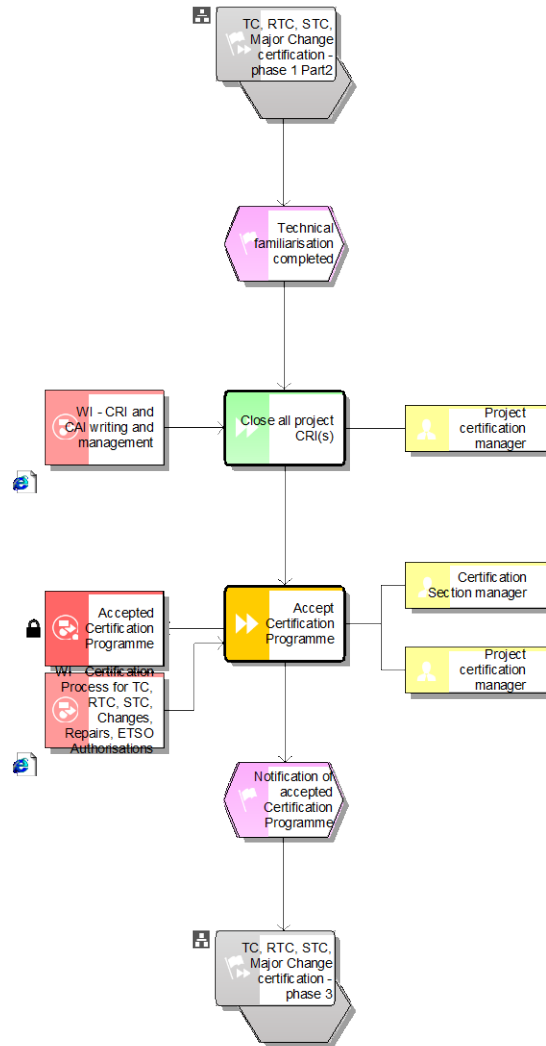
Activity	Description to the process activity
Review proposed Certification Programme	<p>Perform a technical familiarization. Assess the applicant’s proposed certification programme as per WI.CERT.00172. Data is provided by the applicant, supplemented with briefings/meetings with the applicant whenever necessary.</p> <p>If the data is not sufficient to</p> <ul style="list-style-type: none"> - technically familiarize, - classify - determine the necessity to enter in the Certification Review Item (CRI) process as per WI.CERT.00146. - establish the initial certification basis, - to determine the EASA LOI <p>further data, meetings and/or updates of the certification programme and supporting data may be requested.</p> <p>Regarding changes to type certificate, assess the change and its affected areas as as per 21.A.19, 21.A.101 and 21.A.91 compared to the proposed baseline configuration, taking into consideration the cumulative effects of previous changes.</p>
Perform 21.A.101 assessment	See step “Review proposed Certification Programme” for changes to type certificate (including STCs).
Establish initial Certification Basis	<p>EASA notifies the applicant about the applicable initial type certification basis (21.B.80), OSD certification basis (21.B.82) and environmental protection requirements (21.B.85).</p> <p>If a change is classified as substantial in accordance with 21.A.19 a new type certificate is required.</p> <p>For non-substantial changes to type certificate (including STC) the certification basis is established as per point 21.A.101..</p> <p>See details in WI.CERT.00172.</p>
Issue Certification Review Item CRI(s) when necessary	See WI.CERT.00146
Establish and notify project related initial Certification Basis	SC, ESF, DEV as per WI.CERT.00146 changing the Certification Basis of the baseline configuration also need notification in accordance with MB Decision 12-2007 Article 7.3.

Internal Process Interfaces
TC, RTC, STC, Major Change certification - phase 1 Part1 TC, RTC, STC, Major Change certification - phase 2





