

SUBPART F – CLASS AND TYPE RATING (Aeroplane)

JAR–FCL 1.261 Type and class ratings – Knowledge and flight instruction

Replace (d) as follows:

(d) Multi-crew co-operation training (see also JAR–FCL 1.250(a)(3))

(1) MCC training is required in two circumstances:

(i) for students attending an ATP integrated course in accordance with the aim of that course (see Appendix 1 to JAR–FCL 1.160 & 1.165(a)(1))

(ii) for PPL/IR or CPL/IR holders, who have not graduated from an ATP integrated course but who wish to obtain an initial type rating on multi-pilot aircraft (see JAR–FCL 1.250(a)(3)).

The MCC course shall comprise a minimum of 45 hours, including a minimum 20 hours of simulated flight training in an FNPT II MCC or flight simulator.

Students attending an ATP integrated course may have the practical FNPTII training reduced by 5 hours. Wherever possible, the MCC training should be combined with the initial type-rating course on a multi-pilot aircraft, in which case the simulated flight training may be reduced to not less than 10 hours if the same flight simulator is used for both the MCC and type rating training.

(2) The MCC training shall be accomplished within six months under the supervision of either the Head of Training of an approved FTO or an approved TRTO or on an approved training course conducted by an operator. A course conducted by an operator shall meet the relevant requirements of Appendix 2 to JAR–FCL 1.055, as determined by the Authority. A FNPT II MCC or a flight simulator shall be used.

JAR–FCL 1.262 Type and class ratings – Skill (See Appendices 1, 2 and 3 to JAR–FCL 1.240) (See Appendix 1 to AMC FCL 1.261(d))

Replace (c) as follows:

(c) Multi-crew co-operation. During MCC training the applicant shall demonstrate the ability to perform the duties of a pilot on multi-pilot aircraft through a process of continuous assessment throughout the course.

Appendix 1 to JAR-FCL 1.261(d)
Multi-crew co-operation course (Aircraft)
(See JAR-FCL 1.261(d))
(See AMC FCL 1.261(d))

Replace text as follows:

- 1 The objectives of MCC training are to develop the technical and non-technical components of the knowledge, skills and attitudes required to operate multi-crew aircraft
- 2 The applicant shall receive training to the appropriate level of competency in the following areas
 - (a) Threat and Error Management
 - (b) Communications
 - (c) Leadership and Teamworking
 - (d) Situation awareness
 - (e) Workload management
 - (f) Problem solving and decision making
 - (g) Monitoring and cross-checking
 - (h) Task sharing
 - (i) Use of checklists
 - (j) Briefings
 - (k) Flight management
 - (l) FMS use, **if applicable**
 - (m) Systems normal operations
 - (n) Systems abnormal and emergency operations
 - (o) Environment, weather and ATC

THEORETICAL KNOWLEDGE/CLASSROOM COURSE

- 3 An approved MCC course shall comprise not less than 25 hours theoretical knowledge training. An example syllabus is contained in AMC FCL 1.261(d).

FLYING TRAINING

- 4 An example FSTD training syllabus is set out in AMC FCL 1.261(d).

CERTIFICATE OF COMPLETION

- 5 Where the course is not integrated into type transition training, successful applicants shall be provided with a certificate of completion.

CROSS-CREDITING

- 6 A holder of a certificate of completion of MCC training on helicopters shall be exempted from the requirement to complete the theoretical knowledge syllabus as set out in AMC FCL 1.261(d).

AMC FCL 1.261(d)
Multi-crew co-operation course (aircraft)
(See JAR-FCL 1.261(d))
(See Appendix 1 to JAR-FCL 1.261(d))
MULTI-CREW CO-OPERATION TRAINING

Replace AMC text as follows:

Competency is a combination of knowledge, skills and attitudes required to perform a task to the prescribed standard

The objectives of MCC training are to develop the technical and non-technical components of the knowledge, skills and attitudes required to operate a multi crew aircraft.

Training should comprise both theoretical and practical elements and be designed to achieve the following competencies:

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Competency	Performance Indicators	Knowledge	Practical Exercises
Communications	<ul style="list-style-type: none"> ▪ Know what, how much and who to communicate to. ▪ Ensure the recipient is ready and able to receive the information. ▪ Pass messages and information clearly, accurately, timely and adequately. ▪ Check the other person has the correct understanding when passing important information. ▪ Listen actively, patiently and demonstrate understanding when receiving information ▪ Ask relevant and effective questions, and offer suggestions. ▪ Use appropriate body language, eye contact and tone ▪ Open and receptive to other people's view 	<ul style="list-style-type: none"> ▪ Human Factors, TEM/CRM ▪ Application of Threat and Error Management and CRM principles to training 	<p>In a commercial air transport environment, apply multi crew procedures, including principles of threat and error management and CRM to the following:</p> <ul style="list-style-type: none"> ▪ Pre-flight preparation <ul style="list-style-type: none"> - FMS initialization - Radio and navigation equipment preparation - Flight documentation - Computation of take-off performance data ▪ Take-off and climb <ul style="list-style-type: none"> - Before take-off checks - Normal take-offs - Rejected take-off - Take-offs with abnormal and emergency situations including engine-out and windshear ▪ Cruise <ul style="list-style-type: none"> - Emergency descent
Leadership and Team working	<ul style="list-style-type: none"> ▪ Friendly, enthusiastic, motivating and considerate of others ▪ Use initiative, give direction and take responsibility when required ▪ Open and honest about thoughts, concerns and intentions ▪ Give and receive criticism and praise well, and admit mistakes ▪ Confidently do and say what is important to him/her ▪ Demonstrate respect and tolerance for other people ▪ Involve others in planning and share activities fairly 	<ul style="list-style-type: none"> ▪ 	<ul style="list-style-type: none"> ▪ Descent and approach <ul style="list-style-type: none"> - Instrument flight procedures - Holding - Precision approach using raw data, - Precision approach using flight director - Precision approach using autopilot - One-engine inoperative approach - Non-precision and circling approaches - Computation of approach and landing data; - All engines go-around - Go-around with one engine inoperative; - Windshear during approach ;

