Based on Article 16, paragraph 3, Article 86, paragraph 1, Article 87, paragraph 5, Article 96, Article 97, paragraph 2, Article 194 paragraph 2, Article 199 paragraph 5, Article 239, Article 249, paragraph 1 and Article 265 of the Air Transport Law ("Official Gazette of RS", No 73/10, 57/11, 93/12, 45/15, 66/15 – other law, 83/18 and 9/20),

Director of the Civil Aviation Directorate of the Republic of Serbia hereby adopts

REGULATION
amending Regulation on the conditions for performing air operations

Article 1

In Regulation on the conditions for performing air operations ("Official Gazette of RS", No 9/18, 56/18, 12/19, 3/21, 54/21, 117/21 and 112/22), Article 1, paragraph 3, words: "Commission Regulation of the European Parliament and of the Council (EC) No 216/2008 of 20 February 2008 on common rules in the field of civil aviation and establishing a European Aviation Safety Agency" shall be replaced by words: "Regulation (EU) No 2018/1139 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".

Article 2

In Article 2, paragraph 1, point (7), words: "("Official Gazette of RS", No 142/20)" shall be replaced by words: "(Official Gazette of RS", No 142/20 and 130/22)".

In point (9) words: "("Official Gazette of RS", No 142/20") shall be replaced by words: "("Official Gazette of RS", No 142/20 and 130/22)".

Point (10) shall be deleted.

In point (13), words: "("Official Gazette of RS", No 5/19, 59/19 and 123/21)" shall be replaced by words: "("Official Gazette of RS", No 5/19, 50/19 and 123/21)."

In point (19), after words: "("Official Gazette of RS", No 154/20)", comma and words: "nevertheless, reference to Regulation (EU) No 2018/1139 shall be considered reference to Regulation (EC) No 216/2008 until the start of application of the said Regulation", shall be deleted.

Article 3

In Article 3, paragraph 2, full stop at the end of point (15) shall be replaced by semi colon and points (16) to (19) shall be added, worded as follows:

"(16) Commission Implementing Regulation (EU) 2020/2036 of 9 December 2020 amending Regulation (EU) No 965/2012 as regards the requirements for flight crew competence and training methods and postponing dates of application of certain measures in the context of the COVID-19 pandemic;

(17) Commission Implementing Regulation (EU) 2021/1296 of 4 August 2021 amending and correcting Regulation (EU) No 956/2012 as regards the requirements for fuel/energy planning and management, and as regards requirements on support programmes and psychological assessment of flight crew, as well as testing of psychoactive substances;

(18) Commission Implementing Regulation (EU) 2012/2237 of 15 December 2021 amending Regulation (EU) No 965/2012 as regards the requirements for all-weather operations and for flight crew training and checking;

(19) Commission Implementing Regulation (EU) 2022/2203 of 11 November amending Regulation (EU) No 965/2012 as regards the applicability of the requirements for locating an aircraft in distress.".

Article 4

In Article 4, paragraph 1, after words: "in accordance with ORO.AOC.135, paragraph (a)", words: "points (1) to (3)" shall be added.

In Article 2, point (2), semi colon at the end of point (3) shall be replaced by full stop.

Point (4) shall be deleted.

After paragraph 2, paragraph 3 shall be added, worded as follows:

"Person referred to in ORO.AOC.135 paragraph (a) point (4) who is responsible for continuing airworthiness, shall comply with the requirements laid down by the regulation governing continuing airworthiness.".

Article 5

In Addendum 1. (Commission Implementing Regulation (EU) No 965/2012 of 5 October 2012 laying down technical requirements and administrative procedures related to air operations pursuant to Regulation (EC) No 216/2008 of the European Parliament and of the Council), in Article 5, paragraph 2, point (a)(iv), shall be amended, worded as follows:

"(iv) low-visibility operations (LVOs) or operations with operational credits;".

Article 6

In Addendum 1. (Commission Regulation (EU) No 965/2012 of 5 October 2012 laying down technical requirements and administrative procedures related to air operations pursuant to Regulation (EC) No 216/2008 of the European Parliament and of the Council), in Article 9b, paragraph 2 shall be amended, worded as follows:

"The Agency shall conduct a continuous review of the effectiveness of the provisions concerning support programmes, the psychological assessment of flight crew and the systematic and random testing of psychoactive substances to ensure the medical fitness of flight crew and cabin crew members set out in Annexes II and IV. No later than 14 August 2023, the Agency shall produce a first report on the results of this review.

That review shall involve relevant expertise and shall be based on data gathered, with the assistance of Member States and the Agency, on a long-term basis.".

Article 7

In Addendum 1, Annex I (Definitions for terms used in Annexes II to VIII), after point (5), point (6) shall be added, worded as follows:

"(6) 'aerodrome operating minima' means the limits of usability of an aerodrome for:

(a) take-off, expressed in terms of runway visual range (RVR) and/or visibility and, if necessary, ceiling;

(b) landing in 2D instrument approach operations, expressed in terms of visibility and/or RVR, minimum descent altitude/height (MDA/H) and, if necessary, ceiling;

(c) landing in 3D instrument approach operations, expressed in terms of visibility and/or RVR and decision altitude/height (DA/H) as appropriate to the type and/or category of the operation;".

After point (8b), a new point (8c) shall be added, worded as follows:

"(8c) 'alternate aerodrome' means an adequate aerodrome to which an aircraft may proceed when it becomes either impossible or inadvisable to proceed to or land at the aerodrome of intended landing, where the necessary services and facilities are available, where aircraft performance requirements can be met, and which is operational at the expected time of use; 'alternate aerodrome' includes the following:

(a) 'take-off alternate aerodrome': an alternate aerodrome at which an aircraft would be able to land if it becomes necessary shortly after take-off and it is not possible to use the aerodrome of departure;

(b) 'en route alternate (ERA) aerodrome': an alternate aerodrome at which an aircraft would be able to land if a diversion becomes necessary while en route;

(c) 'fuel/energy en route alternate (fuel/energy ERA) aerodrome' means an ERA aerodrome that is required at the planning stage for use in the calculation of fuel/energy;

(d) 'destination alternate aerodrome': an alternate aerodrome at which an aircraft would be able to land if it becomes either impossible or inadvisable to land at the aerodrome of intended landing;".

Point (11) and points (13) to (16) shall be deleted.

After point (18), point (18a) shall be added, worded as follows:

"(18a) 'ceiling' means the height above the ground or water of the base of the lowest layer of cloud below 6 000 m (20 000 ft) covering more than half the sky;".

Point (20) shall be amended, worded as follows:

"(20) 'circling' means the visual phase of a circling approach operation;".

After point (20), point (20a) shall be added, worded as follows:

"(20a) 'circling approach operation' means a Type A instrument approach operation to bring an aircraft into the position for landing on a runway/final approach and take-off area (FATO) that is not suitably located for a straight-in approach;".

After point (23), points (23a), (23b) and (23c) shall be added, worded as follows:

"(23a) 'competency' means a dimension of human performance that is used to reliably predict successful performance on the job and which is manifested and observed through behaviours that mobilise the relevant knowledge, skills and attitudes to carry out activities or tasks under specified conditions;

(23b) 'competency-based training' means assessment and training programmes that are characterised by a performance orientation, emphasis on standards of performance and their measurement and the development of training to the specified performance standards;

(23c) 'competency framework' means a complete set of identified competencies that are developed, trained and assessed in the operator's evidence-based training programme utilising scenarios that are relevant to operations and which is wide enough to prepare the pilot for both foreseen and unforeseen threats and errors;".

Points (26) and (27) shall be amended, worded as follows:

“(26) ‘contingency fuel-energy’ means the fuel/energy required to compensate for unforeseen factors that could have an influence on the fuel/energy consumption to the destination aerodrome;

(27) ‘continuous descent final approach (CDFA)’ means a technique, consistent with stabilised approach procedures, for flying the final approach segment (FAS) of an instrument non-precision approach (NPA) procedure as a continuous descent, without level-off, from an altitude/height at or above the final approach fix altitude/height;

(a) for straight-in approach operations, to a point approximately 15 m (50 ft) above the landing runway threshold or the point where the flare manoeuvre begins; or

(b) for circling approach operations, until MDA-H or visual flight manoeuvre altitude/height is reached;”.

After point (31), point (31a) shall be added, worded as follows:

“(31a) ‘current fuel/energy scheme’ means the approved fuel-energy scheme that is currently used by the operator;”.

After point (35), point (35a) shall be added, worded as follows:

“(35a) ‘decision altitude (DA) or decision height (DH)’ means a specified altitude or height in a 3D instrument approach operation at which a missed approach procedure must be initiated if the required visual reference to continue the approach has not been established;”.

After point (42c), point (42d) shall be added, worded as follows:

“(42d) ‘EBT module’ means a combination of sessions in a qualified simulation training device as part of the 3-year period of recurrent assessment and training;”.

Point (46) shall be amended, worded as follows:

“(46) ‘enhanced flight vision system (EFVS)’ is an electronic means to provide the flight crew with a real-time sensor-derived or enhanced display of the external scene topography (the natural or man-made features of a place or region especially in a way to show their relative positions and elevation) through the use of imaging sensors; an EFVS is integrated with a flight guidance system and is implemented on a head-up display or an equivalent display system; if an EFVS is certified according to the applicable airworthiness requirements and an operator holds the necessary specific approval (when required), then it may be used for EFVS operations and may allow operations with operational credits;”.

After point (46), points (46a) and (46b) shall be added, worded as follows:

“(46a) ‘EFVS operation’ means an operation in which visibility conditions require an EFVS to be used instead of natural vision in order to perform an approach or landing, identify the required visual references or conduct a roll-out;

(46b) ‘EFVS 200 operation’ means an operation with an operational credit in which visibility conditions require an EFVS to be used down to 200 ft above the FATO or runway threshold. From that point to land, natural vision is used. The RVR shall not be less than 550 m;”.

Point (47) shall be amended, worded as follows:

“(47) ‘enhanced vision system (EVS)’ is an electronic means to provide the flight crew with a real-time image of the actual external scene topography (the natural or man-made features if a place or region especially in a way to show their relative positions and elevation) through the use of imaging sensors;”.

After point (47), points (47a) to (47f) shall be added, worded as follows:

“(47a) ‘enrolment’ means the administrative action carried out by the operator where a pilot participates in the operator’s EBT programme;

(47b) ‘enrolled pilot’ means the pilot that participates in the EBT recurrent training programme;

(47c) ‘equivalency of approaches’ means all the approaches that place an additional demand on a proficient crew regardless of whether they are used or not in the EBT modules;

(47d) ‘equivalency of malfunctions’ means all the malfunctions that put a significant demand on a proficient crew regardless of whether they are used or not in the EBT modules;

(47e) ‘evaluation phase’ means one of the phases of an EBT module which is a line-orientated flight scenario, representative of the operator’s environment during which there are one or more occurrences to evaluate key elements of the defined competency framework;

(47f) ‘evidence-based training (EBT)’ means assessment and training based on operational data that is characterised by developing and assessing the overall capability of a pilot across a range of competencies (competency framework) rather than by measuring the performance in individual events or manoeuvres;”.

After point (48a), point (48b) shall be added, worded as follows:

“(48b) ‘final approach segment (FAS)’ means that segment of an instrument approach procedure (IAP) in which alignment and descent for landing are accomplished;”.

After point (49c), points (49d) and (49e) shall be added, worded as follows:

“(49d) ‘flight following’ means the recording in real time of departure and arrival message by operational personnel to ensure that a flight is operating and has arrived at the destination aerodrome or an alternate aerodrome;

(49e) ‘flight monitoring’ means, in addition to the requirements defined for flight following:

(a) operational monitoring of flights by suitably qualified operational-control personnel from departure throughout all phases of the flight;

(b) communication of all available and relevant safety information between the operational-control personnel on the ground and the flight crew; and

(c) critical assistance to the flight crew in the event of an in-flight emergency or security issue, or at the request of the flight crew;”.

After point (50), points (50a) and (50b) shall be added, worded as follows:

“(50a) ‘flight time’ means:

(a) for aeroplanes, the total time from the moment an aeroplane first moves for the purpose of taking off until the moment the aeroplane finally comes to rest at the end of the flight;

(b) for helicopters, the total time between the moment a helicopter’s rotor blades start turning for the purpose of taking off until the moment the helicopter finally comes to rest at the end of the flight, and the rotor blades are stopped;

(50b) ‘flight watch’ means, in addition to all elements defined for ‘flight monitoring’, the active tracking of a flight by suitably qualified operational-control personnel throughout all phases of the flight to ensure that the flight is following its prescribed route without unplanned deviations, diversions or delays;”.

Point (51) shall be deleted.

After point (52), point (52a) shall be added, worded as follows:

“(52a) ‘go-around’ means a transition from an approach operation to a stabilised climb. This includes manoeuvres conducted at or above the MDA/H or DA/H, or below the DA/H (balked landings);”.

Point (55) shall be amended, worded as follows:

“(55) ‘head-up display landing system (HUDLS)’ means the total airborne system which provides head-up guidance to the pilot to enable the pilot to either control the aircraft or to monitor the autopilot during take-off (if applicable), approach and landing (and roll-out if applicable), or go-around. It includes all sensors, computers, power supplies, indications and controls;”.

Point (56) shall be deleted.

After point (96a), points (69b), (69c), (69d) and (69e) shall be added, worded as follows:

“(69b) ‘in-seat instruction’ means a technique used in the manoeuvres training phase or the scenario-based training phase, where the instructions can:

(a) provide simple instructions to one pilot; or

(b) perform predetermined exercises acting, in a pilot seat, as pilot flying (PF) or pilot monitoring (PM) for:

(1) the demonstration of techniques; and/or

(2) triggering the other pilot to intervene or interact;

(69c) ‘instructor concordance’ means the consistency or stability of scores between different EBT instructors which gives a score (or scores) of how much homogeneity, or consensus, there is in the ratings given by instructors (raters);

(69d) ‘instrument approach operation’ means an approach and landing using instruments for navigation guidance based on an instrument approach procedure (IAP). There are two methods for executing instrument approach operations:

(a) a two-dimensional (2D) instrument approach operation, using lateral navigation guidance only; and

(b) a three-dimensional (3D) instrument approach operation, using both lateral and vertical navigation guidance;

(69e) ‘instrument approach procedure (IAP)’ means a series of predetermined manoeuvres by reference to flight instruments with specified protection from obstacles from the initial approach fix or, where applicable, from the beginning of a defined arrival route to a point from which a landing can be completed and thereafter, if a landing is not completed, to a position at which holding or en-route obstacle clearance criteria apply. IAPs are classified as follows:

(a) non-precision approach (NPA) procedure, which means an IAP designed for 2D instrument approach operations Type A;

(b) approach procedure with vertical guidance (APV) means a performance-based navigation (PBN) IAP designed for 3D instrument approach operations Type A;

(c) precision approach (PA) procedure means an IAP based on navigation systems designed for 3D instrument approach operations Type A or B;”.

After point (72), points (72a) and (72b) shall be added, worded as follows:

“(72a) ‘line-orientated flight scenario’ means the assessment and training involving a realistic, ‘real-time’, full mission simulation of scenarios that are representative of line operations;

(72b) ‘line check’ means a check conducted by the operator and completed by the pilot or the technical crew member to demonstrate competence in carrying out normal line operations described in the operations manual;”.

Points (73), (74) and (75) shall be amended, worded as follows:

“(73) ‘local helicopter operation (LHO)’ means a commercial air transport operation of helicopters with a maximum certified take-off mass (MCTOM) over 3 175 kg and a maximum operational passenger seating configuration (MOPSC) if nine or less, by day, over routes navigated by reference to visual landmarks, conducted within a local and defined geographical area specified in the operations manual;

(74) ‘low-visibility operations (LVOs)’ means approach or take-off operations on a runway with a runway visual range less than 550 m or with a decision height less than 200 ft;

(75) ‘low-visibility take-off (LVTO)’ means a take-off with an RVR less than 550 m;”.

Point (76) shall be deleted.

After point (76a), point (76b) and (76c) shall be added, worded as follows:

“(76b) ‘manoeuvres training phase’ means a phase of an EBT module during which, according to aircraft generation, crews have time to practice and improve performance in largely psychomotor skill-based exercises by achieving a prescribed flight path or performing a prescribed event to a prescribed outcome;

(76c) ‘mixed EBT programme’ means an operator’s recurrent training and checking programme as per ORO.FC.230, a portion of which is dedicated to the application of ET but which does not replace proficiency checks as per Appendix 9 to Annex I (Part-FCL) to Regulation (EU) No 1178/2011;”.

After point (78b), point (78c) shall be added, worded as follows:

“(78c) ‘minimum descent altitude (MDA) or minimum descent height (MDH)’ means a specified altitude or height in a 2D instrument approach operation or circling approach operation below which descent must not be made without the required visual reference;”.

Point (83) shall be deleted.

After point (85), point (85a) shall be added, worded as follows:

“(85a) ‘obstacle clearance altitude (OCA) or obstacle clearance height (OCH)’ means the lowest altitude or the lowest height above the elevation of the relevant threshold or the aerodrome elevation, as applicable, used in establishing compliance with the appropriate obstacle clearance criteria;”.

After point (91), point (91a) shall be added, worded as follows:

“(91a) ‘operational credit’ means a credit for operations with advanced aircraft enabling lower aerodrome operating minima than would normally be established by the operator for a basic aircraft, based upon performance of advanced aircraft systems utilising the available external infrastructure. Lower operating minima may include a lower decision height/altitude or minimum descent height/altitude, reduced visibility requirements or reduced ground facilities or a combination of these;”.

Point (92) shall be amended as follows:

“(92) ‘operator proficiency check’ means a check conducted by the operator and completed by the pilot or the technical crew member to demonstrate competence in carrying our normal, abnormal and emergency procedures;”.

After point (98), anew point (98a) shall be added, worded as follows:

“(98a) ‘proficient’ means having demonstrated the necessary skills, knowledge and attitudes that are required to perform any defined tasks to the prescribe standard;”.

Existing point (98a) shall become point (98b).

Point (104a) shall be added, worded as follows:

“(104a) ‘safe landing’ means, in the context of the fuel energy policy or fuel/energy schemes, a landing at an adequate aerodrome or operating site with no less than the final reserve fuel/energy remaining and in compliance with the applicable operational procedures and aerodrome operating minima;”.