TC, RTC, STC, Major Change certification - phase 2





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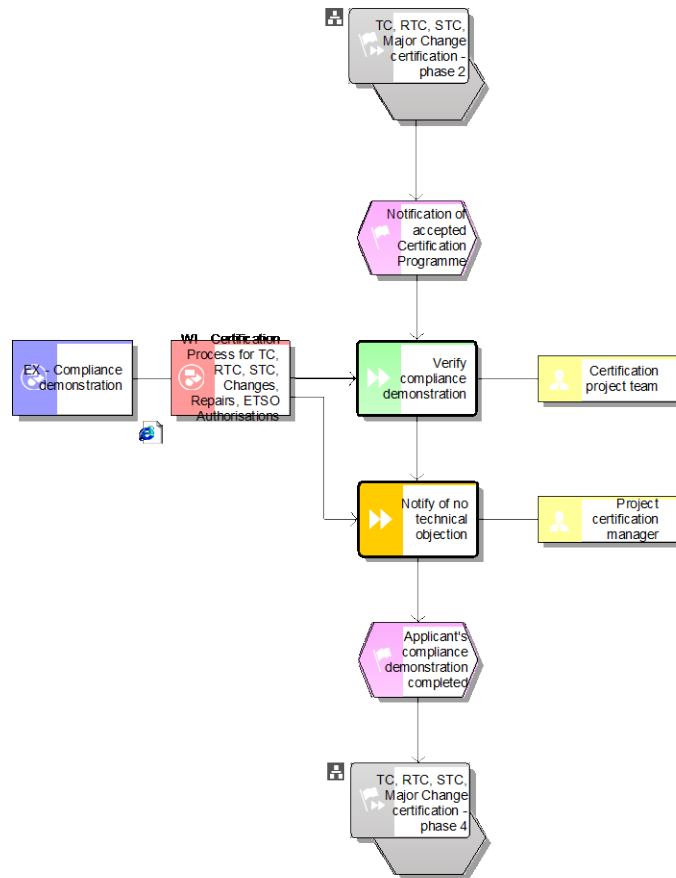
Activity	Description to the process activity
Close all project CRI(s)	See WI.CERT.00146
Accept Certification Programme	Establish and notify final certification basis including environmental protection requirements (21.B.75, 21.B.80, 21.B.82, 21.B.85, 21.A.101(d)). Determine and notify the EASA level of involvement (21.B.100). See details in WI.CERT.00172

Internal Process Interfaces
TC, RTC, STC, Major Change certification - phase 1 Part2 TC, RTC, STC, Major Change certification - phase 3