Competency	Performance Indicators	Knowledge	Practical Exercises
Situation Awareness	<ul style="list-style-type: none"> ▪ Aware of what the aircraft and its systems are doing ▪ Aware of where the aircraft is and its environment ▪ Keep track of time and fuel ▪ Aware of the condition of people involved in the operation including passengers. ▪ Recognise what is likely to happen, plan and stay ahead of the game. ▪ Develop what if scenarios and make pre-decisions ▪ Identify threats to the safety of the aircraft and people 	<ul style="list-style-type: none"> ▪ 	<ul style="list-style-type: none"> ▪ Landing; <ul style="list-style-type: none"> – transition from instrument to visual flight on reaching decision altitude/height or minimum descent altitude/ height ▪ After landing and post flight procedures ▪ Selected emergency and abnormal procedures
Workload Management	<ul style="list-style-type: none"> ▪ Calm, relaxed, careful and not impulsive ▪ Prepare, prioritise and schedule tasks effectively ▪ Use time efficiently when carrying out tasks ▪ Offer and accept assistance, delegate when necessary and ask for help early ▪ Review and monitor and cross-check actions conscientiously ▪ Follow procedures appropriately and consistently. ▪ Concentrate on one thing at a time, ensure tasks are completed and does not become distracted ▪ Carry out instructions as directed 	<ul style="list-style-type: none"> ▪ 	<p>Maximum use should be made of crew briefings in all appropriate flight phases, to develop and demonstrate non-technical competencies.</p>

Competency	Performance Indicators	Knowledge	Practical Exercises
Problem Solving and Decision Making	<ul style="list-style-type: none"> Identify and verify why things have gone wrong and do not jump to conclusions or make assumptions Seek accurate and adequate information from appropriate resources Persevere in working through a problem Use and agree an appropriate decision making process. Agree essential and desirable criteria and prioritises. Consider as many options as practicable. Make decisions when they need to, reviews and changes if required Consider risks but do not take unnecessary risks. 	<ul style="list-style-type: none"> 	
Monitoring and cross checking	<ul style="list-style-type: none"> Monitor and cross checks all actions Monitor aircraft trajectory in critical flight phases Take appropriate actions in response to deviations from the flight path 	<ul style="list-style-type: none"> SOP's Aircraft systems Undesired aircraft states 	
Task Sharing	<ul style="list-style-type: none"> Apply SOP's in both PF and PNF roles Makes and responds to standard callouts 	<ul style="list-style-type: none"> PF/PNF roles SOP's 	
Use of checklists	<ul style="list-style-type: none"> Utilise checklists appropriately according to SOP's 	<ul style="list-style-type: none"> SOP's Checklist philosophy 	
Briefings	<ul style="list-style-type: none"> Construct and deliver appropriate briefings 	<ul style="list-style-type: none"> SOP's interpretation of FMS data and in-flight documentation 	
Flight Management	<ul style="list-style-type: none"> Maintain a constant awareness of the aircraft automation state Manage automation to achieve optimum trajectory and minimum workload Take effective recovery actions from automation anomalies Manage aircraft navigation, terrain clearance Manage aircraft fuel state and takes appropriate actions 	<ul style="list-style-type: none"> Understanding of aircraft performance and configuration Systems SOP's Interpretation of FMS data and in-flight documentation Minimum terrain clearance Fuel management IFR and VFR regulation 	
FMS use	<ul style="list-style-type: none"> Programmes, manages and monitors FMS in accordance with SOP's, appropriate to the FSTD 	<ul style="list-style-type: none"> Systems (FMS) SOP's related to the FSTD Automation 	

Competency	Performance Indicators	Knowledge	Practical Exercises
Systems normal operations	<ul style="list-style-type: none"> ▪ Perform and monitor normal systems operation in accordance with SOP's 	<ul style="list-style-type: none"> ▪ Systems ▪ SOP's 	
Systems abnormal and emergency operations	<ul style="list-style-type: none"> ▪ Perform and monitor abnormal systems operation in accordance with SOP's ▪ Utilise electronic and paper abnormal checklists in accordance with SOP's 	<ul style="list-style-type: none"> ▪ Systems ▪ SOP's ▪ Emergency and abnormal procedures and checklists ▪ Recall items ▪ 	
Environment, weather and ATC	<ul style="list-style-type: none"> ▪ Communicate effectively with ATC ▪ Avoid misunderstandings by requesting clarification ▪ Adhere to ATC instructions ▪ Construct a mental model of the local ATC and weather environment 	<ul style="list-style-type: none"> ▪ Systems ▪ SOP's ▪ ATC environment and phraseology ▪ Procedures for hazardous weather conditions 	

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