After point (105a), point (105b) shall be added, worded as follows:

“(105b) ‘scenario-based training phase’ means a phase of an EBT module which focuses on the development of competencies, whilst the pilot is trained to mitigate the most critical risks

identified for the aircraft generation. It should include the management of specific operator's threats and errors in a real-time line-oriented environment;".

After point (120b), points (120c), (120d) and (120e) shall be added, worded as follows:

"(120c) 'training to proficiency' means training designed to achieve end-state performance objectives, providing sufficient assurance that the trained individual is capable of consistently carrying out specific tasks safely and effectively;

(120d) 'type A instrument approach operation' means an instrument approach operation with an MDH or a DH at or above 250 ft;

(120e) 'type B instrument approach operation' means an operation with a DH below 250 ft. Type B instrument approach operations are categorised as:

(a) Category I (CAT I): a DH not lower than 200 ft and with either a visibility not less than 800 m or an RVR not less than 550 m;

(b) Category II (CAT II): a DH lower than 200 ft but not lower than 100 ft, and an RVR not less than 300 m;

(c) Category III (CAT III): a DH lower than 100 ft or no DH, and an RVR less than 300 m or no RVR limitation;".

After point (124), point (124a) shall be added, worded as follows:

"(124a) 'visibility (VIS)' means visibility for aeronautical purposes, which is the greater of:

(a) the greatest distance at which a black object of suitable dimensions, situated near the ground, can be seen and recognised when observed against a bright background; and

(b) the greatest distance at which lights in the vicinity of 1 000 candelas can be seen and identified against an unlit background;".

Points (125) and (126) shall be amended, worded as follows:

"(125) 'visual approach operation' means an approach operation by an IFR flight when either a part or all parts of an IAP is (are) not completed and the approach operation is executed with visual reference to terrain;

(126) 'weather permissible aerodrome' means an adequate aerodrome where, for the anticipated time of use, meteorological reports, or forecasts, or any combination thereof, indicate that the meteorological conditions will be at or above the required aerodrome operating minima, and the runway surface condition reports indicate that the safe landing will be possible;".

Article 8

In Article 1, Annex II (Authority requirements for air operations (Part-ARO)), Subpart OPS (Air operations), Section II (Approvals), point ARO.OPS.225 (Approval of fuel/energy schemes) shall be amended, worded as follows:

"**ARO.OPS.225 Approval of fuel/energy schemes**

(a) The competent authority shall approve the fuel/energy scheme proposed by a CAT operator if the operator demonstrates compliance with all applicable requirements laid down in this Regulation related to fuel/energy for aeroplanes or helicopters involved in CAT.

(b) The competent authority shall assess and oversee the fuel/energy planning and in-flight re-planning, selection of aerodrome and, in-flight fuel/energy management policies associated with the fuel/energy schemes, together with the processes supporting the implementation of these fuel/energy schemes.

(c) In addition to points (a) and (b), when approving individual fuel/energy schemes, the competent authority shall:

(1) verify that the operator has demonstrated the baseline safety performance of the current fuel/energy scheme;

(2) assess the capability of the operator to support the implementation of the proposed individual fuel/energy scheme; the following elements shall be considered as a minimum:

(i) the operator's management system,

(ii) the operator's operational capabilities;

(3) verify that the operator's safety risk assessment that supports the proposed individual fuel/energy scheme achieves an equivalent level of safety to that of the current fuel/energy scheme; and

(4) establish an oversight plan to carry out periodic assessments of the approved individual fuel/energy scheme to verify compliance of the scheme or decide whether the scheme should be amended or revoked.

(d) The approval referred to in point CAT.OP.MPA.182 (d)(2) shall include a list of the isolated aerodromes that are specified by the operator for each aircraft type to which the approval applies.

(e) Without prejudice to points ARO.GEN.120 (d) and (e), the competent authority shall notify the Agency of the start of the evaluation of an alternative means of compliance related to fuel/energy schemes.".

After point ARO.OPS.225 (Approval of fuel/energy scheme), a new point ARO.OPS.226 shall be added worded as follows:

"**ARO.OPS.226 Approval and oversight of evidence-based training programmes**

(a) Where a competent authority grants an approval for EBT programmes, inspectors must receive qualification and training in EBT principles, application, approval processes and continuing oversight.

(b) The competent authority shall assess and oversee the EBT programme, together with the processes that support the implementation of the EBT programme and its effectiveness.

(c) Upon receiving an application for the approval of an EBT programme, the competent authority shall:

(1) ensure the resolution of level 1 findings in the areas that will support the application of the EBT programme;

(2) assess the capability of the operator to support the implementation of the EBT programme. The following elements shall be considered as a minimum:

(i) the maturity and capability of the operator's management system in the areas that will support the application of the EBT programme — in particular, flight crew training;

(ii) the operator's EBT programme suitability — the EBT programme shall correspond to the size of the operator, and the nature and complexity of its activities, taking into account the hazards and associated risks inherent in those activities;

(iii) the adequacy of the operator's record-keeping system, in particular with regard to flight crew training, checking and qualifications records in particular ORO.GEN.220 and ORO.MLR.115 points (c) and (d);

(iv) the suitability of the operator's grading system to assess the pilot competencies;

(v) the competence and the experience of the instructors and other personnel involved in the EBT programme in the use of the processes and procedures that support the implementation of the EBT programme; and

(vi) the operator's EBT implementation plan and a safety risk assessment supporting the EBT programme in order to demonstrate how an equivalent level of safety to that of the current training programme can be achieved.".

(d) The competent authority shall grant an EBT programme approval when the assessment concludes that the compliance with at least ORO.FC.146, ORO.FC.231, and ORO.FC.232 is ensured.

(e) Without prejudice to ARO.GEN.120 (d) and (e), the competent authority shall notify the Agency when it starts the evaluation of an alternative means of compliance related to EBT.".

Article 9

In Addendum 1, Annex II (Authority requirements for air operations (Part-ARO)), Appendix II (Operations specifications) shall be replaced by a new Appendix II, provided in Addendum 1, printed with this Regulation and forming an integral part thereof.

Article 10

In Addendum 1, Annex III (Organisation requirements for air operations (Part-ORO)), Subpart FC (Flight crew), Section 1 (Common requirements), point ORO.FC.100 (Composition of flight crew), after paragraph (e), paragraph (f) shall be added, worded as follows:

"(f) Specific requirements for helicopter operations

If the helicopter is operated with a crew of two pilots, each pilot shall either:

(1) hold a certificate of satisfactory completion of a multi-crew cooperation (MCC) course in helicopters in accordance with Regulation (EU) No 1178/2011; or

(2) have at least 500 hours of flight time as a pilot in multi-pilot operations."

Point ORO.FC.105 (Designation as pilot-in-command/commander) shall be amended, worded as follows:

"**ORO.FC.105 Designation as pilot-in-command/commander**

(a) In accordance with point 8.6 of Annex V to Regulation (EU) 2018/1139, one pilot amongst the flight crew, qualified as pilot-in-command in accordance with Annex I (Part-FCL) to Regulation (EU) No 1178/2011, shall be designated by the operator as pilot-in-command or, for commercial air transport operations, as commander.

(b) The operator shall only designate a flight crew member to act as pilot-in-command/commander if all of the following apply:

(1) the flight crew member has the minimum level of experience specified in the operations manual;

(2) the flight crew member has adequate knowledge of the route or area to be flown and of the aerodromes, including alternate aerodromes, facilities and procedures to be used;

(3) in the case of multi-crew operations, the flight crew member has completed an operator's command course if upgrading from co-pilot to pilot-in-command/commander.

(c) In the case of commercial operations of aeroplanes and helicopters, the pilot-in-command/commander or the pilot to whom the conduct of the flight may be delegated shall have had initial familiarisation training on the route or area to be flown and on the aerodromes, facilities and procedures to be used and shall maintain this knowledge as follows:

(1) The validity of the aerodrome knowledge shall be maintained by operating at least once on the aerodrome within a 12 calendar months' period.

(2) The route or area knowledge shall be maintained by operating at least once to the route or area within a 36 months' period. In addition, refresher training is required regarding route or area knowledge if not operating on a route or area for 12 months within the 36-month period.

(d) Notwithstanding point (c), in the case of operations under VFR by day with performance class B and C aeroplanes and helicopters, familiarisation training on the route and aerodromes may be replaced by area familiarisation training.".

Point ORO.FC.125 (Differences, training, familiarisation, equipment and procedure training) shall be amended, worded as follows:

"**ORO.FC.125 Differences training, familiarisation, equipment and procedure training**

(a) Flight crew members shall complete differences training or familiarisation when required by Annex I (Part-FCL) to Regulation (EU) No 1178/2011.

(b) Flight crew members shall complete equipment and procedure training when changing equipment or changing procedures requiring additional knowledge on types or variants currently operated.

(c) The operations manual shall specify when such differences training or familiarisation or equipment and procedure training is required.".

In point ORO.FC.130 (Recurrent training and checking), paragraph (a) shall be amended, worded as follows:

"(a) Each flight crew member shall complete annual recurrent flight and ground training relevant to the type or variant, and associated equipment of aircraft on which he or she operates, including training on the location and use of all emergency and safety equipment carried on board the aircraft.".

Point ORO.FC.140 (Operation on more than one type or variant) or point ORO.FC.145 (Provision of training, checking and assessment) shall be amended, worded as follows:

"**ORO.FC.140 Operation on more than one type or variant**

(a) Flight crew members that operate more than one type or variant of aircraft shall comply with the requirements prescribed in this Subpart for each type or variant, unless credits related to the training, checking, and recent experience requirements are defined in the mandatory part of the operational suitability data established in accordance with Regulation (EU) No 748/2012 for the relevant types or variants.

(b) The operator may define groups of single-engined helicopter types. An operator proficiency check on one type shall be valid for all the other types within the group if both of the following conditions are met:

(1) the group either includes only single-engined turbine helicopters operated under VFR or it includes only single-engined piston helicopters operated under VFR;

(2) for CAT operations, at least two operator proficiency checks per type shall be conducted within a 3-year cycle.

(c) For specialised operations, elements of the aircraft/FSTD training and operator proficiency check that cover the relevant aspects associated with the specialised task and are not

related to the type or group of types may be credited towards the other groups or types, based on a risk assessment performed by the operator.

(d) For operations on more than one helicopter type or variant that are used for conducting sufficiently similar operations, if line checks rotate between types or variants, each line check shall revalidate the line check for the other helicopter types or variants.

(e) Appropriate procedures and any operational restrictions shall be specified in the operations manual for any operation on more than one type or variant.

ORO.FC.145 Provision of training, checking and assessment

(a) All training, checking and assessment required in this Subpart shall be conducted in accordance with the training programmes and syllabi established by the operator in the operations manual;

(b) When establishing the training programmes and syllabi, the operator shall include the relevant elements defined in the mandatory part of the operational suitability data established in accordance with Regulation (EU) No 748/2012.

(c) In the case of CAT operations, training and checking programmes, including syllabi and the use of the means to deliver the programme such as individual flight simulation training devices (FSTDs) and other training solutions, shall be approved by the competent authority.

(d) The FSTD used to meet the requirements of this Subpart shall be qualified in accordance with Regulation (EU) No 1178/2011 and it shall replicate the aircraft used by the operator, as far as practicable. Differences between the FSTD and the aircraft shall be described and addressed through a briefing or training, as appropriate.

(e) The operator shall establish a system to adequately monitor changes to the FSTD and to ensure that those changes do not affect the adequacy of the training programmes.

(f) The operator shall monitor the validity of each recurrent training and checking.

(g) The validity periods required in this Subpart shall be counted from the end of the month in which the recency, training or check was completed.”.

After point ORO.FC.145 (Providing of training, checking and assessment), a new point ORO.FC.146 shall be added, worded as follows:

“**ORO.FC.146 Personnel providing training, checking and assessment**

(a) All training, checking and assessment required in this Subpart shall be conducted by appropriately qualified personnel.

(b) In the case of flight and flight simulation training, checking and assessment, the personnel that provide the training and conduct the checking or assessment shall be qualified in accordance with Annex I (Part-FCL) to Regulation (EU) No 1178/2011. Additionally, the personnel providing training and conducting checking towards specialised operations shall be suitably qualified for the relevant operation.

(c) For an EBT programme, the personnel that performs assessment and provides training shall:

(1) hold an Annex I (Part-FCL) instructor or examiner certificate;

(2) complete the operator's EBT instructor standardisation programme. This shall include an initial standardisation programme and a recurrent standardisation programme.

Completion of the operator's EBT initial standardisation will qualify the instructor to perform EBT practical assessment.

(d) Notwithstanding point (b), the line evaluation of competence may be conducted by a suitably qualified commander nominated by the operator that is standardised in EBT concepts and the assessment of competencies (line evaluator).

(e) Notwithstanding point (b), the aircraft/FSTD training and the operator proficiency check may be conducted by a suitably qualified commander holding a FI/TRI/SFI certificate and nominated by the operator for any of the following operations:

(1) CAT operations of helicopters meeting the criteria defined in point ORO.FC.005(b)(2);

(2) CAT operations of other than complex motor-powered helicopters by day and over routes navigated by reference to visual landmarks;

(3) CAT operations of performance class B aeroplanes that do not meet the criteria defined in point ORO.FC.005(b)(1).

(f) Notwithstanding point (b), the aircraft/FSTD training and the demonstration of competence/operator proficiency check may be conducted by a suitably qualified pilot-in-command/commander nominated by the operator for any of the following operations:

(1) specialised operations;

(2) CAT operations of aeroplanes meeting the criteria defined in point ORO.FC.005(b)(2).

(g) Notwithstanding point (b), the line check may be conducted by a suitably qualified commander nominated by the operator.

(h) The operator shall inform the competent authority about the persons nominated under points (e) to (g).".

Article 11

In Addendum 1, Annex III (Organisation requirements for air operations (Part-ORO)), in Subpart FC (Flight crew), in Section 2 (Additional requirements for commercial sir transport operations), point ORO.FC.200 (Composition of flight crew), paragraph (d) shall be amended, worded as follows:

"(d) Specific requirements for helicopter operations

For all operations of helicopters with an MOPSC of more than 19 and for operations under IFR of helicopters with an MOPSC of more than 9, the minimum flight crew shall be two pilots.".

In point ORO.FC.202 (Single-pilot operations under IFR or at night), in initial sentence, words: "as referred to in ORO.FC.200 paragraph (c), point (2) and paragraph (d), point (2)" and comma shall be deleted.

Point (b) shall be amended, worded as follows:

"(b) INTENTIONALLY LEFT BLANK.".

In point ORO.FC.220 (Operator conversion training and checking), paragraph (b) shall be amended, worded as follows:

"(b) Once an operator conversion course has been commenced, the flight crew member shall not be assigned to flying duties on another type or class of aircraft until the course is completed or terminated. Crew members operating only performance class B aeroplanes may be assigned to flights on other types of performance class B aeroplanes during conversion courses to the extent necessary to maintain the operation. Crew members may be assigned to flights on single-engined helicopters during an operator conversion course on a single-engined helicopter, provided that the training is unaffected.".

After paragraph (e), paragraph (f) shall be added, worded as follows:

"(f) if operational circumstances, such as applying for a new AOC or adding a new aircraft type or class to the fleet, do not allow the operator to comply with the requirements in (d), the operator may develop a specific conversion course, to be used temporarily for a limited number of pilots.".

Point ORO.FC.230 (Recurrent training and checking) shall be amended, worded as follows:

"**ORO.FC.230 Recurrent training and checking**

(a) Each flight crew member shall complete recurrent training and checking relevant to the type or variant, and associated equipment of aircraft on which they operate.

(b) Operator proficiency check

(1) Each flight crew member shall complete operator proficiency checks as part of the normal crew complement.

(2) When the flight crew member will be required to operate under IFR, the operator proficiency check shall be conducted without external visual reference, as appropriate.

(3) The validity period of the operator proficiency check shall be 6 calendar months. For operations under VFR by day of performance class B aeroplanes that are conducted during seasons not longer than 8 consecutive months, one operator proficiency check shall be sufficient. The proficiency check shall be undertaken before commencing CAT operations.

(c) Line check

Each flight crew member shall complete a line check on the aircraft. The validity period of the line check shall be 12 calendar months.

(d) Emergency and safety equipment training and checking

Each flight crew member shall complete recurrent training and checking on the location and use of all emergency and safety equipment carried on board the aircraft. The validity period of an emergency and safety equipment training and checking shall be 12 calendar months.

(e) CRM training

(1) Elements of CRM shall be integrated into all appropriate phases of the recurrent training.

(2) Each flight crew member shall undergo specific modular CRM training. All major topics of CRM training shall be covered by distributing modular training sessions as evenly as possible over each 3-year period.

(f) Each flight crew member shall undergo ground training and flight training in an FSTD or an aircraft, or a combination of FSTD and aircraft training, at least every 12 calendar months.”.

After point ORO.FC.230 (Recurrent training and checking), new points ORO.FC.231 and ORO.FC.232, shall be added, worded as follows:

“**ORO.FC.231 Evidence-based training**

(a) EBT PROGRAMME

(1) The operator may substitute the requirements of ORO.FC.230 by establishing, implementing and maintaining a suitable EBT programme approved by the competent authority.

The operator shall demonstrate its capability to support the implementation of the EBT programme (including an implementation plan) and perform a safety risk assessment demonstrating how an equivalent level of safety is achieved.

(2) The EBT programme shall:

(i) correspond to the size of the operator, and the nature and complexity of its activities, taking into account the hazards and associated risks inherent in those activities;

(ii) ensure pilot competence by assessing and developing pilot competencies required for a safe, effective and efficient operation of aircraft;

(iii) ensure that each pilot is exposed to the assessment and training topics derived in accordance with ORO.FC.232;

(iv) include at least six EBT modules distributed across a 3-year programme; each EBT module shall consist of an evaluation phase and a training phase. The validity period of a EBT module shall be 12 months;

(A) The evaluation phase comprises a line-orientated flight scenario (or scenarios) to assess all competencies and identify individual training needs.

(B) The training phase comprises:

(a) the manoeuvres training phase, comprising training to proficiency in certain defined manoeuvres;

(b) the scenario-based training phase, comprising a line-orientated flight scenario (or scenarios) to develop competencies and address individual training needs.