TC, RTC, STC, Major Change certification - phase 3





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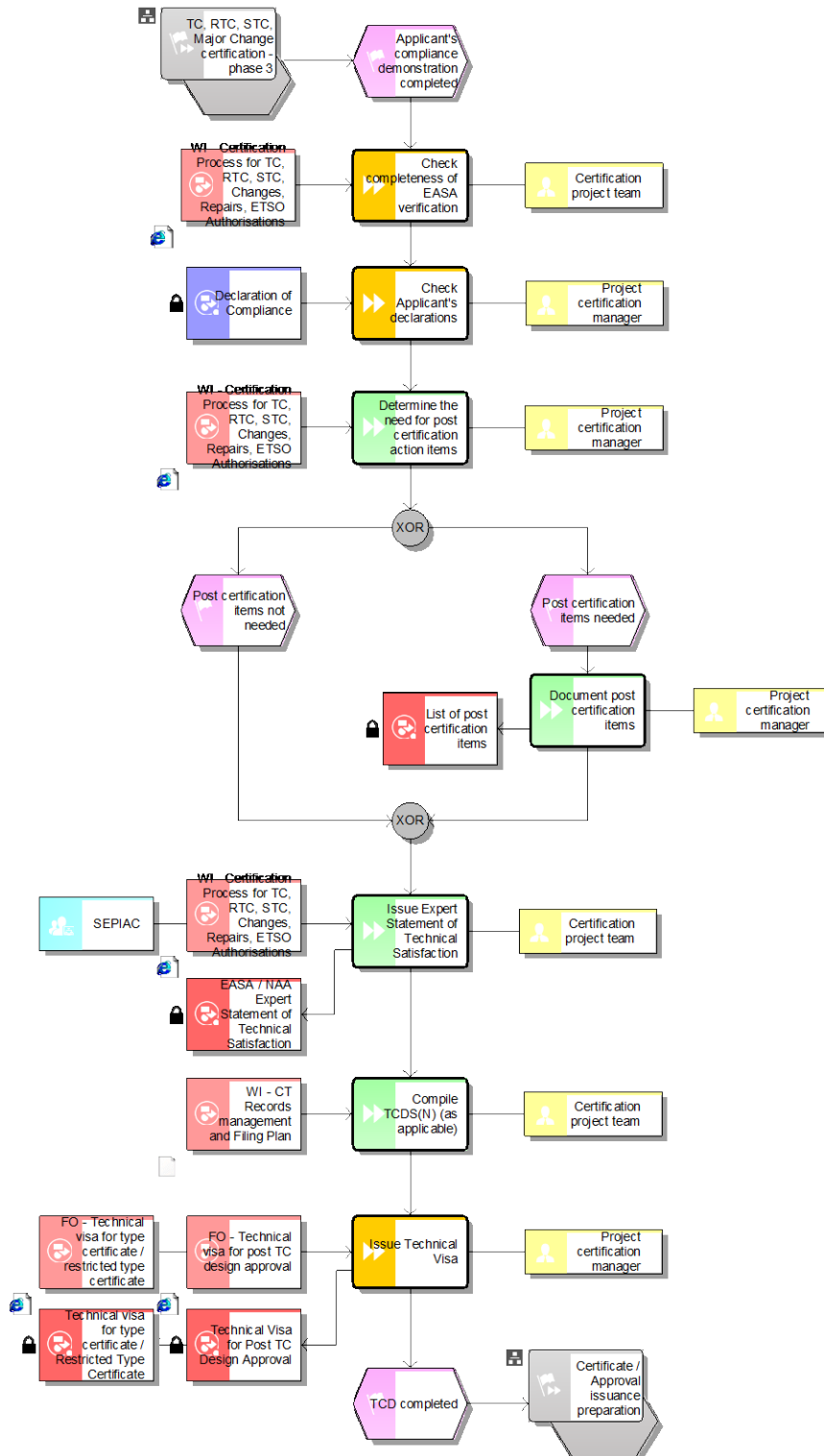
Activity	Description to the process activity
Verify compliance demonstration	Review of compliance data, witnessing of tests and inspections, audits, flight test participation, etc., i.e. all kinds of project related compliance demonstration with the applicable certification basis where EASA determined its involvement as per the accepted Certification Programme. In case the certification team identify that compliance demonstration is inadequate, EASA need to inform the applicant about the reason(s) for the objection. See details in WI.CERT.00172
Notify of no technical objection	When satisfied with the EASA retained compliance demonstration verification without further comments, EASA notifies the applicant about no technical objection. See details in WI.CERT.00172

Internal Process Interfaces
TC, RTC, STC, Major Change certification - phase 2 TC, RTC, STC, Major Change certification - phase 4





