





- Human External Cargo (HEC)
- Multi-Pilot Operations
- Either Seat Qualification
- LLR PinS
- Fuel / Energy
- Training & Checking
- Operation on more than one Type or Variant

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Human External Cargo (HEC)

! Waiting for an EASA-approved device for single-engine helicopter!

« Kabinensicherung »

- Separate approval for each mission
- Only for public interest missions
- Only for companies that already have an approved SOP (grandfather right)







Multi-Pilot

Definitions

Multi-pilot helicopters, [...] it means an aircraft which is certificated for operation with a minimum crew of at least two pilots or which is required to be operated with at least two pilots in accordance with Regulation (EU) No 965/2012. (>9 PAX IFR OPS or >19 PAX VFR OPS)

 Multi-pilot operation means an operation requiring at least two pilots using multi-crew cooperation in either a multi-pilot or a single-pilot aircraft.





Multi-Pilot

Licence required

	CAT		SPO / NCC	
	CMD	FO	CMD	FO
Multi-pilot helicopter	ATPL(H)	CPL(H) + MCC + ATPL theory	CPL(H) + MCC + ATPL theory	CPL(H) + MCC + ATPL theory
Multi-pilot operation	CPL(H) + MCC	CPL(H) + MCC	CPL(H) + MCC	CPL(H) + MCC

- 500 h multi-pilot operations in any aircraft category = MCC credit
- ATPL theory: prerequisite for type rating course multi-pilot helicopter (FCL.720.H)
- Not possible for NCO operations
- Multi-pilot operation: initial & revalidation with OPC (no entry in the licence)
- OPC for pilots flying SP & MP : OPC MP combined (with a SP part)





Multi-Pilot

SOP

- Definition and description of multi-pilot operations for normal, abnormal & emergencies (general concept, PF and PM duties, etc.)
- PF & PM alternating roles
- Part of the OMs
- SPO operations: no mixed duty between PM and Task Specialist

PF: pilot flying

PM: pilot monitoring





Either Seat Qualification

AMC1 ORO.FC.236 Pilot qualification to operate in either pilot's seat — helicopters [...]

- complete their operator proficiency checks from left- and right-hand seats, on alternate proficiency checks; or
- (2) For multi-engined helicopters, if two consecutive operator proficiency checks are conducted from the same seat, the pilot should complete at least the following from the other pilot's seat:
 - (i) an engine failure during take-off;
 - (ii) a one-engine-inoperative approach and go-around; and
 - (iii) a one-engine-inoperative landing;
- (3) For single-engined helicopters, if two consecutive operator proficiency checks are conducted from the same seat, the pilot should complete at least one autorotation training or checking from the other pilot's seat.





Either Seat Qualification

GM1 ORO.FC.236 Pilot qualification to operate in either pilot's seat — helicopters

QUALIFICATION TO FLY IN EITHER PILOT'S SEAT – NOMINATED COMMANDER IN CHARGE OF LINE CHECKS

If the line check takes place for the purpose of the line check revalidation of a fully qualified commander and the line checker has no pilot tasks other than checking, then the nominated commander in charge of conducting the line check does not require a qualification to operate in either pilot's seat regardless of the seat he or she occupies.

 \rightarrow

Initial: either seat required

Recurrent: no either seat required





IFR Experience – CPL(H)

ORO.FC.H.150 Commanders holding a CPL(H)

- (a) Holders of a CPL(H) (helicopter) shall only act as commanders in CAT operations on a single-pilot helicopter if:
 - (1) when operating under IFR, they have a minimum of 700 hours total flight time on helicopters, including 300 hours as pilot-in-command. The total flight time on helicopters shall include 100 hours under IFR. Up to 50 hours instrument time performed on an FFS(H) level B or FTD level 3 qualification or higher qualified for instrument training, may be credited towards the 100 hours.



CPL(H) - IFR OPS: min 100 h IFR (up to 50 h SIM credited)



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PinS - LLR

Point-in-Space – PinS Low Level Route – LLR Low Flight Network – LFN



- A PinS approach & departure is a GNSS-based procedure designed specifically for helicopters (SPA)
- Swiss LFN
 - Rettung National
 - State flights
 - Certification RNP 0.3 all phases of flight





Fuel / Energy Scheme Helicopters (CAT)

CAT.OP.MPA.191

- Integration of the term: «discretionary fuel»
- For IFR → new RCF procedure (reduced contingency fuel)

CAT.OP.MPA.195

- Fuel checks do not necessarily have to be written down in OFP (SP operation not equipped with SAS)
- New → ATC call «MINIMUM FUEL» und «MAYDAY MAYDAY MAYDAY FUEL»

CAT.OP.MPA.200

New «Approval Point» → refueling with rotors turning





Training & Checking Personnel

Personnel providing aircraft/FSTD training & checking

Flight training
 TRI, FI or SFI

Operator proficiency TRE, SFE, or

For CAT, non-complex, VFR by day

suitably qualified commander holding a FI/TRI/SFI, nominated by the operator

For SPO:

suitably qualified PIC nominated by the operator





Recurrent Aircraft / FSTD Training

AMC1 ORO.FC.230 Recurrent training and checking RECURRENT TRAINING AND CHECKING SYLLABUS

[...]

- (4) Aircraft/FSTD training
 - (i) General

[...]

- (C) Aircraft/FSTD training may be combined with the operator proficiency check. The recurrent aircraft/FSTD training of a single task or manoeuvre should be separate from, and should not take place at the same time as an operator proficiency check of the item.
- (ii) Helicopters

If the operator is able to demonstrate, on the basis of a compliance and risk assessment, that alternating the use of an FSTD with the use of an aircraft for this training provides equivalent standards of training with safety levels similar to those achieved using an FSTD, the aircraft may be used (alternating with the use of an FSTD) for this training to the extent necessary.





Recurrent Checking

AMC1 ORO.FC.230 Recurrent training and checking RECURRENT TRAINING AND CHECKING SYLLABUS

 $[\ldots]$

- (1) Operator proficiency checks
 - (ii) Helicopters

(A) The aircraft/FSTD checking programme should be established in a way that all major failures of aircraft systems and associated procedures will have been checked in the preceding 3-year period.

The operator should define which failures are major for the purpose of the operator proficiency check based on a risk assessment

[...]





Operation on more than one Type or Variant

More training - less checking

FOCA AltMoC

«Helicopter recurrent training & checking» will be no longer applicable!

Two defined groups

- Single-engined turbine helicopter operated under VFR
- Single-engined piston helicopter operated under VFR

An OPC on one type will be valid for all the other types within the group

For CAT Ops

at least 2 OPC per type within 3-year cycle

Annual recurrent ground & flight training for each type or variant

→ no credit within a group





Operation on more than one Type or Variant

Operation on more than one type (CAT only)

[...]

the flight crew member should not operate more than three helicopter types or groups of types in CAT, NCC and SPO

Combinations of helicopter and aeroplane under CAT/NCC/SPO

- 1 type/class aeroplane and 1 helicopter type
- 1 type/class aeroplane and 1 group of helicopter types