The training phase shall be conducted in a timely manner after the evaluation phase.

(3) The operator shall ensure that each pilot enrolled in the EBT programme completes:

(i) a minimum of two EBT modules within the validity period of the type rating, separated by a period of not less than 3 months. The EBT module is completed when:

(A) the content of the EBT programme is completed for that EBT module (exposure of the pilot to the assessment and training topics); and

(B) an acceptable level of performance in all observed competencies has been demonstrated;

(ii) line evaluation(s) of competence; and

(iii) ground training.

(4) The operator shall establish an EBT instructor standardisation and concordance assurance programme to ensure that the instructors involved in EBT are properly qualified to perform their tasks.

(i) All instructors must be subject to this programme;

(ii) The operator shall use appropriate methods and metrics to assess concordance;

(iii) The operator shall demonstrate that the instructors have sufficient concordance.

(5) The EBT programme may include contingency procedures for unforeseen circumstances that could affect the delivery of the EBT modules. The operator shall demonstrate the need for those procedures. The procedures shall ensure that a pilot does not continue line operations if the performance observed was below the minimum acceptable level. They may include:

(i) a different separation period between EBT modules; and

(ii) different order of the phases of the EBT module.

(b) COMPETENCY FRAMEWORK

The operator shall use a competency framework for all aspects of assessment and training within an EBT programme. The competency framework shall:

(1) be comprehensive, accurate, and usable;

(2) include observable behaviours required for safe, effective and efficient operations;

(3) include a defined set of competencies, their descriptions and their associated observable behaviours.

(c) TRAINING SYSTEM PERFORMANCE

(1) The EBT system performance shall be measured and evaluated through a feedback process in order to:

(i) validate and refine the operator's EBT programme;

(ii) ascertain that the operator's EBT programme develops pilot competencies.

(2) The feedback process shall be included in the operator's management system.

(3) The operator shall develop procedures governing the protection of EBT data.

(d) GRADING SYSTEM

(1) The operator shall use a grading system to assess the pilot competencies. The grading system shall ensure:

(i) a sufficient level of detail to enable accurate and useful measurements of individual performance;

(ii) a performance criterion and a scale for each competency, with a point on the scale which determines the minimum acceptable level to be achieved for the conduct of line operations. The operator shall develop procedures to address low performance of the pilot;

(iii) data integrity;

(iv) data security.

(2) The operator shall verify at regular intervals the accuracy of the grading system against a criterion-referenced system.

(e) SUITABLE TRAINING DEVICES AND VOLUME OF HOURS TO COMPLETE THE OPERATOR'S EBT PROGRAMME

(1) Each EBT module shall be conducted in an FSTD with a qualification level adequate to ensure the correct delivery of the assessment and training topics.

(2) The operator shall provide a sufficient volume of hours in the suitable training device for the pilot to complete the operator's EBT programme. The criteria to determine the volume of the EBT programme are as follows:

(i) The volume corresponds to the size and complexity of the EBT programme;

(ii) The volume is sufficient to complete the EBT programme;

(iii) The volume ensures an effective EBT programme taking into account the recommendations provided by ICAO, the Agency, and the competent authority;

(iv) The volume corresponds to the technology of the training devices used.

(f) EQUIVALENCY OF MALFUNCTIONS

(1) Each pilot shall receive assessment and training in the management of aircraft system malfunctions.

(2) Aircraft system malfunctions that place a significant demand on a proficient crew shall be organised by reference to the following characteristics:

(i) immediacy;

(ii) complexity;

(iii) degradation of aircraft control;

(iv) loss of instrumentation;

(v) management of consequences.

(3) Each pilot shall be exposed to at least one malfunction for each characteristic at the frequency determined by the table of assessment and training topics.

(4) Demonstrated proficiency in the management of one malfunction is considered equivalent to demonstrated proficiency in the management of other malfunctions with the same characteristics.

(g) EQUIVALENCY OF APPROACHES RELEVANT TO OPERATIONS

(1) The operator shall ensure that each pilot receives regular training in the conduct of approach types and approach methods relevant to operations.

(2) This training shall include approaches that place an additional demand on a proficient crew.

(3) This training shall include the approaches that require specific approval in accordance with Annex V (Part- SPA) to this Regulation.

(h) LINE EVALUATION OF COMPETENCE

(1) Each pilot shall periodically undertake a line evaluation of competence in an aircraft to demonstrate the safe, effective and efficient conduct of normal line operations described in the operations manual.

(2) The validity period of a line evaluation of competence shall be 12 months.

(3) The operator approved for EBT may, with the approval of the competent authority, extend the validity of the line evaluation of competence to:

(i) either 2 years, subject to a risk assessment;

(ii) or 3 years, subject to a feedback process for the monitoring of line operations which identifies threats to the operations, minimises the risks of such threats, and implements measures to manage human error in the operations.

(4) For successful completion of the line evaluation of competence, the pilot shall demonstrate an acceptable level of performance in all observed competencies.

(i) GROUND TRAINING

(1) Every 12 calendar months, each pilot shall undergo:

(i) technical ground training;

(ii) assessment and training on the location and use of all emergency and safety equipment carried on the aircraft.

(2) The operator may, with the approval of the competent authority and subject to a risk assessment, extend the period of assessment and training on the location and use of all emergency and safety equipment carried on the aircraft to 24 months.

ORO.FC.232 EBT programme assessment and training topics

(a) The operator shall ensures that each pilot is exposed to the assessment and training topics.

(b) The assessment and training topics shall be:

(1) derived from safety and operational data that are used to identify the areas for improvement and prioritisation of pilot training to guide in the construction of suitable EBT programmes;

(2) distributed across a 3-year period at a defined frequency;

(3) relevant to the type or variant of aircraft on which the pilot operates.".

Point ORO.FC.235 (Pilot qualification to operate in either pilot's seat) shall be amended worded as follows:

"**ORO.FC.235 Pilot qualification to operated in either pilot's seat- aeroplanes**

(a) Commanders of aeroplanes whose duties require them to operate in either pilot's seat and carry out the duties of a co-pilot, or commanders required to conduct training or checking duties shall complete additional training and checking to ensure that they are proficient in conducting the relevant normal, abnormal and emergency procedures from either seat. Such training and checking shall be specified in the operations manual. The checking may be conducted together with the operator proficiency check prescribed in ORO.FC.230(b) or in the EBT programme prescribed in ORO.FC.231.

(b) The additional training and checking shall include at least the following:

(1) an engine failure during take-off;

(2) a one-engine-inoperative approach and go-around; and

(3) a one-engine-inoperative landing.

(c) The validity period shall be 12 calendar months. For operators with an approved EBT programme, the validity is determined by the assessment and training topics in accordance with ORO.FC.232.

(d) When operating in the co-pilot's seat, the checks required by ORO.FC.230 or the assessment and training required by ORO.FC.231 for operating in the commander's seat shall, in addition, be valid and current.

(e) The pilot relieving the commander shall have demonstrated, concurrent with the operator proficiency checks prescribed in ORO.FC.230(b) or the assessment and training required by ORO.FC.231, practice of drills and procedures that would not normally be his or her responsibility. Where the differences between left- and right-hand seats are not significant, practice may be conducted in either seat.

(f) The pilot, other than the commander, occupying the commander's seat shall demonstrate practice of drills and procedures, concurrent with the operator proficiency checks prescribed in ORO.FC.230(b) or the assessment and training required by ORO.FC.231, which are the commander's responsibility acting as pilot monitoring. Where the differences between left- and right-hand seats are not significant, practice may be conducted in either seat."

After point ORO.FC.235 (Pilot qualification to operate in either pilot's seat), a new point ORO.FC.236 shall be added, worded as follows:

"**ORO.FC.236 Pilot qualification to operate in either pilot's seat- helicopters)**

(a) Helicopter pilots whose duties require them to operate in either pilot's seat shall complete additional training and checking to ensure that they are proficient in conducting the relevant normal, abnormal and emergency procedures from either seat. The validity period for this qualification shall be 12 calendar months.

(b) Current FIs or TRIs on the relevant type are considered to fulfil the requirement of point (a) if they have had a FI or TRI activity in the last 6 months on that type on the helicopter.".

Point ORO.FC.240 (Operation on more than one type or variant) and ORO.FC.245 (Alternative training and qualification programme) shall be amended, worded as follows:

"**ORO.FC.240 Operation on more than one type or variant**

(a) The procedures or operational restrictions for operation on more than one type or variant established in the operations manual and approved by the competent authority shall cover:

(1) the flight crew members' minimum experience level;

(2) the minimum experience level on one type or variant before beginning training for and operation of another type or variant;

(3) the process whereby flight crew qualified on one type or variant will be trained and qualified on another type or variant; and

(4) all applicable recent experience requirements for each type or variant.

(b) INTENTIONALLY LEFT BLANK

(c) Point (a) shall not apply to operations of performance class B aeroplanes if they are limited to single-pilot classes of reciprocating engine aeroplanes under VFR by day.

ORO.FC.A.245 Alternative training and qualification programme

(a) The aeroplane operator having appropriate experience may substitute one or more of the following training and checking requirements for flight crew by an alternative training and qualification programme (ATQP), approved by the competent authority:

(1) set out in point SPA.LVO.120 on flight crew training and qualifications;

(2) set out in point ORO.FC.220 on conversion training and checking;

(3) set out in point ORO.FC.125 on differences training, familiarisation, equipment and procedure training;

(4) set out in point ORO.FC.205 on command course;

(5) set out in point ORO.FC.230 on recurrent training and checking; and

(6) set out in point ORO.FC.240 on operation on more than one type or variant.

(b) The ATQP shall contain training and checking that establishes and maintains at least an equivalent level of proficiency achieved by complying with the provisions of ORO.FC.220 and ORO.FC.230. The level of flight crew training and qualification proficiency shall be demonstrated prior to being granted the ATQP approval by the competent authority.

(c) The operator applying for an ATQP approval shall provide the competent authority with an implementation plan, including a description of the level of flight crew training and qualification proficiency to be achieved.

(d) In addition to the checks required by points ORO.FC.230 and FCL.060 of Annex I (Part-FCL) to Regulation (EU) No 1178/2011, each flight crew member shall complete a line oriented evaluation (LOE) conducted in an FSTD. The validity period of an LOE shall be 12 calendar months. The LOE is completed when both of the following conditions are met:

(1) the syllabus of the LOE is completed; and

(2) the flight crew member has demonstrated an acceptable level of performance.

(e) After 2 years of operating with an approved ATQP, the operator may, with the approval of the competent authority, extend the validity periods of the checks referred to in point ORO.FC.230 as follows:

(1) Operator proficiency check to 12 calendar months.

(2) Line check to 24 calendar months.

(3) Emergency and safety equipment checking to 24 calendar months.

(f) Each flight crew member shall undergo specific modular CRM training. All major topics of CRM training shall be covered by distributing modular training sessions as evenly as possible over each 3-year period.

(g) The ATQP programme shall include 48 hours on an FSTD for each flight crew member, distributed evenly over a 3-year programme. The operator may reduce the number of FSTD hours, but no lower than 36 hours, provided that it demonstrates that the level of safety that is achieved is equivalent to that of the programme the ATQP may substitute in accordance with point (a).”.

In point ORO.FC.H.250 (Commanders holding a CPL(H)), paragraph (a), point (1) shall be amended, worded as follows:

"(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. The 300 hours as pilot-in-command may be substituted by hours operating as co-pilot within an established multi-pilot crew system prescribed in the operations manual on the basis of 2 hours of flight time as co-pilot for 1hour flight time as pilot-in command;".

Article 12

In Addendum 1, Annex III (Organisation requirements for air operations (Part-ORO)), in Subpart FC (Flight crew), Section 3 (Additional requirements for commercial specialised operations and CAT operations referred to in ORO.FC.005(b)(1) and (2) shall be amended, worded as follows:

"SECTION 3

Additional requirements for commercial specialised operations and CAT operations referred to in ORO.FC.005(b)(1) and (2)

ORO.FC.320 Operator conversion training and checking

The operator conversion course shall include an operator proficiency check.

ORO.FC.325 Equipment and procedure training and checking

If a flight crew member undergoes equipment and procedure training that requires training on a suitable FSTD or the aircraft, with regard to standard operating procedures related to a specialised operation, the flight crew member shall undergo an operator proficiency check.

ORO.FC.330 Recurrent training and checking - operator proficiency check

(a) Each flight crew member shall complete recurrent training and operator proficiency checks. In the case of specialised operations, the recurrent training and checking shall cover the relevant aspects associated with the specialised tasks described in the operations manual.

(b) Appropriate consideration shall be given when operations are undertaken under IFR or at night.

(c) The validity period of the operator proficiency check shall be 12 calendar months.".

Article 13

In Addendum 1, Annex III (Organisation requirements for air operations (Part-ORO)), Appendix 1. (Declaration) shall be replaced by new Appendix I, provided in Addendum 2, printed with this Regulation and forming an integral part thereof.

Article 14

In Addendum 1, Annex IV (Commercial air transport operations (Part-CAT)), Subpart A (General requirements), in Section 1 (Motor-powered aircraft), point CAT.GEN.MPA.100 (Crew responsibilities) shall be amended, worded as follows:

"**CAT.GEN.MPA.100 Crew responsibilities**

(a) The crew member shall be responsible for the proper execution of his or her duties that are:

(1) related to the safety of the aircraft and its occupants; and

(2) specified in the instructions and procedures in the operations manual.

(b) The crew member shall:

(1) report to the commander any fault, failure, malfunction or defect which the crew member believes may affect the airworthiness or safe operation of the aircraft including emergency systems, if not already reported by another crew member;

(2) report to the commander any incident that endangered, or could have endangered, the safety of the operation, if not already reported by another crew member;

(3) comply with the relevant requirements of the operator's occurrence reporting schemes;

(4) comply with all flight and duty time limitations (FTL) and rest requirements applicable to their activities;

(5) when undertaking duties for more than one operator:

(i) maintain his or her individual records regarding flight and duty times and rest periods as referred to in the applicable FTL requirements;

(ii) provide each operator with the data needed to schedule activities in accordance with the applicable FTL requirements; and

(iii) provide each operator with the data needed regarding operations on more than one type or variant.

(c) The crew member shall not perform duties on an aircraft:

(1) when under the influence of psychoactive substances or when unfit due to injury, fatigue, medication, sickness or other similar causes;

(2) until a reasonable time period has elapsed after deep water diving or following blood donation;

(3) if applicable medical requirements are not fulfilled;

(4) if he or she is in any doubt of being able to accomplish his or her assigned duties; or

(5) if he or she knows or suspects that he or she is suffering from fatigue as referred to in Annex V, point 7.5, to Regulation (EU) 2018/1139 or feels otherwise unfit, to the extent that the flight may be endangered.".

Point CAT.GEN.MPA.210 (Location of an aircraft in distress- Aeroplanes) shall be amended, worded as follows:

"**CAT.GEN.MPA.210 Location of an aircraft in distress- Aeroplanes**

As of January 2025, the following aeroplanes shall be equipped with robust and automatic means to accurately determine, following an accident during which the aeroplane is severely damaged, the location of the point of end of flight:

(1) all aeroplanes with an MCTOM of more than 27 000 kg, with a MOPSC of more than 19, and first issued with an individual CofA on or after 1 January 2024; and
(2) all aeroplanes with an MCTOM of more than 45 500 kg and first issued with an individual CofA on or after 1 January 2024.".

Article 15

In Addendum 1, Annex IV (Commercial air transport operations (Part-CAT)), Subpart B (Operational procedures), in Section 1 (Motor-powered aircraft), in point CAT.OP.MPA.100 (Use of air traffic services), in paragraph (b), point (3), words: "local helicopter operations", shall be replaced by words: "local helicopter operations (LHOs)".

After point CAT.OP.MPA.100 (Use of air traffic services), a new point CAT.OP.MPA.101 shall be added, worded as follows:

"**CAT.OP.MPA.101 Altimeter check and settings**

(a) The operator shall establish procedures for altimeter checking before each departure.

(b) The operator shall establish procedures for altimeter settings for all phases of flight, which shall take into account the procedures established by the State of the aerodrome or the State of the airspace, if applicable."

Point CAT.OP.MPA.106 (Use of isolated aerodromes- aeroplanes) shall be deleted.

Point CAT.OP.MPA.107 (Adequate aerodrome) shall be amended, worded as follows:

"**CAT.OP.MPA.107 Adequate aerodrome**

The operator shall consider an aerodrome as adequate if, at the expected time of use, the aerodrome is available and equipped with necessary ancillary services such as air traffic services (ATS), sufficient lighting, communications, meteorological reports, navigation aids and emergency services.".

Point CAT.OP.MPA.110 (Aerodrome operating minima) shall be amended, worded as follows:

"**CAT.OP.MPA.110 Aerodrome operating minima**

(a) The operator shall establish aerodrome operating minima for each departure, destination or alternate aerodrome that is planned to be used in order to ensure separation of the aircraft from terrain and obstacles and to mitigate the risk of loss of visual references during the visual flight segment of instrument approach operations.

(b) The method used to establish aerodrome operating minima shall take all the following elements into account:

(1) the type, performance, and handling characteristics of the aircraft;
(2) the equipment available on the aircraft for the purpose of navigation, acquisition of visual references, and/or control of the flight path during take-off, approach, landing, and the missed approach;
(3) any conditions or limitations stated in the aircraft flight manual (AFM);
(4) the relevant operational experience of the operator;

(5) the dimensions and characteristics of the runways/final approach and take-off areas (FATOs) that may be selected for use;
(6) the adequacy and performance of the available visual and non-visual aids and infrastructure;
(7) the obstacle clearance altitude/height (OCA/H) for the instrument approach procedures (IAPs);
(8) the obstacles in the climb-out areas and necessary clearance margins;
(9) the composition of the flight crew, their competence and experience;
(10) the IAP;
(11) the aerodrome characteristics and the available air navigation services (ANS);
(12) any minima that may be promulgated by the State of the aerodrome;
(13) the conditions prescribed in the operations specifications including any specific approvals for low-visibility operations (LVOs) or operations with operational credits.
(14) any non-standard characteristics of the aerodrome, the IAP or the environment
(c) The operator shall specify a method of determining aerodrome operating minima in the operations manual.
(d) The method used by the operator to establish aerodrome operating minima and any change to that method shall be approved by the competent authority.".