TC, RTC, STC, Major Change certification - phase 4





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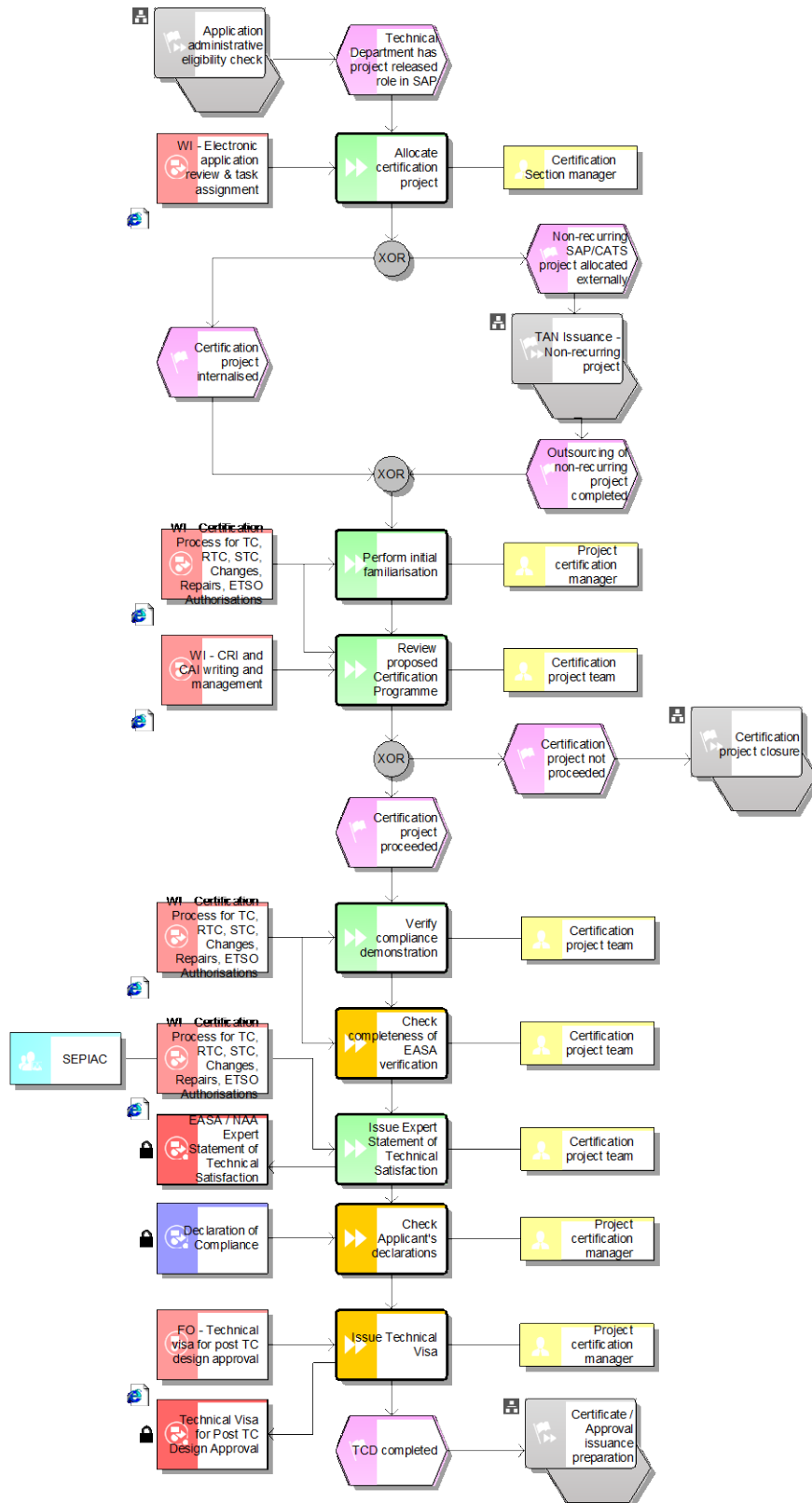
Activity	Description to the process activity
Check completeness of EASA verification	EASA involvement in the verification of compliance demonstration, as per EASA determined LOI, completed with no technical objection. See details in WI.CERT.00172.
Check Applicant's declarations	Applicant declared: - Full compliance with the established Certification Basis and environmental protection requirements, and - that no feature or characteristic is identified that may make the product unsafe for the uses for which certification is requested, - that it is prepared to comply with its obligations.
Determine the need for post certification action items	Determine certification action items that will not be completed before the issue of Certificate / Approval, if needed. See details in WI.CERT.00172.
Document post certification items	See "Determine the need for post certification action items"
Issue Expert Statement of Technical Satisfaction	Each expert of the certification project team (or alternatively panel) issues an Expert's Statement of Satisfaction to the PCM when the team member (or alternatively panel) is satisfied with the retained compliance demonstration. See details in WI.CERT.00172.
Compile TCDS(N) (as applicable)	See WI.CERT.00172
Issue Technical Visa	Before TV is signed: - check DOA Demonstration of Capability through DOA database or contact DOA TL when an extension of the DOA capability was identified in phase I. - Check validity of related ETSOA(s) and engine, propeller TCs Forward signed TV to Applicant Relations Section

Internal Process Interfaces
TC, RTC, STC, Major Change certification - phase 3 Certificate / Approval issuance preparation