Point CAT.OP.MPA.115 (Approach flight technique- aeroplanes) shall be amended as follows:

"**CAT.OP.MPA.115 Approach flight technique- aeroplanes**

(a) All approach operations shall be flown as stabilised approach operations unless otherwise approved by the competent authority for a particular approach to a particular runway.
(b) The continuous descent final approach (CDFA) technique shall be used for approach operations using non-precision approach (NPA) procedures except for such particular runways for which the competent authority has approved another flight technique.".

Point CAT.OP.MPA.150 (Fuel policy) shall be amended, worded as follows:

"**CAT.OP.MPA.150**

INTENTIONALLY LEFT BLANK.".

Point CAT.OP.MPA.151 (**Fuel policy- alleviations**) shall be deleted.

In point CAT.OP.MPA.175 (Flight preparation), in paragraph (b), point (7), words: "in respect of fuel", shall be replaced by words: "in respect of fuel/energy".

After point CAT.OP.MPA.175 (Flight preparation), a new point CAT.OP.MPA.177 shall be added, worded as follows:

"**CAT.OP.MPA.177 Submission of the ATS flight plan**

(a) If an air traffic services (ATS) flight plan is not submitted because it is not required by the rules of the air, adequate information shall be deposited in order to permit altering services to be activated if required.

(b) When operating from a site where it is impossible to submit an ATS flight plan, the ATS flight plan shall be transmitted as soon as possible after take-off by the commander or the operator.”.

Point CAT.OP.MPA.180 (Selection of aerodromes-aeroplanes), CAT.OP.MPA.181 (Selection of aerodromes and operating sites- helicopters), CAT.OP.MPA.182 (Destination aerodromes- instrument approach) and CAT.OP.MPA.185 (Planning minima for IFR flights-aeroplanes) shall be amended, worded as follows:

“**CAT.OP.MPA.180 Fuel/energy scheme- aeroplanes**

(a) The operator shall establish, implement, and maintain a fuel/energy scheme that:

(1) is appropriate for the type(s) of operation performed;

(2) corresponds to the capability of the operator to support its implementation; and

(3) is either:

(i) a basic fuel/energy scheme, which shall form the basis for a basic fuel/energy scheme with variations and an individual fuel/energy scheme; the basic fuel/energy scheme derives from a large-scale analysis of safety and operational data from previous performance and experience of the industry, applying scientific principles; the basic fuel/energy scheme shall ensure, in this order, a safe, effective, and efficient operation of the aircraft; or

(ii) a basic fuel/energy scheme with variations, which is a basic fuel/energy scheme where the analysis referred to in point (i) is used to establish a variation to the basic fuel/energy scheme that ensures, in this order, a safe, effective, and efficient operation of the aircraft; or

(iii) an individual fuel/energy scheme, which derives from a comparative analysis of the operator’s safety and operational data, applying scientific principles; the analysis is used to establish a fuel/energy scheme with a higher or equivalent level of safety to that of the basic fuel/energy scheme that ensures, in this order, a safe, effective, and efficient operation of the aircraft.

(b) All fuel/energy schemes shall comprise:

(1) a fuel/energy planning and in-flight re-planning policy;

(2) an aerodrome selection policy; and

(3) an in-flight fuel/energy management policy.

(c) The fuel/energy scheme and any change to it shall require prior approval by the competent authority.

(d) When the operator intends to apply for an individual fuel/energy scheme, it shall:

(1) establish a baseline safety performance of its current fuel/energy scheme;

(2) demonstrate its capability to support the implementation of the proposed individual fuel/energy scheme, including the capability to exercise adequate operational control and to ensure exchange of the relevant safety information between the operational control personnel and the flight crew; and

(3) make a safety risk assessment that demonstrates how an equivalent level of safety to that of the current fuel/energy scheme is achieved.

CAT.OP.MPA.181 Fuel/energy scheme – fuel/energy planning and in-flight re-planning policy – aeroplanes

(a) The operator shall:

(1) establish a fuel/energy planning and in-flight re-planning policy as part of the fuel/energy scheme;

(2) ensure that the aeroplane carries a sufficient amount of usable fuel/energy to safely complete the planned flight and to allow for deviations from the planned operation;

(3) develop procedures for the fuel/energy planning and in-flight re-planning policy that shall be contained in the operations manual.

(4) ensure that the fuel/energy planning of the flight is based on:

(i) current aircraft-specific data derived from a fuel/energy consumption monitoring system or, if not available;

(ii) data provided by the aeroplane manufacturer.

(b) The operator shall ensure that the planning of flights includes the operating conditions under which the flight is to be conducted; the operating conditions shall include at least:

(1) aircraft fuel/energy consumption data;

(2) anticipated masses;

(3) anticipated meteorological conditions;

(4) the effects of deferred maintenance items and/or of configuration deviations;

(5) the expected departure and arrival routing and runways; and

(6) anticipated delays.

(c) The operator shall ensure that the pre-flight calculation of the usable fuel/energy that is required for a flight includes:

(1) taxi fuel/energy that shall not be less than the amount expected to be used prior to take-off;

(2) trip fuel/energy that shall be the amount of fuel/energy that is required to enable the aeroplane to fly from take-off, or from the point of in-flight re-planning, to landing at the destination aerodrome;

(3) contingency fuel/energy that shall be the amount of fuel/energy required to compensate for unforeseen factors;

(4) destination alternate fuel/energy:

(i) when a flight is operated with at least one destination alternate aerodrome, it shall be the amount of fuel/energy required to fly from the destination aerodrome to the destination alternate aerodrome; or

(ii) when a flight is operated with no destination alternate aerodrome, it shall be the amount of fuel/energy required to hold at the destination aerodrome, while enabling the aeroplane to perform a safe landing, and to allow for deviations from the planned operation; as a minimum, this amount shall be 15-minute fuel/energy at holding speed at 1 500 ft (450 m) above the aerodrome elevation in standard conditions, calculated according to the estimated aeroplane mass on arrival at the destination aerodrome;

(5) final reserve fuel/energy that shall be the amount of fuel/energy that is calculated at holding speed at 1 500 ft (450 m) above the aerodrome elevation in standard conditions according to the aeroplane estimated mass on arrival at the destination alternate aerodrome, or

destination aerodrome when no destination alternate aerodrome is required, and shall not be less than:

(i) for aeroplanes with reciprocating engines, the fuel/energy to fly for 45 minutes; or

(ii) for turbine-engined aeroplanes, the fuel/energy to fly for 30 minutes;

(6) additional fuel/energy, if required by the type of operation; it shall be the amount of fuel/energy to enable the aeroplane to land at a fuel/energy en route alternate aerodrome (fuel/energy ERA aerodrome critical scenario) in the event of an aircraft failure that significantly increases the fuel/energy consumption at the most critical point along the route; this additional fuel/energy is required only if the minimum amount of fuel/energy that is calculated according to points (c)(2) to (c)(5) is not sufficient for such an event;

(7) extra fuel/energy to take into account anticipated delays or specific operational constraints; and

(8) discretionary fuel/energy, if required by the commander.

(d) The operator shall ensure that in-flight re-planning procedures for calculating the usable fuel/energy that is required when a flight proceeds along a route or to a destination aerodrome other than the ones originally planned include points (c)(2) to (c)(7).

CAT.OP.MPA.182 Fuel/energy scheme – aerodrome selection policy – aeroplanes

(a) At the planning stage, the operator shall ensure that once the flight has commenced, there is reasonable certainty that an aerodrome where a safe landing can be made will be available at the estimated time of use of that aerodrome.

(b) At the planning stage, to allow for a safe landing in case of an abnormal or emergency situation after take-off, the operator shall select and specify in the operational flight plan a take-off alternate aerodrome if either:

(1) the meteorological conditions at the aerodrome of departure are below the operator's established aerodrome landing minima for that operation; or

(2) it would be impossible to return to the aerodrome of departure for other reasons.

(c) The take-off alternate aerodrome shall be located within a distance from the departure aerodrome that minimises the risk of exposure to potential abnormal or emergency situations. In selecting the take-off alternate aerodrome, the operator shall consider at least the following:

(1) actual and forecast meteorological conditions;

(2) availability and quality of the aerodrome infrastructure;

(3) navigation and landing capabilities of the aircraft in abnormal or emergency conditions, taking into account the redundancy of critical systems; and

(4) approvals held (e.g. extended range operations with two-engined aeroplanes (ETOPS), low visibility operation (LVO), etc.).

(d) At the planning stage, for each instrument flight rules (IFR) flight, the operator shall select and specify in the operational and air traffic services (ATS) flight plans one or more aerodromes so that two safe-landing options are available during normal operation when:

(1) reaching the destination aerodrome; or

(2) reaching the point of no return, to any available fuel/energy ERA aerodrome during isolated aerodrome operations; a flight to an isolated aerodrome shall not be continued past the

point of no return unless a current assessment of meteorological conditions, traffic, and other operational conditions indicates that a safe landing can be made at the destination aerodrome at the estimated time of use.

The operator shall obtain prior approval from the competent authority for the use of an isolated aerodrome as destination aerodrome.

(e) The operator shall provide appropriate safety margins to flight planning to take into account a possible deterioration of the available forecast meteorological conditions at the estimated time of landing.

(f) For each IFR flight, the operator shall ensure that sufficient means are available to navigate to and land at the destination aerodrome or at any destination alternate aerodrome in the event of loss of capability for the intended approach and landing operation.

CAT.OP.MPA.185 Fuel/energy scheme – in-flight fuel/energy management policy – aeroplanes

(a) The operator shall establish procedures for in-flight fuel/energy management that ensure:

(1) continual validation of the assumptions made during the planning stage (pre-flight or in-flight re-planning, or both);

(2) re-analysis and adjustment, if necessary;

(3) that the amount of usable fuel/energy remaining on board is protected and not less than the fuel/energy that is required to proceed to an aerodrome where a safe landing can be made; and

(4) relevant fuel/energy data for the purpose of points (1), (2), and (3) shall be recorded.

(b) The operator shall have procedures in place to require the commander to obtain delay information from a reliable source when unforeseen circumstances may result in landing at the destination aerodrome with less than the final reserve fuel/energy plus any:

(1) fuel/energy to proceed to an alternate aerodrome, if required; or

(2) fuel/energy required to proceed to an isolated aerodrome.

(c) The commander shall advise air traffic control (ATC) of a ‘minimum fuel/energy’ state by declaring ‘MINIMUM FUEL’ when the commander has:

(1) committed to land at a specific aerodrome; and

(2) calculated that any change to the existing clearance to that aerodrome may result in landing with less than the planned final reserve fuel/energy.

(d) The commander shall declare a situation of ‘fuel/energy emergency’ by broadcasting ‘MAYDAY MAYDAY MAYDAY FUEL’ when the usable fuel/energy that is calculated to be available upon landing at the nearest aerodrome where a safe landing can be made is less than the planned final reserve fuel/energy.”.

Point CAT.OP.MPA.186 (Planning minima for IFR flights-helicopters) shall be deleted.

Point CAT.OP.MPA.190 (Submission of the ATS flight plan) shall be amended as follows:

“**CAT.OP.MPA.190 Fuel/energy scheme-helicopters**

(a) The operator shall establish, implement, and maintain a fuel-energy scheme that comprises:

(1) a fuel/energy planning and in-flight re-planning policy; and

(2) an in-flight fuel/energy management policy.

(b) The fuel/energy scheme shall:

(1) be appropriate for the type(s) of operation performed; and

(2) correspond to the capability of the operator to support its implementation.

(c) The fuel/energy scheme and any change to it shall require prior approval by the competent authority.”.

After point CAT.OP.MPA.190 (Fuel/energy scheme helicopters), new points CAT.OP.MPA.191 and CAT.OP.MPA.192 shall be added, worded as follows:

“**CAT.OP.MPA.191 Fuel/energy scheme – Fuel/energy planning and in-flight re-planning policy – helicopters**

(a) As part of the fuel/energy scheme, the operator shall establish a fuel/energy planning and in-flight re-planning policy to ensure that the aircraft carries a sufficient amount of usable fuel/energy to safely complete the planned flight and to allow for deviations from the planned operation.

(b) The operator shall ensure that the fuel/energy planning of flights is based upon at least the following elements:

(1) procedures contained in the operations manual as well as:

(i) current aircraft-specific data derived from a fuel/energy consumption monitoring system; or

(ii) data provided by the aircraft manufacturer; and

(2) the operating conditions under which the flight is to be conducted including:

(i) aircraft fuel/energy consumption data;

(ii) anticipated masses;

(iii) anticipated meteorological conditions;

(iv) the effects of deferred maintenance items or of configuration deviations, or both; and

(v) procedures and restrictions introduced by air navigation service providers.

(c) The operator shall ensure that the pre-flight calculation of the usable fuel/energy that is required for a flight includes:

(1) taxi fuel/energy, which shall not be less than the amount expected to be used prior to take-off;

(2) trip fuel/energy;

(3) contingency fuel/energy;

(4) destination alternate fuel/energy if a destination alternate aerodrome is required;

(5) final reserve fuel/energy, which shall not be less than:

(i) if flying under visual flight rules (VFR) and navigating by day with reference to visual landmarks, 20-minute fuel/energy at best-range speed; or

(ii) if flying under VFR and navigating by means other than by reference to visual landmarks or at night, 30-minute fuel/energy at best-range speed; or

(iii) if flying under instrument flight rules (IFR), 30-minute fuel/energy at holding speed at 1 500 ft (450 m) above the aerodrome elevation in standard conditions, calculated according to the helicopter estimated mass on arrival at the destination alternate aerodrome or at the destination aerodrome when no destination alternate aerodrome is required;

(6) extra fuel/energy, to take into account anticipated delays or specific operational constraints; and

(7) discretionary fuel/energy, if required by the commander.

(d) The operator shall ensure that if a flight has to proceed along a route or to a destination aerodrome other than the ones originally planned, in-flight re-planning procedures for calculating the required usable fuel/energy include:

(1) trip fuel/energy for the remainder of the flight;

(2) reserve fuel/energy consisting of:

(i) contingency fuel/energy;

(ii) alternate fuel/energy if a destination alternate aerodrome is required;

(iii) final reserve fuel/energy; and

(iv) additional fuel/energy, if required by the type of operation;

(3) extra fuel/energy, to take into account anticipated delays or specific operational constraints; and

(4) discretionary fuel/energy, if required by the commander.

(e) As an alternative to points (b) to (d), for helicopters with a maximum certified take-off mass (MCTOM) of 3 175 kg or less, flying by day and over routes navigated by reference to visual landmarks, or for local helicopter operations (LHO), the fuel/energy policy shall ensure that on completion of the flight, or series of flights, the final reserve fuel/energy is sufficient for:

(1) 30-minute flying time at best-range speed; or

(2) 20-minute flying time at best-range speed, if operating within an area providing continuous and suitable operating sites.”.

CAT.OP.MPA.192 Selection of aerodromes and operating sites – helicopters

(a) For flights under instrument meteorological conditions (IMC), the operator shall select a take-off alternate aerodrome within one-hour flying time at normal cruising speed if it is not possible to return to the site of departure for meteorological reasons.

(b) At the planning stage, for each instrument flight rules (IFR) flight, the operator shall select and specify in the operational and air traffic services (ATS) flight plans one or more aerodromes or operating sites so that two safe-landing options are available during normal operation, except as provided for under point SPA.HOFO.120 (b).

(c) The operator shall apply appropriate safety margins to flight planning to take into account a possible deterioration of the available forecast meteorological conditions at the estimated time of landing.

(d) For each IFR flight, the operator shall ensure that sufficient means are available to navigate to and land at the destination aerodrome or at any destination alternate aerodrome in the event of loss of capability for the intended approach and landing operation.”.

Point CAT.OP.MPA.195 (Refuelling and defuelling with passengers embarking or onboard) and CAT.OP.MPA.200 (Refuelling/defuelling with 'wild-cut' fuel) shall be amended, worded as follows:

"**CAT.OP.MPA.195 Fuel/energy scheme – in-flight fuel/energy management policy – helicopters**

(a) The operator shall establish procedures to ensure that in-flight fuel/energy checks and fuel/energy management are performed.

(b) The commander shall monitor the amount of usable fuel/energy remaining on board to ensure that it is protected and not less than the fuel/energy that is required to proceed to an aerodrome or operating site where a safe landing can be made.

(c) The commander shall advise air traffic control (ATC) of a 'minimum fuel/energy' state by declaring 'MINIMUM FUEL' when the commander has:

(1) committed to land at an aerodrome or operating site; and

(2) calculated that any change to the existing clearance to that aerodrome or operating site, or other air traffic delays, may result in landing with less than the planned final reserve fuel/energy.

(d) The commander shall declare a situation of 'fuel/energy emergency' by broadcasting 'MAYDAY MAYDAY MAYDAY FUEL' when the usable fuel/energy estimated to be available upon landing at the nearest aerodrome or operating site where a safe landing can be made is less than the planned final reserve fuel/energy.

CAT.OP.MPA.200 Special refuelling or defuelling of the aircraft

(a) Special refuelling or defuelling shall only be conducted if the operator:

(1) has performed a risk assessment;

(2) has developed procedures; and

(3) has established a training programme for its personnel involved in such operations.

(b) Special refuelling or defuelling applies to:

(1) refuelling with an engine running or rotors turning;

(2) refuelling/defuelling with passengers embarking, on board, or disembarking; and

(3) refuelling/defuelling with wide-cut fuel.

(c) For aeroplanes, any special refuelling or defuelling procedures and any change to them shall require prior approval by the competent authority.

(d) For helicopters, refuelling procedures with rotors turning and any change to them shall require prior approval by the competent authority.".

Point CAT.OP.MPA.245 (Meteorological conditions- all aircraft) and CAT.OP.MPA.246 (Meteorological conditions- aeroplanes) shall be amended, worded as follows:

"**CAT.OP.MPA.245 Meteorological conditions - all aircraft**

(a) On IFR flights, the commander shall only:

(1) commence the flight; or

(2) continue beyond the point from which a revised ATS flight plan applies in the event of in-flight re-planning,

when information is available indicating that the expected meteorological conditions, at the time of arrival, at the destination and/or required alternate aerodrome(s) are at or above the planning minima.

(b) On IFR flights, the commander shall only continue towards the planned destination aerodrome when the latest information available indicates that, at the expected time of arrival, the meteorological conditions at the destination, or at least one destination alternate aerodrome, are at or above the applicable aerodrome operating minima.

(c) On VFR flights, the commander shall only commence the flight when the appropriate meteorological reports and/or forecasts indicate that the meteorological conditions along the part of the route to be flown under VFR will, at the appropriate time, be at or above the VFR limits.

CAT.OP.MPA.245 Meteorological conditions- aeroplanes

In addition to CAT.OP.MPA.245, on IFR flights with aeroplanes, the commander shall only continue beyond:

(a) the decision point when using the reduced contingency fuel/energy (RCF) procedure; or

(b) point of no return when using the isolated aerodrome procedure,

when information is available indicating that the expected meteorological conditions, at the time of arrival, at the destination and-or required alternate aerodrome(s) are at or above the applicable aerodrome operating minima.

In point CAT.OP.MPA.247 (Meteorological conditions- helicopters), point (a) shall be amended, worded as follows:

"(a) On VFR flights overwater out of sight of land with helicopters, the commander shall only commence take-off when the appropriate meteorological reports and/or forecasts indicate the ceiling will be above 600 ft by day or 1 200 ft by night.".

The CAT.OP.MPA.260 (Fuel oil supply) and CAT.OP.MPA.265 (Take-off conditions) shall be amended, worded as follows:

"**CAT.OP.MPA.260 Fuel/energy oil supply**

The commander shall only commence a flight or continue in the event of in-flight re-planning, when satisfied that the aircraft carries at least the planned amount of usable fuel/energy and oil to safely complete the flight, taking into account the expected operating conditions.

CAT.OP.MPA.265 Take-off conditions

Before commencing take-off, the commander shall be satisfied that:

(a) the meteorological conditions at the aerodrome or operating site and the condition of the runway/FATO intended to be used will not prevents a safe take-off and departure; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.".

Point CAT.OP.MPA.280 (In-flight fuel management- aeroplanes) shall be amended, worded as follows:

"**CAT.OP.MPA.280**

[INTENTIONALLY LEFT BLANK].".

Point CAT.OP.MPA.281 (In-flight fuel management- helicopters) shall be deleted.

Point CAT.OP.MPA.300 (Approach and landing conditions- aeroplanes) shall be amended, worded as follows:

"**CAT.OP.MPA.300 (Approach and landing conditions)**

Before commencing an approach operation, the commander shall be satisfied that:

(a) the meteorological conditions at the aerodrome or operating site and the conditions of the runway/FATO intended to be used will not prevent a safe approach, landing or go-around, considering the performance information contained in the operations manual; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.".

Point CAT.OP.MPA.305 (Commencement and continuation of approach) and CAT.OP.MPA.310 (Operating procedures- threshold crossing height- aeroplanes) shall be amended, worded as follows:

"CAT.OP.MPA.305 Commencement and continuation of approach

(a) For aeroplanes, if the reported visibility (VIS) or controlling RVR for the runway to be used for landing is less than the applicable minimum, then an instrument approach operation shall not be continued:

(1) past a point at which the aeroplane is 1 000 ft above the aerodrome elevation; or

(2) into the final approach segment (FAS) if the DH or MDH is higher than 1 000 ft.

(b) For helicopters, if the reported RVR is less than 550 m and the controlling RVR for the runway to be used for landing is less than the applicable minimum, then an instrument approach operation shall not be continued:

(1) past a point at which the helicopter is 1 000 ft above the aerodrome elevation; or

(2) into the FAS if the DH or MDH is higher than 1 000 ft.

(c) If the required visual reference is not established, then a missed approach shall be executed at or before the DA/H or the MDA/H.

(d) If the required visual reference is not maintained after DA/H or MDA/H, then a go-around shall be executed promptly.

(e) Notwithstanding point (a), in the case where no RVR is reported, and the reported VIS is less than the applicable minimum, but the converted meteorological visibility (CMV) is equal or greater than the applicable minimum, then the instrument approach can be continued to the DA/H or MDA/H.".

CAT.OP.MPA.310 Operating procedures- threshold crossing height- aeroplanes

The operator shall establish operational procedures designed to ensure that an aeroplane conducting 3D instrument approach operations crosses the threshold of the runway by a safe margin, with the aeroplane in the landing configuration and attitude.".

After point CAT.OP.MPA.311 (Reporting on runway braking action) a new point CAT.OP.MPA.312 shall be added, worded as follows:

"**CAT.OP.MPA.312 EFVS 200 operations**

(a) An operator that intends to conduct EFVS 200 operations shall ensure that:

(1) the aircraft is certified for the intended operations;

(2) only runways, FATO and instrument approach procedures (IAPs) suitable for EFVS operations are used;

(3) the flight crew members are competent to conduct the intended operation, and a training and checking programme for the flight crew members and relevant personnel involved in the flight preparation is established;

(4) operating procedures are established;

(5) any relevant information is documented in the minimum equipment list (MEL);

(6) any relevant information is documented in the maintenance programme;

(7) safety assessments are carried out and performance indicators are established to monitor the level of safety of the operation; and

(8) the aerodrome operating minima take into account the capability of the system used.

(b) The operator shall not conduct EFVS 200 operations when conducting LVOs.

(c) Notwithstanding point (a)(1), the operator may use EVSs meeting the minimum criteria to conduct EFVS 200 operations, provided that this is approved by the competent authority.".

Article 16

In Addendum 1, Annex IV (Commercial air transport operations (Part-CAT)), in Subpart C (Aircraft performance and operating limitations), Section 1 (Aeroplanes), Chapter 2 (Performance class A), in point CAT.POL.A.220 (En-route- aeroplanes with three or more engines, two engines inoperative) paragraph (f) shall be amended, worded as follows:

"(f) The expected mass of the aeroplane at the point where the two engines are assumed to fail shall not be less than that which would include sufficient fuel/energy to proceed to an aerodrome where the landing is assumed to be made, and to arrive there at an altitude of at least 1 500 ft (450 m) directly over the landing area, and thereafter, to fly for 15 minutes at cruising power or thrust, as appropriate.".

Article 17

In Addendum 1, Annex IV (Commercial air transport operations (Part-CAT)), in Subpart C (Aircraft performance and operating limitations), Section 1 (Aeroplanes), Chapter 4 (Performance class C), in point CAT.POL.A.420 (En-route- aeroplanes with three or more engines, two engines inoperative), paragraph (d) shall be amended, worded as follows:

“(d) The expected mass of the aeroplane at the point where two engines are assumed to fail shall not be less than that which would include sufficient fuel/energy to proceed to an aerodrome where the landing is assumed to be made, and to arrive there at an altitude of at least 1 500 ft (450 m) directly over the landing area, and thereafter, to fly for 15 minutes at cruising power or thrust, as appropriate.”.

Article 18

In Addendum 1, Annex IV (Commercial air transport operations (Part-CAT)), in Subpart C (Performance and operating limitations), Section 2 (Helicopters), Chapter 2 (Performance class 1), the title of point CAT.POL.A.250 (Take-off) shall be amended, worded as follows:
“**CAT.POL.H.205 Take-off**”.

Article 19

In Addendum 1, in Annex IV (Commercial air transport operations (Part-CAT)), in Subpart D (Instruments, data, equipment), in Section 1 (Aeroplanes), in point CAT.IDE.A.185 (Cockpit voice recorder), paragraph (c), point (1). words: “1 January 2021”, shall be replaced by words: “1 January 2022”.

In point CAT.IDE.A.195 (Data link recording), paragraph (e) shall be amended, worded as follows:

“(e) The requirements applicable to the start and stop logic of the data link recorder are the same as the requirements applicable to the start and stop logic of the cockpit voice recorder (CVR) that are contained in point CAT.IDE.A.185.”.

Article 20

In Addendum 1, Annex V (Specific approvals (Part-SPA)), title of Subpart E shall be amended, worded as follows: “LOW-VISIBILITY OPERATIONS (LVOs) AND OPERATIONS WITH OPERATIONAL CREDITS”.

Point SPA.LVO.100 (Low-visibility operations (LVO)), SPA.LVO.105 (Specific approval criteria) and SPA.LVO.110 (General operating requirements) shall be amended, worded as follows:

“**SPA.LVO.100 Low-visibility operations and operations with operational credits**

The operator shall conduct the following operations only if they are approved by the competent authority:

(a) take-off operations with visibility conditions of less than 400 m RVR;

(b) instrument approach operations in low-visibility conditions; and

(c) operations with operational credits, except for EFVS 200 operations, which shall not be subject to a specific approval.

SPA.LVO.105 Specific approval criteria

To obtain a specific approval as required by SPA.LVO.100, the operator shall demonstrate that:

(a) for low-visibility approach operations, LVTO operations in an RVR less than 125 m, and operations with operational credits, the aircraft has been certified for the intended operations;

(b) the flight crew members are competent to conduct the intended operation and a training and checking programme for the flight crew members and relevant personnel involved in the flight preparation has been established, in accordance with SPA.LVO.120;

(c) operating procedures for the intended operations have been established;

(d) any relevant changes to the minimum equipment list (MEL) have been made;

(e) any relevant changes to the maintenance programme have been made;

(f) procedures have been established to ensure the suitability of aerodromes, including instrument flight procedures, for the intended operations, in accordance with SPA.LVO.110; and

(g) for the intended operations, a safety assessment has been carried out, and performance indicators have been established to monitor the level of safety.".

SPA.LVO.110 Aerodrome-related requirements, including instrument flight procedures

The operator shall ensure that only aerodromes, including instrument flight procedures, suitable for the intended operations are used for LVOs and operations with operational credits.".

Point SPA.LVO.115 (Aerodrome related requirements) shall be deleted.

Point SPA.LVO.120 (Flight crew training and qualifications) shall be amended, worded as follows:

"**SPA.LVO.120 Flight crew competence**

(a) The operator shall ensure that the flight crew is competent to conduct the intended operations.

(b) The operator shall ensure that each flight crew member successfully completes training and checking for all types of LVOs and operations with operational credits for which an approval has been granted. Such training and checking shall:

(1) include initial and recurrent training and checking;

(2) include normal, abnormal and emergency procedures;

(3) be tailored to the type of technologies used in the intended operations; and (4) take into account the human factor risks associated with the intended operations.

(c) The operator shall keep records of the training and qualifications of the flight crew members.

(d) The training and checking shall be conducted by appropriately qualified personnel. In the case of flight and flight simulation training and checking, the personnel providing the training and conducting the checks shall be qualified in accordance with Annex I (Part-FCL) to Regulation (EU) No 1178/2011.".

Article 21

In Addendum 1, Annex V (Specific approvals (Part-SPA)), in Subpart H (Helicopter operations with night vision imaging systems), in point SPA.NVIS.120 (NVIS operating minimum), paragraph (a) shall be amended, worded as follows:

"(a) Operations shall not be conducted below the weather minima for the type of night operations being conducted.".

Article 22

In Addendum 1, Annex V (Specific approvals (Part-SPA)), In Subpart J (Helicopter emergency medical service operations), point SPA.HEMS.150 (Fuel supply) and SPA.HEMS.155 (Refuelling with passengers embarking, on board or disembarking) shall be amended, worded as follows:

"**SPA.HEMS.150 Fuel/energy supply – alleviation**

As an alternative to points CAT.OP.MPA.191 (b), (c), and (d), when the helicopter emergency medical services (HEMS) mission is conducted under visual flight rules (VFR) within a local and defined geographical area, the fuel/energy policy shall ensure that on completion of the mission, the final reserve fuel/energy is sufficient for:

(a) 30-minute flying time at best-range speed; or

(b) 20-minute flying time at best-range speed by day, when operating within an area providing continuous and suitable operating sites.

SPA.HEMS.155 Refuelling with passengers on board

A refuelling procedure with either rotors stopped or rotors turning shall be provided in accordance with point CAT.OP.MPA.200 'Special refuelling or defuelling of the aircraft'.".

Article 23

In Addendum 1, Annex V (Specific approvals (Part-SPA), in Subpart K (Helicopter offshore operations), in point SPA.HOFO.120 (Selection of aerodromes and operating sites) paragraph (a) shall be amended, worded as follows:

"(a) Onshore destination alternate aerodrome. Notwithstanding points CAT.OP.MPA.192, NCC.OP.152 and SPO.OP.151, the pilot-in command/ commander does not need to specify a destination alternate aerodrome in the operational flight plan when conducting flights from an offshore location to a land destination aerodrome provided that sufficient operational contingency is in place to ensure a safe return from offshore.".

Point SPA.HOFO.125 (Airborne radar approach (ARA)) shall be amended, worded as follows:

"**SPA.HOFO.125 Offshore standard approach procedures (OSAPs)**

(a) An operator shall establish procedures to ensure that offshore standard approach procedures (OSAPs) are followed only if:

(1) the helicopter is capable of providing navigation and real-time obstacle environment information for obstacle clearance; and

(2) either:

(i) the minimum descent height (MDH) is determined from a radio altimeter or a device that provides equivalent performance; or

(ii) the minimum descent altitude (MDA) is applied and it includes an adequate margin.

(b) If the operator follows OSAPs to rigs or vessels in transit, the flight shall be conducted in multi-pilot operations.

(c) The decision range shall provide adequate obstacle clearance in the missed approach from any destination for which an OSAP is planned.

(d) The approach shall only be continued beyond decision range or below the minimum descent altitude/height (MDA/H) when visual reference to the destination has been established.

(e) For single-pilot operations, appropriate increments shall be added to the MDA/H and decision range.

(f) When an OSAP is followed to a non-moving offshore location (i.e. fixed installation or moored vessel) and a reliable GNSS position for the location is available in the navigation system, the GNSS/area navigation system shall be used to enhance the safety of the OSAP.

(g) The operator shall include OSAPs in its initial and recurrent training and checking programmes.”.

Article 24

In Addendum 1, Annex V (Specific approvals (Part-SPA)), in Subpart L (Single-engined turbine aeroplane operations at night or in instrument meteorological conditions (SELT-IMC)), in point SPA.SET-IMC.110 (Equipment requirements for SET-IMC operations), point (l) shall be amended, worded as follows:

“(l) an emergency engine power control device that permits continuing operation of the engine at a sufficient power range to safely complete the flight in the event of any reasonably probable failure of the fuel/energy control unit.”.

Article 25

In Addendum 1, Annex V (Specific approvals (Part-SPA)), after point SPA.EFB.100 (Use of electronic flight bags (EFBs)- operational approval), title of new Subpart N and point SPA.PINS-VFR.100 shall be added, worded as follows:

“SUBPART N

HELICOPTER POINT-IN-SPACE APPROACHES AND DEPARTURES WITH REDUCED VFR MINIAM (PINS-VFR)

SPA.PINS-VFR.100 Helicopter point-in-space (PinS) approaches and departures with reduced VFR minima

(a) The operator shall only use reduced VFR operating minima if the operator has been granted an approval by the competent authority.

(b) Reduced VFR operating minima shall apply only to a helicopter flight that includes a segment flown under IFR, and only in one of the following cases:

(1) the segment of the flight flown under VFR takes place immediately after a helicopter PinS approach with the intention of landing at a nearby heliport or operating site;

(2) the segment of the flight flown under VFR takes place immediately after a helicopter PinS approach with the intention of conducting hoist operations at a nearby HEC or HHO site;

(3) the segment of the flight flown under VFR is a departure with the intention of transitioning to IFR at a nearby initial departure fix.

(c) The operator shall define operating procedures that are applicable when flying with reduced VFR operating minima.

(d) The operator shall ensure that the flight crew members are experienced and trained to operate with reduced VFR operating minima.".

Article 26

In Addendum 1, Annex VI (Non-commercial air operations with complex motor-powered aircraft (Part-NCC), in subpart B (Operational procedures), after point NCC.OP.100 (Use of aerodromes and operating sites), a new point NCC.OP.101 shall be added, worded as follows:

"**NCC.OP.101 Altimeter check and settings**

(a) The operator shall establish procedure for altimeter checking before each departure.

(b) The operator shall establish procedures for altimeter settings for all phases of flight, which shall take into account the procedures established by the State of the aerodrome or the State of the airspace, if applicable.".

Point NCC.OP.105 (Specification of isolated aerodromes- aeroplanes) and NCC.OP.110 (Aerodrome operating minima- general) shall be amended, worded as follows:

"**NCC.OP.105 Specification of isolated aerodromes – aeroplanes**

For the selection of alternate aerodromes and the fuel/energy planning and in-flight re-planning policy, the operator shall not consider an aerodrome as an isolated aerodrome unless the flying time to the nearest weather-permissible destination alternate aerodrome is more than:

(a) for aeroplanes with reciprocating engines, 60 minutes; or

(b) for turbine-engined aeroplanes, 90 minutes.

NCC.OP.110 Aerodrome operating minima - general

(a) The operator shall establish aerodrome operating minima for each departure, destination or alternate aerodrome that is planned to be used in order to ensure separation of the aircraft from terrain and obstacles and to mitigate the risk of loss of visual references during the visual flight segment of instrument approach operations.

(b) The method used to establish aerodrome operating minima shall take all the following elements into account:

(1) the type, performance, and handling characteristics of the aircraft;

(2) the equipment available on the aircraft for the purpose of navigation, acquisition of visual references, and/or control of the flight path during take-off, approach, landing, and missed approach;

(3) any conditions or limitations stated in the aircraft flight manual (AFM);

(4) the dimensions and characteristics of the runways/final approach and take-off areas (FATOs) that may be selected for use;

(5) the adequacy and performance of the available visual and non-visual aids and infrastructure;

(6) the obstacle clearance altitude/height (OCA/H) for the instrument approach procedures (IAPs);

(7) the obstacles in the climb-out areas and necessary clearance margins;

(8) any non-standard characteristics of the aerodrome, the IAP or the environment;

(9) the composition of the flight crew, their competence and experience;

(10) the IAP;

(11) the aerodrome characteristics and the available air navigation services (ANS);

(12) any minima that may be promulgated by the State of the aerodrome;

(13) the conditions prescribed in any specific approvals for low-visibility operations (LVOs) or operations with operational credits; and

(14) the relevant operational experience of the operator.

(c) The operator shall specify a method of determining aerodrome operating minima in the operations manual.".

Point NCC.OP.111 (Aerodrome operating minima- NPA, APV, CAT I operations) shall be deleted.