Repair, Minor change certification





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Activity	Description to the process activity
Allocate certification project	Administrator of the responsible Department releases the task in SAP and provides support to the responsible Section Manager Partner Relations section. - In case of task allocation to a Certification Service Provider (CSP), initiate a Purchase Order (PO). - In case of EASA internal allocation, the task is allocated to a PCM. See details in WI.CERT.00012.
Perform initial familiarisation	PCM to confirm classification and need for support. In case of major repair check eligibility in accordance with 21.A.432(a) (remind applicant to submit application for extension of DOA scope); checking applicability of Bilateral Agreement (BA), Working Arrangement (WA) and Implementing Procedure (IP). See details in WI.CERT.00172.
Review proposed Certification Programme	Perform a technical familiarization. Assess the applicant's proposed certification programme as per WI.CERT.00172. Data is provided by the applicant, supplemented with briefings/meetings with the applicant whenever necessary. If the data is not sufficient to - technically familiarize, - classify - determine the necessity to enter in the Certification Review Item (CRI) process as per WI.CERT.00146. - establish the initial certification basis, - to determine the EASA LOI further data, meetings and/or updates of the certification programme and supporting data may be requested.
Verify compliance demonstration	Review of compliance data, witnessing of tests and inspections, audits, flight test participation, etc., i.e. all kinds of project related compliance demonstration with the applicable certification basis where EASA determined its involvement as per the accepted Certification Programme. In case the certification team identify that compliance demonstration is inadequate, EASA need to inform the applicant about the reason(s) for the objection. See details in WI.CERT.00172
Check completeness of EASA verification	EASA involvement in the verification of compliance demonstration, as per EASA determined LOI, completed with no technical objection. See details in WI.CERT.00172.
Issue Expert Statement of Technical Satisfaction	Each expert of the certification project team (or alternatively panel) issues an Expert's Statement of Satisfaction to the PCM when the team member (or alternatively panel) is satisfied with the retained compliance demonstration. See details in WI.CERT.00172.
Check Applicant's declarations	Applicant declared: - Full compliance with the established Certification Basis and environmental protection requirements, and - that no feature or characteristic is identified that may make the product unsafe for the uses for which certification is requested, - that it is prepared to comply with its obligations as applicable.





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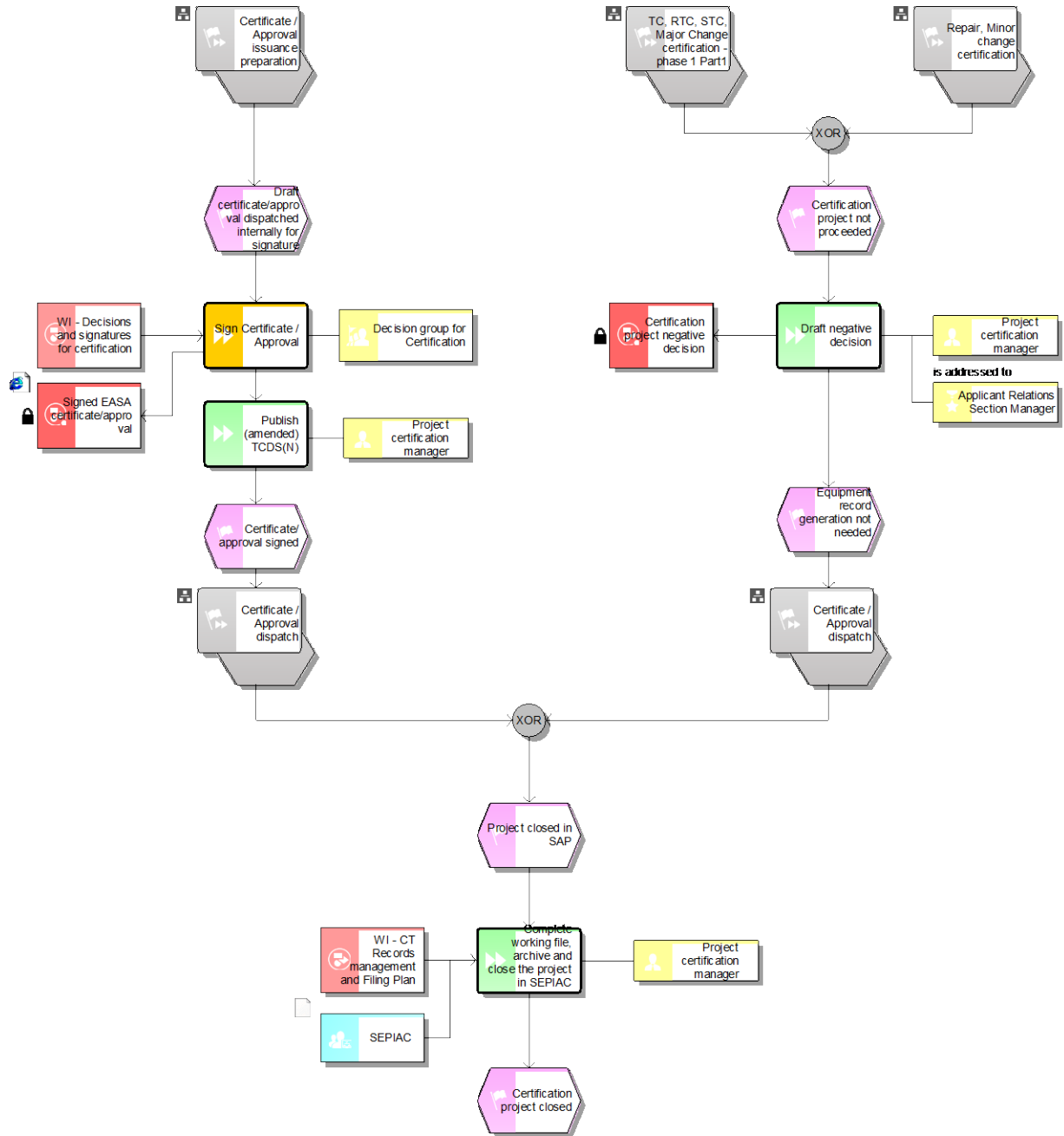
Issue Technical Visa	Forward signed TV to Applicant Relations Section.