Point NCC.OP.112 (Aerodrome operating minima- circling operations with aeroplanes) shall be amended, worded as follows:

"**NCC.OP.112 Aerodrome operating minima- circling operations with aeroplanes**

(a) The MDH for a circling approach operation with aeroplanes shall not be lower than the highest of:

(1) the published circling OCH for the aeroplane category;

(2) the minimum circling height derived from Table 1; or

(3) the DH/MDH of the preceding IAP.

(b) The minimum visibility for a circling approach operation with aeroplanes shall be the highest of:

(1) the circling visibility for the aeroplane category, if published; or

(2) the minimum visibility derived from Table 1.

Table 1
MDH and minimum visibility for circling per aeroplane category

	Aeroplane category			
	A	**B**	**C**	**D**
MDH (ft)	400	500	600	700
Minimum VIS (m)	1 500	1 600	2 400	3 600

Point NCC.OP.130 (Fuel and oil supply- aeroplanes) and NCC.OP.131 (Fuel and oil supply- helicopters) shall be amended, worded as follows:

“**NCC.OP.130 Fuel/energy scheme- aeroplanes and helicopters**

(a) The operator shall establish, implement, and maintain a fuel/energy scheme that comprises:

(1) a fuel/energy planning and in-flight re-planning policy; and

(2) an in-flight fuel/energy management policy.

(b) The fuel/energy scheme shall:

(1) be appropriate for the type(s) of operation performed; and

(2) correspond to the capability of the operator to support its implementation.

NCC.OP.131 Fuel/energy scheme – fuel/energy planning and in-flight re-planning policy – aeroplanes and helicopters

(a) As part of the fuel/energy scheme, the operator shall establish a fuel/energy planning and in-flight re-planning policy to ensure that the aircraft carries a sufficient amount of usable fuel/energy to safely complete the planned flight and to allow for deviations from the planned operation.

(b) The operator shall ensure that the fuel/energy planning of flights is based upon at least the following elements:

(1) procedures contained in the operations manual as well as:

(i) current aircraft-specific data derived from a fuel/energy consumption monitoring system, or, if not available;

(ii) data provided by the aircraft manufacturer; and

(2) the operating conditions under which the flight is to be conducted including:

(i) aircraft fuel/energy consumption data;

(ii) anticipated masses;

(iii) anticipated meteorological conditions;

(iv) the effects of deferred maintenance items or configuration deviations, or both; and

(v) anticipated delays.

(c) For aeroplanes, the operator shall ensure that the pre-flight calculation of the usable fuel/energy that is required for a flight includes:

(1) taxi fuel/energy that shall not be less than the amount expected to be used prior to take-off;

(2) trip fuel/energy that shall be the amount of fuel/energy that is required to enable the aeroplane to fly from take-off, or from the point of in-flight re-planning, to landing at the destination aerodrome;

(3) contingency fuel/energy that shall be the amount of fuel/energy required to compensate for unforeseen factors;

(4) destination alternate fuel/energy:

(i) when a flight is operated with at least one destination alternate aerodrome, it shall be the amount of fuel/energy required to fly from the destination aerodrome to the destination alternate aerodrome; or

(ii) when a flight is operated with no destination alternate aerodrome, it shall be the amount of fuel/energy required to hold at the destination aerodrome to compensate for the lack of a destination alternate aerodrome;

(5) final reserve fuel/energy that shall be the amount of fuel/energy that is calculated at holding speed at 1 500 ft (450 m) above the aerodrome elevation in standard conditions according to the aircraft estimated mass on arrival at the destination alternate aerodrome, or destination aerodrome when no destination alternate aerodrome is required, and shall not be less than:

(i) for aeroplanes with reciprocating engines on visual flight rules (VFR) flights by night and instrument flight rules (IFR) flights, the fuel/energy to fly for 45 minutes; or

(ii) for aeroplanes with reciprocating engines on VFR flights by day, the fuel/energy to fly for 30 minutes;

(iii) for turbine-engined aeroplanes, the fuel/energy to fly for 30 minutes;

(6) additional fuel/energy, if required by the type of operation; it shall be the amount of fuel/energy to enable the aeroplane to perform a safe landing at a fuel/energy en route alternate aerodrome (fuel/energy ERA aerodrome critical scenario) in the event of an engine failure or loss of pressurisation, whichever requires the greater amount of fuel/energy, based on the assumption that such a failure occurs at the most critical point along the route; this additional fuel/energy is required only if the minimum amount of fuel/energy that is calculated according to points (c)(2) to (c)(5) is not sufficient for such an event;

(7) extra fuel/energy to take into account anticipated delays or specific operational constraints; and

(8) discretionary fuel/energy, if required by the commander.

(d) For helicopters, the operator shall ensure that the pre-flight calculation of the usable fuel/energy that is required for a flight includes all of the following:

(1) fuel/energy to fly to the aerodrome or operating site of intended landing;

(2) if a destination alternate is required, destination alternate fuel/energy, which shall be the amount of fuel/energy that is required to execute a missed approach at the aerodrome or operating site of intended landing, and thereafter, to fly to the specified destination alternate, approach and land; and

(3) final reserve fuel/energy, which shall not be less than:

(i) for flights under VFR, fuel/energy to fly for at least 20 minutes at best-range speed; or

(ii) for IFR flights, fuel/energy to fly for at least 30 minutes at holding speed at 450 m (1 500 ft) above the aerodrome or operating site of intended landing or destination alternate in standard temperature conditions.

(e) The operator shall ensure that if a flight has to proceed to a destination aerodrome other than the one originally planned, in-flight re-planning procedures for calculating the required usable fuel/energy are available and comply with points (c)(2) to (c)(7) for aeroplanes, and point (d) for helicopters.

(f) The pilot in command shall only commence a flight or continue in the event of in-flight re-planning, when satisfied that the aircraft carries at least the planned amount of usable fuel/energy and oil to safely complete the flight.”.

In point NCC.OP.145 (Flight preparation), paragraph (b) shall be amended, worded as follows:

"(b) Before commencing a flight, the pilot-in-command shall be familiar with all available meteorological information appropriate to the intended flight. Preparation for a flight away from the vicinity of the place pf departure, and for every flight under IFR, shall include:

(1) a study of the available current meteorological reports and forecasts; and

(2) the planning of an alternative course of action to provide for the eventuality that the flight cannot be completed as planned, because of meteorological conditions.".

After point NCC.OP.145(Flight preparation), new points NCC.OP.147 and NCC.OP.148 shall be amended, worded as follows:

"**NCC.OP.147 Destination alternate aerodromes planning minima - aeroplanes**

An aerodrome shall not be specified as a destination alternate aerodrome unless the available current meteorological information indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period,

(a) for an alternate aerodrome with an available instrument approach operation with DH less than 250 ft,

(1) a ceiling of at least 200 ft above the DH or MDH associated with the instrument approach operation; and

(2) a visibility of at least the higher of 1 500 m and 800 m above the instrument approach operation RVR/VIS minima; or

(b) for an alternate aerodrome with an instrument approach operation with DH or MDH 250 ft or more,

(1) a ceiling of at least 400 ft above the DH or MDH associated with the instrument approach operation; and

(2) a visibility of at least 3 000 m; or

(c) for an alternate aerodrome without an instrument approach procedure,

(1) a ceiling of at least the higher of 2 000 ft and the minimum safe IFR height; and

(2) a visibility of at least 5 000 m.

NCC.OP.148 Destination alternate aerodrome planning minima - helicopters

The operator shall only select an aerodrome as a destination alternate aerodrome if the available current meteorological information indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period:

(a) for an alternate aerodrome with an instrument approach procedure (IAP):

(1) a ceiling of at least 200 ft above the DH or MDH associated with the IAP; and

(2) a visibility of at least 1 500 m by day or 3 000 m by night; or

(b) for an alternate aerodrome without an IAP:

(1) a ceiling of at least 2 000 ft or the minimum safe IFR height - whichever is greater; and

(2) a visibility of at least 1 500 m by day or 3 000 m by night.".

In point NCC.OP.150 (Take-off alternate aerodromes- aeroplanes), paragraph (a) shall be amended, worded as follows:

"(a) For IFR flights, the pilot-in-command shall specify at least one weather-permissible take-off alternate aerodrome in the flight plan if the meteorological conditions at the aerodrome of departure are at or below the applicable aerodrome operating minima or if it would not be possible to return to the aerodrome of departure for other reasons.".

In point NCC.OP.151 (Destination alternate aerodromes- aeroplanes), point (b) shall be amended, worded as follows:

"(b) the place of intended landing is designated as an isolated aerodrome and:

(1) an instrument approach procedure is prescribed for the aerodrome of intended landing; and

(2) available current meteorological information indicates that the following meteorological conditions will exist from 2 hours before to 2 hours after the estimated time of arrival:

(i) a cloud base of at least 300 m (1 000 ft) above the minimum associated with the instrument approach procedure; and

(ii) visibility of at least 5,5 km or of 4 km more than the minimum associated with the procedure.".

Point NCC.OP.155 (Refuelling with passengers embarking, on board or disembarking) shall be amended, worded as follows:

"**NCC.OP.155 Refuelling with passengers embarking, on board or disembarking**

(a) The aircraft shall not be refuelled with aviation gasoline (AVGAS) or wide-cut type fuel or a mixture of these types of fuel, when passengers are embarking, on board or disembarking.

(b) For all other types of fuel/energy, necessary precautions shall be taken and the aircraft shall be properly manned by qualified personnel ready to initiate and direct an evacuation of the aircraft by the most practical and expeditious means available.".

After point NCC.OP.155 (Refuelling with passengers embarking, on board or disembarking), a new point NCC.OP.157 shall be added, worded as follows:

"**NCC.OP.157 Refuelling with engine(s)and/or rotors turning – helicopters**

(a) Refuelling with engine(s) and/or rotors turning shall only be conducted:

(1) with no passengers embarking or disembarking;

(2) if the operator of the aerodrome/operating site allows such operations;

(3) in accordance with any specific procedures and limitations in the aircraft flight manual (AFM);

(4) with JET A or JET A-1 fuel types; and

(5) in the presence of the appropriate rescue and firefighting (RFF) facilities or equipment.

(b) The operator shall assess the risks associated with refuelling with engine(s) and/or rotors turning.

(c) The operator shall establish appropriate procedures to be followed by all involved personnel, such as crew members and ground operations personnel.

(d) The operator shall train its crew members and ensure that the involved ground operations personnel is trained appropriately.

(e) The operator shall ensure that the helicopter refuelling procedure with engine(s) and/or rotors turning are specified in the operations manual. This procedure and any change thereto shall require prior approval by the competent authority.".

In point NCC.OP.195 (Take-off conditions) shall be amended, worded as follows:

"**NCC.OP.195 Take-off conditions - aeroplanes and helicopters**

Before commencing take-off, the pilot-in-command shall be satisfied that:

(a) the meteorological conditions at the aerodrome or the operating site and the condition of the runway/FATO intended to be used will not prevent a safe take-off and departure; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.".

Point NCC.OP.205 (Fuel management during flight) shall be amended, worded as follows:

"**NCC.OP.205 Fuel/energy scheme – in-flight fuel/energy management policy**

(a) The operator shall establish procedures to ensure that in-flight fuel/energy checks and fuel/energy management are performed.

(b) The pilot-in-command shall monitor the amount of usable fuel/energy remaining on board to ensure that it is protected and not less than the fuel/energy that is required to proceed to an aerodrome or operating site where a safe landing can be made.

(c) The pilot-in-command shall advise air traffic control (ATC) of a 'minimum fuel/energy' state by declaring 'MINIMUM FUEL' when the pilot-in-command has:

(1) committed to land at a specific aerodrome or operating site; and

(2) calculated that any change to the existing clearance to that aerodrome or operating site, or other air traffic delays, may result in landing with less than the planned final reserve fuel/energy.

(d) The pilot-in-command shall declare a situation of 'fuel/energy emergency' by broadcasting 'MAYDAY MAYDAY MAYDAY FUEL' when the usable fuel/energy estimated to be available upon landing at the nearest aerodrome or operating site where a safe landing can be made is less than the planned final reserve fuel/energy.".

Point NCC.OP.225 (Approach and landing conditions- aeroplanes) shall be amended, worded as follows:

"**NCC.OP.225 Approach and landing conditions- aeroplanes and helicopters**

Before commencing an approach operation, the pilot-in-command shall be satisfied that:

(a) the meteorological conditions at the aerodrome or the operating site and the condition of the runway/FATO intended to be used will not prevent a safe approach, landing or go-around, considering the performance information contained in the operations manual; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance; and

(4) flight crew qualifications.”.

Point NCC.OP.230 (Commencement and continuation of approach) shall be amended, worded as follows:

“**NCC.OP.230 Commencement and continuation of approach**

(a) For aeroplanes, if the reported visibility (VIS) or controlling RVR for the runway to be used for landing is less than the applicable minimum, then an instrument approach operation shall not be continued:

(1) past a point at which the aeroplane is 1 000 ft above the aerodrome elevation; or

(2) into the final approach segment (FAS) if the DH or MDH is higher than 1 000 ft.

(b) For helicopters, if the reported RVR is less than 550 m and the controlling RVR for the runway to be used for landing is less than the applicable minimum, then an instrument approach operation shall not be continued:

(1) past a point at which the helicopter is 1 000 ft above the aerodrome elevation; or

(2) into the FAS if the DH or MDH is higher than 1 000 ft.

(c) If the required visual reference is not established, a missed approach shall be executed at or before the DA/H or the MDA/H.

(d) If the required visual reference is not maintained after DA/H or MDA/H, a go-around shall be executed promptly.

(e) Notwithstanding point (a), in the case where no RVR is reported, and the reported VIS is less than the applicable minimum, but the converted meteorological visibility (CMV) is equal or greater than the applicable minimum, then the instrument approach can be continued to the DA/H or MDA/H.

(f) Notwithstanding points (a) and (b), if there is no intention to land, the instrument approach may be continued to the DA/H or the MDA/H. A missed approach shall be executed at or before the DA/H or the MDA/H.”.

After point NCC.OP.230 (Commencement and continuation of approach), a new point NCC.OP.235 shall be added, worded as follows:

“NCC.OP.235 EFVS 200 operations

(a) An operator that intends to conduct EFVS 200 operations with operational credits and without a specific approval shall ensure that:

(1) the aircraft is certified for the intended operations;

(2) only runways, FATOs and IAPs suitable for EFVS operations are used;

(3) the flight crew members are competent to conduct the intended operation, and a training and checking programme for the flight crew members and relevant personnel involved in the flight preparation is established;

(4) operating procedures are established;

(5) any relevant information is documented in the minimum equipment list (MEL);

(6) any relevant information is documented in the maintenance programme;

(7) safety assessments are carried out and performance indicators are established to monitor the level of safety of the operation; and

(8) the aerodrome operating minima take into account the capability of the system used.

(b) The operator shall not conduct EFVS 200 operations when conducting LVOs.

(c) Notwithstanding point (a)(1), the operator may use EVSs meeting the minimum criteria to conduct EFVS 200 operations, provided that this is approved by the competent authority.".

Article 27

In Addendum 1, Annex VI (Non-commercial air operations with complex motor-powered aircraft (Part-NCC), in Subpart C (Aircraft performance and operating limitations), in point NCC.POL.110 (Mass and balance data and documentation), paragraph (a), points (6) to (9) shall be amended, worded as follows:

"(6) mass of the fuel/energy at take-off and mass of trip fuel/energy;

(7) mass of consumables other than fuel/energy, if applicable;

(8) load components including passengers, baggage, freight, and ballast;

(9) take-off mass, landing mass, and zero fuel/energy mass;".

Article 28

In Addendum 1, Annex VI (Non-commercial air operations with complex motor-powered (Part-NCC), in Subpart D (Instruments, data and equipment), in Section 1 (Aeroplanes), point NCC.IDE.A.160 (Cockpit voice recorder), in paragraph (b) point (1), words: "on or after 1 January 2021" shall be replaced by words: "on or after 1 January 2022".

Article 29

In Addendum 1, annex VII (Non-commercial air operations with other than complex aircraft (Part-NCO)), in subpart B (Operational procedures), after point NCO.OP.100 (Use of aerodromes and operating sites), a new point NCO.OP.101 shall be added, worded as follows:

"**NCO.OP.101 Altimeter check and settings**

(a) The pilot-in-command shall check the proper operation of the altimeter before each departure.

(b) The pilot-in-command shall use appropriate altimeter settings for all phases of flight, taking into account any procedure prescribed by the State of the aerodrome or the State of the airspace.".

Point NCO.OP.105 (Specification of isolated aerodromes- aeroplanes) shall be deleted.

Point NCO.OP.110 (Aerodrome operating minima- aeroplanes and helicopters), NCO.OP.111 (Aerodrome operating minima- NPA, APV, CAT I operations) and NCO.OP.112 (Aerodrome operating minima- circling operations with aeroplanes) shall be amended as follows:

"**NCO.OP.110 Aerodrome operating minima - aeroplanes and helicopters**

(a) For instrument flight rules (IFR) flights, the pilot-in-command shall establish aerodrome operating minima for each departure, destination or alternate aerodrome that is

planned to be used in order to ensure separation of the aircraft from terrain and obstacles and to mitigate the risk of loss of visual references during the visual flight segment of instrument approach operations.

(b) The aerodrome operating minima shall take the following elements into account, if relevant:

(1) the type, performance, and handling characteristics of the aircraft;

(2) the equipment available on the aircraft for the purpose of navigation, acquisition of visual references, and/or control of the flight path during take-off, approach, landing, and missed approach;

(3) any conditions or limitations stated in the aircraft flight manual (AFM);

(4) the dimensions and characteristics of the runways/final approach and take-off areas (FATOs) that may be selected for use;

(5) the adequacy and performance of the available visual and non-visual aids and infrastructure;

(6) the obstacle clearance altitude/height (OCA/H) for the instrument approach procedures (IAPs), if established;

(7) the obstacles in the climb-out areas and clearance margins;

(8) the competence and relevant operational experience of the pilot-in-command;

(9) the IAP, if established;

(10) the aerodrome characteristics and the type of air navigation services (ANS) available, if any;

(11) any minima that may be promulgated by the State of the aerodrome;

(12) the conditions prescribed in any specific approvals for low-visibility operations (LVOs) or operations with operational credits.

NCO.OP.111 Aerodrome operating minima - 2D and 3D approach operations

(a) The decision height (DH) to be used for a 3D approach operation or a 2D approach operation flown with the continuous descent final approach (CDFA) technique shall not be lower than the highest of:

(1) the obstacle clearance height (OCH) for the category of aircraft;

(2) the published approach procedure DH or minimum descent height (MDH), where applicable;

(3) the system minimum specified in Table 1;

(4) the minimum DH specified in the AFM or equivalent document, if stated.

(b) The MDH for a 2D approach operation flown without the CDFA technique shall not be lower than the highest of:

(1) the OCH for the category of aircraft;

(2) the published approach procedure MDH, where applicable;

(3) the system minimum specified in Table 1; or

(4) the minimum MDH specified in the AFM, if stated.

Table 1
System minima

Facility	Lowest DH/MDH (ft)
ILS/MLS/GLS	200
GNSS/SBAS (LPV)	200
Precision approach radar (PAR)	200
GNSS/SBAS (LP)	250
GNSS (LNAV)	250
GNSS/Baro-VNAV (LNAV/VNAV)	250
Helicopter point-in-space approach	250
LOC with or without DME	250
SRA (terminating at ½ NM)	250
SRA (terminating at 1 NM)	300
SRA (terminating at 2 NM or more)	350
VOR	300
VOR/DME	250
NDB	350
NDB/DME	300
VDF	350

NCO.OP.112 Aerodrome operating minima - circling operations with aeroplanes

(a) The MDH for a circling approach operation with aeroplanes shall not be lower than the highest of:

(1) the published circling OCH for the aeroplane category;

(2) the minimum circling height derived from Table 1; or

(3) the DH/MDH of the preceding IAP.

(b) The minimum visibility for a circling approach operation with aeroplanes shall be the highest of:

(1) the circling visibility for the aeroplane category, if published; or

(2) the minimum visibility derived from Table 1.

Table 1
MDH and minimum visibility for circling per aeroplane category

	Aeroplane category			
	A	**B**	**C**	**D**
MDH (ft)	400	500	600	700
Minimum VIS (m)	1 500	1 500	2 400	3 600 “

Point NCO.OP.125 (Fuel and oil supply- aeroplanes) shall be amended, worded as follows:

“NCO.OP.125 Fuel/energy oil supply- aeroplanes and helicopters

(a) The pilot-in-command shall ensure that the quantity of fuel/energy and oil that is carried on board is sufficient, taking into account the meteorological conditions, any element affecting the performance of the aircraft, any delays that are expected in flight, and any contingencies that may reasonably be expected to affect the flight.

(b) The pilot-in-command shall plan a quantity of fuel/energy to be protected as final reserve fuel/energy to ensure a safe landing. The pilot-in-command shall take into account all of the following, and in the following order of priority, to determine the quantity of the final reserve fuel/energy:

(1) the severity of the hazard to persons or property that may result from an emergency landing after fuel/energy starvation; and

(2) the likelihood of unexpected circumstances that the final reserve fuel/energy may no longer be protected.

(c) The pilot-in-command shall commence a flight only if the aircraft carries sufficient fuel/energy and oil:

(1) when no destination alternate is required, to fly to the aerodrome or operating site of intended landing, plus the final reserve fuel/energy; or

(2) when a destination alternate is required, to fly to the aerodrome or operating site of intended landing, and thereafter, to an alternate aerodrome, plus the final reserve fuel/energy.".

Point NCO.OP.126 (Fuel and oil supply- helicopters) shall be deleted.

In point NCO.OP.135 (Flight preparation) paragraph (b) point (2) shall be amended, worded as follows:

"(2) the planning of an alternative course of action to provide for the eventuality that the flight cannot be completed as planned, because of meteorological conditions."

Point NCO.OP.140 (Destination alternate aerodromes- aeroplanes), NCO.OP.141 (Destination alternate aerodromes - helicopters) and NCO.OP.142 (Destination aerodromes- instrument approach) shall be amended, worded as follows:

"**NCO.OP.140 Destination alternate aerodromes - aeroplanes**

For IFR flights, the pilot-in-command shall specify at least one destination alternate aerodrome in the flight plan, unless the available current meteorological information for the destination indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period, a ceiling of at least 1 000 ft above the DH/MDH for an available instrument approach procedure (IAP) and a visibility of at least 5 000 m.

NCO.OP.141 Destination alternate aerodromes - helicopters

For IFR flights, the pilot-in-command shall specify at least one destination alternate aerodrome in the flight plan, unless the available current meteorological information for the destination indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival,

whichever is the shorter period, a ceiling of at least 1 000 ft above the DH/MDH for an available IAP and a visibility of at least 3 000 m.

NCO.OP.142 Destination alternate aerodromes - instrument approach operations

The pilot-in-command shall only select an aerodrome as a destination alternate aerodrome if either:

(a) an IAP that does not rely on GNSS is available either at the destination aerodrome or at a destination alternate aerodrome, or

(b) all of the following conditions are met:

(1) the onboard GNSS equipment is SBAS-capable;

(2) the destination aerodrome, any destination alternate aerodrome, and the route between them are within SBAS service area;

(3) ABAS is predicted to be available in the event of the unexpected unavailability of SBAS;

(4) an IAP is selected (either at destination or destination alternate aerodrome) that does not rely on the availability of SBAS;

(5) an appropriate contingency action allows the flight to be completed safely in the event of unavailability of GNSS.".

After point NCO.OP.142 (Destination alternate aerodromes - instrument approach operations) new points NCO.OP.143 and NCO.OP.144 shall be added, worded as follows:

"**NCO.OP.143 Destination alternate aerodromes planning minima - aeroplanes**

An aerodrome shall not be specified as a destination alternate aerodrome unless the available current meteorological information indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period:

(a) for an alternate aerodrome with an available instrument approach operation with DH less than 250 ft,

(1) a ceiling of at least 200 ft above the decision height (DH) or minimum descent height (MDH) associated with the instrument approach operation; and

(2) a visibility of at least 1 500 m; or

(b) for an alternate aerodrome with an instrument approach operation with DH or MDH 250 ft or more,

(1) a ceiling of at least 400 ft above the DH or MDH associated with the instrument approach operation; and

(2) a visibility of at least 3 000 m; or

(c) for an alternate aerodrome without an IAP,

(1) a ceiling of at least the higher of 2 000 ft and the minimum safe IFR height; and

(2) a visibility of at least 5 000 m.

NCO.OP.144 Destination alternate aerodromes planning minima - helicopters

An aerodrome shall not be specified as a destination alternate aerodrome unless the available current meteorological information indicates, for the period from 1 hour before until 1

hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period,

(a) for an alternate aerodrome with an IAP:

(1) a ceiling of at least 200 ft above the DH or MDH associated with the IAP; and

(2) a visibility of at least 1 500 m by day or 3 000 m by night; or

(b) for an alternate aerodrome without an IAP:

(1) a ceiling of at least the higher of 2 000 ft and the minimum safe IFR height; and

(2) a visibility of at least 1 500 m by day or 3 000 m by night.".

Point NCO.OP.145 (Refuelling with passengers embarking, on board or disembarking) shall be amended, worded as follows:

"**NCO.OP.145 Refuelling with passengers embarking, on board or disembarking**

(a) The aircraft shall not be refuelled with aviation gasoline (AVGAS) or wide-cut type fuel or a mixture of these types of fuel, when passengers are embarking, on board or disembarking.

(b) For all other types of fuel/energy, the aircraft shall not be refuelled when passengers are embarking, on board or disembarking, unless it is attended by the pilot-in-command or other qualified personnel ready to initiate and direct an evacuation of the aircraft by the most practical and expeditious means available.".

After point NCO.OP.145 (Refuelling with passengers embarking, on board or disembarking), a new point NCO.OP.147 shall be added, worded as follows:

"**NCO.OP.147 Refuelling with engine(s)and/or rotors turning –** helicopters

Refuelling with engine(s) and/or rotors turning shall only be conducted if all those conditions are met simultaneously:

(a) if it is not practical to shut down or restart the engine;

(b) in accordance with any specific procedures and limitations in the aircraft flight manual (AFM);

(c) with JET A or JET A-1 fuel types;

(d) with no passengers or task specialists on board, embarking or disembarking;

(e) if the operator of the aerodrome or operating site allows such operations;

(f) in the presence of the appropriate rescue and firefighting (RFF) facilities or equipment; and

(g) in accordance with a checklist that shall contain:

(1) normal and contingency procedures;

(2) the required equipment;

(3) any limitations; and

(4) responsibilities and duties of the pilot-in-command and, if applicable, crew members and task specialists.".

In point NCO.OP.160 (Meteorological conditions) paragraph (b), words: "weather conditions" shall be replaced by words: "meteorological conditions".

Point NCO.OP.175 (Take-off conditions- aeroplanes and helicopters) shall be amended, worded as follows:

"**NCO.OP.175 Take-off conditions - aeroplanes and helicopters**

Before commencing take-off, the pilot-in-command shall be satisfied that:

(a) according to the information available, the meteorological conditions at the aerodrome or the operating site and the condition of the runway/FATO intended to be used will not prevent a safe take-off and departure; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.".

Point NCO.OP.185 (In-flight fuel management) shall be amended, worded as follows:

"NCO.OP.185 In-flight fuel/energy management)

(a) The pilot-in-command shall monitor the amount of usable fuel/energy remaining on board to ensure that it is protected and not less than the fuel/energy that is required to proceed to an aerodrome or operating site where a safe landing can be made.

(b) The pilot-in-command of a controlled flight shall advise air traffic control (ATC) of a 'minimum fuel/energy' state by declaring 'MINIMUM FUEL' when the pilot-in-command has:

(1) committed to land at a specific aerodrome or operating site; and

(2) calculated that any change to the existing clearance to that aerodrome or operating site, or other air traffic delays, may result in landing with less than the planned final reserve fuel/energy.

(c) The pilot-in-command of a controlled flight shall declare a situation of 'fuel/energy emergency' by broadcasting 'MAYDAY MAYDAY MAYDAY FUEL' when the usable fuel/energy estimated to be available upon landing at the nearest aerodrome or operating site where a safe landing can be made is less than the planned final reserve fuel/energy.".

Point NCO.OP.205 (Conditions for approach and landing- aeroplanes), NCO.OP.206 (Conditions for approach and landing- helicopters) and NCO.OP.210 (Commencement and continuation of approach- aeroplanes and helicopters) shall be amended, worded as follows:

"**NCO.OP.205 Approach and landing conditions - aeroplanes**

Before commencing an approach to land, the pilot-in-command shall be satisfied that:

(a) according to the information available, the meteorological conditions at the aerodrome or the operating site, and the condition of the runway intended to be used will not prevent a safe approach, landing, or missed approach; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance, and

(4) flight crew qualifications.

NCO.OP.206 Approach and landing conditions - helicopters

Before commencing an approach to land, the pilot-in-command shall be satisfied that:

(a) according to the information available, the meteorological conditions at the aerodrome or the operating site and the condition of the final approach and take-off area (FATO) intended to be used will not prevent a safe approach, landing or missed approach; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.

NCO.OP.210 Commencement and continuation of approach - aeroplanes and helicopters

(a) If the controlling RVR for the runway to be used for landing is less than 550 m (or any lower value established in accordance with an approval under SPA.LVO), then an instrument approach operation shall not be continued:

(1) past a point at which the aircraft is 1 000 ft above the aerodrome elevation; or

(2) into the final approach segment if the DH or MDH is higher than 1 000 ft.

(b) If the required visual reference is not established, a missed approach shall be executed at or before the DA/H or the MDA/H.

(c) If the required visual reference is not maintained after DA/H or MDA/H, a go-around shall be executed promptly.”.

Article 30

In Addendum 1, annex VII (Non-commercial air operations with other than complex motor-powered aircraft (Part-NCO)), in Subpart E (Specific requirements), in Section 1 (General provisions) point NCO.SPEC.135 (Fuel and oil supply- aeroplanes) and NCO.SPEC.140 (Fuel and oil supply- helicopters) shall be deleted.

Article 31

In Addendum 1, Annex VIII (Specialised operations (Part-SPO)), in Subpart B (Operational procedures), after point SPO.OP.100 (Use of aerodromes and operating sites), a new point SPO.OP.101 shall be added, worded as follows:

“**SPO.OP.101 Altimeter check and settings**

(a) The operator shall establish procedures for altimeter checking before each departure.

(b) The operator shall establish procedures for altimeter settings for all phases of flight, which shall take into account the procedures established by the State of the airspace, if applicable.”.

Point SPO.OP.105 (Specification of isolated aerodromes- aeroplanes) and SPO.OP.110 (Aerodrome operating minima- aeroplanes and helicopters) shall be amended, worded as follows:

"**SPO.OP.105 Specification of isolated aerodromes- aeroplanes**

For the selection of alternate aerodromes and the fuel/energy planning and in-flight re-planning policy, the operator shall not consider an aerodrome as an isolated aerodrome unless the flying time to the nearest weather permissible destination alternate aerodrome is more than:

(a) for aeroplanes with reciprocating engines, 60 minutes; or

(b) for turbine-engined aeroplanes, 90 minutes.

SPO.OP.110 Aerodrome operating minima- aeroplanes and helicopters

(a) The operator shall establish aerodrome operating minima for each departure, destination or alternate aerodrome that is planned to be used in order to ensure separation of the aircraft from terrain and obstacles and to mitigate the risk of loss of visual references during the visual flight segment of instrument approach operations.

(b) The method used to establish aerodrome operating minima shall take all the following elements into account:

(1) the type, performance, and handling characteristics of the aircraft;

(2) the equipment available on the aircraft for the purpose of navigation, acquisition of visual references, and/or control of the flight path during take-off, approach, landing, and missed approach;

(3) any conditions or limitations stated in the aircraft flight manual (AFM);

(4) the dimensions and characteristics of the runways/final approach and take-off areas (FATOs) that may be selected for use;

(5) the adequacy and performance of the available visual and non-visual aids and infrastructure;

(6) the obstacle clearance altitude/height (OCA/H) for the instrument approach procedures (IAPs);

(7) the obstacles in the climb-out areas and the necessary clearance margins;

(8) any non-standard characteristics of the aerodrome, the IAP or the local environment;

(9) the composition of the flight crew, their competence and experience;

(10) the IAP;

(11) the aerodrome characteristics and the available air navigation services (ANS);

(12) any minima that may be promulgated by the State of the aerodrome;

(13) the conditions prescribed in any specific approvals for low-visibility operations (LVOs) or operations with operational credits; and

(14) the relevant operational experience of the operator.

(c) The operator shall specify a method of determining aerodrome operating minima in the operations manual.".

Point SPO.OP.111 (Aerodrome operating minima- NPA, APV, CAT I operations) shall be deleted.

Point SPO.OP.112 (Aerodrome operating minima- circling operations with aeroplanes) shall be amended, worded as follows:

"**SPO.OP.112 Aerodrome operating minima- circling operations with aeroplanes**

(a) The minimum descent height (MDH) for a circling approach operation with aeroplanes shall not be lower than the highest of:

(1) the published circling OCH for the aeroplane category;

(2) the minimum circling height derived from Table 1; or

(3) the decision height (DH)/MDH of the preceding IAP.

(b) The minimum visibility for a circling approach operation with aeroplanes shall be the highest of:

(1) the circling visibility for the aeroplane category, if published; or

(2) the minimum visibility derived from Table 1.

Table 1

MDH and minimum visibility for circling per aeroplane category

	Aeroplane category			
	A	**B**	**C**	**D**
MDH (ft)	400	500	600	700
Minimum VIS (m)	1 500	1 600	2 400	3 600 "

Point SPO.OP.130 (Refuelling gas and oil- aeroplanes) and SPO.OP.131 (Refuelling gas and oil- helicopters) shall be amended, worded as follows:

"**SPO.OP.130 Fuel/energy scheme- aeroplanes and helicopters**

(a) The operator shall establish, implement, and maintain a fuel/energy scheme that comprises:

(1) a fuel/energy planning and in-flight re-planning policy; and

(2) an in-flight fuel/energy management policy.

(b) The fuel/energy scheme shall:

(1) be appropriate for the type(s) of operation performed; and

(2) correspond to the capability of the operator to support implementation.

SPO.OP.131 Fuel/energy scheme- fuel/energy planning and in-flight re-planning policy- aeroplanes and helicopters

(a) As part of the fuel/energy scheme, the operator shall establish a fuel/energy planning and in-flight re-planning policy to ensure that the aircraft carries a sufficient amount of usable fuel/energy to safely complete the planned flight and to allow for deviations from the planned operation.

(b) The operator shall ensure that the fuel/energy planning of flights is based upon at least the following elements:

(1) procedures contained in the operations manual as well as:

(i) current aircraft-specific data derived from a fuel/energy consumption monitoring system or, if not available;

(ii) data provided by the aircraft manufacturer; and

(2) the operating conditions under which the flight is to be conducted including:

(i) aircraft fuel/energy consumption data;

(ii) anticipated masses;

(iii) anticipated meteorological conditions;

(iv) the effects of deferred maintenance items and/or configuration deviations; and

(v) anticipated delays.

(c) For aeroplanes, the operator shall ensure that the pre-flight calculation of the usable fuel/energy that is required for a flight includes:

(1) taxi fuel/energy that shall not be less than the amount expected to be used prior to take-off;

(2) trip fuel/energy that shall be the amount of fuel/energy that is required to enable the aeroplane to fly from take-off, or from the point of in-flight re-planning, to landing at the destination aerodrome;

(3) contingency fuel/energy that shall be the amount of fuel/energy required to compensate for unforeseen factors;

(4) destination alternate fuel/energy

(i) when a flight is operated with at least one destination alternate aerodrome, it shall be the amount of fuel/energy required to fly from the destination aerodrome to the destination alternate aerodrome; or

(ii) when a flight is operated with no destination alternate aerodrome, it shall be the amount of fuel/energy required to hold at the destination aerodrome to compensate for the lack of a destination alternate aerodrome;

(5) final reserve fuel/energy that shall be protected to ensure a safe landing; the operator shall take into account all of the following, and in the following order of priority, to determine the quantity of the final reserve fuel/energy:

(i) the severity of the hazard to persons or property that may result from an emergency landing after fuel/energy starvation;

(ii) the likelihood of unexpected circumstances that the final reserve fuel/energy may no longer be protected;

(6) additional fuel/energy, if required by the type of operation; it shall be the amount of fuel/energy to enable the aeroplane to perform a safe landing at a fuel/energy en route alternate aerodrome (fuel/energy ERA aerodrome critical scenario) in the event of an engine failure or loss of pressurisation, whichever requires the greater amount of fuel/energy, based on the assumption that such a failure occurs at the most critical point along the route; this additional fuel/energy is required only if the minimum amount of fuel/energy that is calculated according to points (c)(2) to (c)(5) is not sufficient for such an event;

(7) extra fuel/energy to take into account anticipated delays or specific operational constraints; and

(8) discretionary fuel/energy, if required by the pilot-in-command.