Internal Process Interfaces
Application administrative eligibility check TAN Issuance - Non-recurring project Certification project closure Certificate / Approval issuance preparation





Certification project closure





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Activity	Description to the process activity
Sign Certificate / Approval	Check plausibility before signing Certificate / Approval. The Certificate / Approval is signed by a person, other than the PCM who signed the TV, having proper delegation. Consult WI.CERT.00005 on Decisions and Signatures for Certification.
Publish (amended) TCDS(N)	---
Draft negative decision	Justification shall be provided in writing. Justification should be sound supporting a negative Agency decision. Get legal support. Negative Agency decision will be communicated by Applicant Relations Section. No need to archive in the certification directorate since application and negative Agency decision are retained by Applicant Relations Section in SAP. PCM may retain documents in working file.
Complete working file, archive and close the project in SEPIAC	Collect and arrange all documents & records received and generated during the project under a specific project folder. Observe guidelines on 'working file' management. The PCM ensures that all 'legal records' are in the project record folder, in line with WI.IMS.00134

Internal Process Interfaces
Certificate / Approval issuance preparation TC, RTC, STC, Major Change certification - phase 1 Part1 Certificate / Approval dispatch Repair, Minor change certification



**RECORDS****Appendix A : Operational Documents****TC, RTC, STC, Major Change certification - phase 1 Part 1**

Record	Activity
Certification Team Composition	- Set up certification team

Certification project closure

Record	Activity
Certification project negative decision	- Draft negative decision
Signed EASA certificate/approval	- Sign Certificate / Approval

TC, RTC, STC, Major Change certification - phase 2

Record	Activity
Accepted Certification Programme	- Accept Certification Programme

TC, RTC, STC, Major Change certification - phase 4

Record	Activity
Technical visa for type certificate / Restricted Type Certificate	- Issue Technical Visa
List of post certification items	- Document post certification items
EASA / NAA Expert Statement of Technical Satisfaction	- Issue Expert Statement of Technical Satisfaction
Technical Visa for Post TC Design Approval	- Issue Technical Visa

TC, RTC, STC, Major Change certification - phase 1 Part 2

Record	Activity
Notification initial certification basis	- Establish and notify project related initial Certification Basis

Repair, Minor change certification

Record	Activity
Technical Visa for Post TC Design Approval	- Issue Technical Visa
EASA / NAA Expert Statement of Technical Satisfaction	- Issue Expert Statement of Technical Satisfaction

Appendix B : External Documents**TC, RTC, STC, Major Change certification - phase 4**



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Record	Activity
Declaration of Compliance	- Check Applicant's declarations

Repair, Minor change certification	
Record	Activity
Declaration of Compliance	- Check Applicant's declarations