(d) For helicopters, the operator shall ensure that the pre-flight calculation of the usable fuel/energy that is required for a flight includes all of the following:

(1) fuel/energy to fly to the aerodrome or operating site of intended landing;

(2) if a destination alternate is required, destination alternate fuel/energy, which shall be the amount of fuel/energy that is required to execute a missed approach at the aerodrome or

operating site of intended landing, and thereafter, to fly to the specified destination alternate, approach and land; and

(3) final reserve fuel/energy, which shall be protected to ensure a safe landing; the operator shall take into account all of the following, and in the following order of priority, to determine the quantity of the final reserve fuel/energy:

(i) the severity of the hazard to persons or property that may result from an emergency landing after fuel/energy starvation; and

(ii) the likelihood of such unexpected circumstances that the final reserve fuel/energy may no longer be protected;

(4) extra fuel/energy to take into account anticipated delays or specific operational constraints; and

(5) discretionary fuel/energy, if required by the pilot-in-command.

(e) The operator shall ensure that, if a flight has to proceed to a destination aerodrome other than the one originally planned, in-flight re-planning procedures for calculating the required usable fuel/energy are available and comply with points (c)(2) to (c)(7) for aeroplanes, and point (d) for helicopters.

(f) The pilot in command shall only commence a flight or continue in the event of in-flight re-planning, when satisfied that the aircraft carries at least the planned amount of usable fuel/energy and oil to safely complete the flight.".

In point SPO.OP.140 (Flight preparation) paragraph (b) point (2) shall be amended, worded as follows:

"(2) the planning of an alternative course of action to provide for the eventuality that the flight cannot be completed as planned, because of meteorological conditions.".

After point SPO.OP.140 (Flight preparation) new points SPO.OP.143 and SPO.OP.144 shall be added:

"**SPO.OP.143 Destination alternate aerodromes planning minima - aeroplanes**

An aerodrome shall not be specified as a destination alternate aerodrome unless the available current meteorological information indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period,

(a) for an alternate aerodrome with an available instrument approach operation with DH less than 250 ft,

(1) a ceiling of at least 200 ft above the DH or MDH associated with the instrument approach operation; and

(2) a visibility of at least the higher of 1 500 m and 800 m above the instrument approach operation RVR/VIS minima; or

(b) for an alternate aerodrome with an instrument approach operation with DH or MDH 250 ft or more,

(1) a ceiling of at least 400 ft above the DH or MDH associated with the instrument approach operation; and

(2) a visibility of at least 3 000 m; or

(c) for an alternate aerodrome without an instrument approach procedure,

(1) a ceiling of at least the higher of 2 000 ft and the minimum safe IFR height; and

(2) a visibility of at least 5 000 m.

SPO.OP.144 Destination alternate aerodrome planning minima - helicopters

The operator shall only select an aerodrome as a destination alternate aerodrome if the available current meteorological information indicates, for the period from 1 hour before until 1 hour after the estimated time of arrival, or from the actual time of departure to 1 hour after the estimated time of arrival, whichever is the shorter period,

(a) for an alternate aerodrome with an IAP:

(1) a ceiling of at least 200 ft above the DH or MDH associated with the IAP; and

(2) a visibility of at least 1 500 m by day or 3 000 m by night; or

(b) for an alternate aerodrome without an IAP:

(1) a ceiling of at least 2 000 ft or the minimum safe IFR height, whichever is greater; and

(2) a visibility of at least 1 500 m by day or 3 000 m by night.".

In point SPO.OP.145 (Take-off alternate aerodromes - complex motor-powered aeroplanes) paragraph (a) words: "if the weather conditions" shall be replaced by "if the meteorological conditions".

In point SPO.OP.150 (Destination alternate aerodrome- aeroplanes) point (b) words: "the place of intended landing is isolated and:" shall be replaced by the following words: "if the place of intended landing is designated as an isolated aerodrome and:".

Point SPO.OP.155 (???) shall be amended, worded as follows:

"SPO.OP.155 Refuelling with persons embarking, on boarding or disembarking

(a) The aircraft shall not be refuelled with aviation gasoline (AVGAS) or wide-cut type fuel or a mixture of these types of fuel, when persons are embarking, on board or disembarking.

(b) For all other types of fuel/energy, necessary precautions shall be taken and the aircraft shall be properly manned by qualified personnel ready to initiate and direct an evacuation of the aircraft by the most practical and expeditious means available.".

After point SPO.OP.155 (Refuelling with persons embarking, on board or disembarking), a new point SPO.OP.157 shall be added, worded as follows:

"SPO.OP.157 Refuelling with engine(s)and/or rotors turning – helicopters

(a) Refuelling with engine(s) and/or rotors turning shall only be conducted:

(1) with no task specialists embarking or disembarking;

(2) if the operator of the aerodrome or operating site allows such operations;

(3) in accordance with any specific procedures and limitations in the aircraft flight manual (AFM);

(4) with JET A or JET A-1 fuel types; and

(5) in the presence of the appropriate rescue and firefighting (RFF) facilities or equipment.

(b) The operator shall assess the risks associated with refuelling with engine(s) and/or rotors turning.

(c) The operator shall establish appropriate procedures to be followed by all involved personnel, such as crew members, task specialists, and ground operations personnel.

(d) The operator shall ensure that its crew members, ground operations personnel, as well as any task specialist involved in the procedures, are appropriately trained.

(e) The operator shall ensure that the helicopter refuelling procedures with engine(s) and/or rotors turning are specified in the operations manual.".

In point SPO.OP.170 (Meteorological conditions) paragraph (b), words: "the weather conditions" shall be replaced by words: "the meteorological conditions".

Point SPO.OP.180 (Take-off conditions- aeroplanes and helicopters) shall be amended, worded as follows:

"**SPO.OP.180 Take-off conditions- aeroplanes and helicopters**

Before commencing take-off, the pilot-in-command shall be satisfied that:

(a) the meteorological conditions at the aerodrome or the operating site and the condition of the runway/FATO intended to be used will not prevent a safe take-off and procedure; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.".

Point SPO.OP.190 (In-flight fuel management) shall be amended, worded as follows:

"**SPO.OP.190 Fuel/energy scheme- in-flight fuel/energy management policy**

(a) The operator of complex motor-powered aircraft shall establish procedures to ensure that in-flight fuel/energy checks and fuel/energy management are performed.

(b) The pilot-in-command shall monitor the amount of usable fuel/energy remaining on board to ensure that it is protected and not less than the fuel/energy that is required to proceed to an aerodrome or operating site where a safe landing can be made.

(c) The pilot-in-command shall advise air traffic control (ATC) of a 'minimum fuel/energy' state by declaring 'MINIMUM FUEL' when the pilot-in-command has:

(1) committed to land at a specific aerodrome or operating site; and

(2) calculated that any change to the existing clearance to that aerodrome or operating site, or other air traffic delays, may result in landing with less than the planned final reserve fuel/energy.

(d) The pilot-in-command shall declare a situation of 'fuel/energy emergency' by broadcasting 'MAYDAY MAYDAY MAYDAY FUEL' when the usable fuel/energy estimated to be available upon landing at the nearest aerodrome or operating site where a safe landing can be made is less than the planned final reserve fuel/energy.".

Point SPO.OP.210 (Approach and landing conditions- aeroplanes) shall be amended, worded as follows:

“**SPO.OP.210 Approach and landing conditions - aeroplanes and helicopters**

Before commencing an approach operation, the pilot-in-command shall be satisfied that:

(a) the meteorological conditions at the aerodrome or the operating site and the condition of the runway/FATO intended to be used will not prevent a safe approach, landing or go-around, considering the performance information contained in the operations manual; and

(b) the selected aerodrome operating minima are consistent with all of the following:

(1) the operative ground equipment;

(2) the operative aircraft systems;

(3) the aircraft performance;

(4) flight crew qualifications.”.

“**SPO.OP.215 Commencement and continuation of approach**

(a) For aeroplanes, if the reported visibility (VIS) or controlling RVR for the runway to be used for landing is less than the applicable minimum, then an instrument approach operation shall not be continued:

(1) past a point at which the aeroplane is 1 000 ft above the aerodrome elevation; or

(2) into the final approach segment (FAS) if the DH or MDH is higher than 1 000 ft.

(b) For helicopters, if the reported RVR is less than 550 m and the controlling RVR for the runway to be used for landing is less than the applicable minimum, then an instrument approach operation shall not be continued:

(1) past a point at which the helicopter is 1 000 ft above the aerodrome elevation; or

(2) into the FAS if the DH or MDH is higher than 1 000 ft.

(c) If the required visual reference is not established, a missed approach shall be executed at or before the DA/H or the MDA/H.

(d) If the required visual reference is not maintained after DA/H or MDA/H, a go-around shall be executed promptly.

(e) Notwithstanding point (a), in the case where no RVR is reported, and the reported VIS is lower, but the converted meteorological visibility (CMV) is greater than the applicable minimum, then the instrument approach can be continued to the DA/H or MDA/H.

(f) Notwithstanding points (a) and (b), if there is no intention to land, the instrument approach may be continued to the DA/H or the MDA/H. A missed approach shall be executed at or before the DA/H or the MDA/H.”.

After point SPO.OP.230 (Standard operating procedures), a new point SPO.OP.235 shall be added, worded as follows:

“**SPO.OP.235 EFVS 200 operations**

(a) An operator that intends to conduct EFVS 200 operations with operational credits and without a specific approval shall ensure that:

(1) the aircraft is certified for the intended operations;

(2) only runways, FATOs and IAPs suitable for EFVS operations are used;

(3) the flight crew are competent to conduct the intended operation and a training and checking programme for the flight crew members and relevant personnel involved in the flight preparation is established;

(4) operating procedures are established;

(5) any relevant information is documented in the minimum equipment list (MEL);

(6) any relevant information is documented in the maintenance programme;

(7) safety assessments are carried out and performance indicators are established to monitor the level of safety of the operation; and

(8) the aerodrome operating minima take into account the capability of the system used.

(b) The operator shall not conduct EFVS 200 operations when conducting LVOs.

(c) Notwithstanding point (a)(1), the operator may use EVSs meeting the minimum criteria to conduct EFVS 200 operations, provided that this is approved by the competent authority.".

Article 32

In Addendum 1, Annex VIII (Special operations (Part-SPO), in Subpart C (Aircraft performance and operating limitations), point SPO.POL.110 (Mass and balance system- commercial operations with aeroplanes and helicopters and non-commercial operations with complex motor-powered aircraft) shall be amended, worded as follows:

"**SPO.POL.110 Mass and balance system – commercial operations with aeroplanes and helicopters and non-commercial operations with complex motor-powered aircraft**

(a) The operator shall establish a mass and balance system to determine for each flight or series of flights the following:

(1) aircraft dry operating mass;

(2) mass of the traffic load;

(3) mass of the fuel/energy load;

(4) aircraft load and load distribution;

(5) take-off mass, landing mass, and zero fuel/energy mass; and

(6) applicable aircraft centre of gravity (CG) positions.

(b) The flight crew shall be provided with a means of replicating and verifying any mass and balance computation based on electronic calculations.

(c) The operator shall establish procedures to enable the pilot-in-command to determine the mass of the fuel/energy load by using the actual density or, if not known, the density calculated in accordance with a method specified in the operations manual.".

In point SPO.POL.115 (Mass and balance data and documentation- commercial operations with aeroplanes and helicopters and non-commercial operations with complex motor-powered aircraft), in paragraph (a) points (6) to (9) shall be amended, worded as follows:

"(6) mass of the fuel energy at take-off and mass of trip fuel/energy;

(7) mass of consumables other than fuel/energy, if applicable;

(8) load components;

(9) take-off mass, landing mass, and zero fuel/energy mass;".

Article 33

In Addendum 1, Annex VIII (Specialised operations (Part SPO)), in Subpart D (Instruments, data, equipment), Section 1 (Aeroplanes), in point SPO.IDE.A.140 (Cockpit voice

recorder), paragraph (b) point (1), words: " on and after 1 January 2021" shall be replaced by words: "on and after 1 January 2022".

Article 34

In Addendum 2. (Additional conditions for the application of Regulation (EU) No 965/2012 in the Republic of Serbia), point 1. shall be amended, worded as follows:

"**Additional conditions for the application of Annex III (Part-ORO), Subpart GEN, point ORO.GEN.110 (Operator responsibilities) paragraph (c) and Subpart AOC, point ORO.AOC.135 (Personnel requirements) paragraph (b)**

The operator conducting commercial air transport operations, other than the operator conducting local operations within the airspace of the Republic of Serbia, shall assign, within the system of operational control as established in operations manual, the person holding a valid flight dispatcher licence, who cooperates with the pilot-in-command when deciding on commencement, continuation or deviating from the route for safety reasons which, among other, include:

- assisting pilot-in-command in flight preparation and delivering relevant information;
- assisting pilot-in-command in operational and ATS flight plan preparation, signing (when applicable) and submitting ATS flight plan to a relevant ATS unit;
- delivering in-flight information that may be necessary for the conduct of safe flight to pilot-in-command using the appropriate means of communication;
- notifying the appropriate ATS unit when the aircraft position cannot be determined based on aircraft tracking and when the attempts to start communication have been unsuccessful;
-in the event of danger, initiating implementation of procedures established in operations manual and avoiding to undertake any action contrary to air traffic control procedures;
- in the event of danger, delivering information as regards safety of the aircraft to the pilot-in-command, which may be necessary for the safe conduct of flight, including information related to changes to flight plan to be made during the flight.

Prior to being assigned responsibilities, the flight dispatcher must finish operator-specific training in a successful manner, as well as the check, conducted by the operator and including at least:

(1) the content of operations manual;

(2) radio-equipment and aircraft navigation equipment used by the operator;

(3) specific features of flight area and flights that the flight dispatcher shall be responsible for:

(1) seasonal meteorological conditions and sources of meteorological information;

(2) influence of meteorological conditions on radio-transmission in the aircraft operated;

(3) characteristics and limitations of each navigation system used when performing flights; and

(4) instruction for embarkation;

(4) specific features of aerodrome used by the operator.

The operator who conducts specific training and check shall assign instructor who meets the requirements as referred to in Acceptable Means of Compliance (AMC) which refer to point ORO.GEN.110.

The flight dispatcher that has been assigned by the operator, shall undergo recurrent training in accordance with Acceptable Means of Compliance (AMC) as referred to in point ORO.GEN.110.".

Article 35

Aeroplane and helicopter operators shall comply with the provisions of this Regulation within the timeframe of six months from the date of entry into force of this Regulation, and submit an application for relevant approval as specified in point CAT.OP.MPA.110 paragraph (d), CAT.OP.MPA.200 paragraph (c) and (d) or NCC.OP.157 paragraph (e), to the Civil Aviation Directorate of the Republic of Serbia, when the approval is required for performing certain operator's tasks.

Article 36

This Regulation shall enter into force on the eighth day from the date of its publishing in the "Official Gazette of the Republic of Serbia'.

No 5/1-01-0004/2023-0001

In Belgrade, 15 May 2023

Director

Mirjana Cizmarov

Addendum 1.

Appendix II

OPERATIONS SPECIFICATIONS (subject to the approved conditions in the operations manual)				
Issuing authority contact details: Phone (1): _____; Fax: _____; E-mail: _____				
AOC (2): Operator Name (3): Date (4): Signature: Dba trading name Operations specifications#:				
Aircraft model (5): Registration marks (6):				
Types of operations: Commercial air transport □ Passengers □ Cargo □ Others (7): _____				
Area of operation (8):				
Special limitations (9):				
Specific approvals:	Yes:	No:	Specification (10)	Remarks
Dangerous goods	□	□		
Low visibility operations Take-off Approach and landing Operational credits	□ □ □ □	□ □ □ □	 RVR (11): m CAT(12)…DA/H:ft,RVR:...m CAT(13)…DA/H: ft, RVR:..m	
RVSM (14) □ N/A	□	□	Maximum diversion time (16): min	
ETOPS (15) □ NA	□	□		(18)
Complex navigation specifications for PBN operations (17)	□	□		
Minimum navigation performance specification				
Operations of single-engined turbine aeroplane at night or in IMC (SET-IMC)	□	□	(19)	
Helicopter operations with the aid of night vision imaging systems	□	□		
Helicopter hoist operations	□	□		

Helicopter emergency medical service operations	□	□		
Helicopter offshore operations	□	□		
Cabin crew training [20]	□	□		
Issue of CC attestation [21]	□	□		
Use of type B EFB applications			[22]	
Continuing airworthiness	□	□	[23]	
Others [24]				

[1] Telephone and fax contact details of the competent authority, including the country code. Email to be provided if available.
[2] Insertion of associated air operation certificate (AOC) number.
[3] Insertion of the operator's registered name and the operator's trading name, if different. Insert "Dba" before the trading name (for "Doing business as").
[4] Issue date of the operations specifications (dd-mm-yyyy) and signature of the competent authority representative.
[5] Insertion of ICAO designation of the aircraft make, model and series, or master series, if a series has been designated (e.g. 737-3K2 or Boeing 777-232).
[6] The registration marks are listed either in the operations specifications or in the operations manual. In the latter case, the operations specifications must make a reference to the related page in the operation manual. In case not all specific approvals to the aircraft model, the registration marks of the aircraft may be entered in the remark column to the related specific approval to the aircraft model, the registration marks of the aircraft may be entered in the remark column to the related specific approval.
[7] Other type of transportation to be specified (e.g. emergency medical service).
[8] Listing of geographical area(s) of authorised operation (by geographical coordinates or specific routes, flight information national or regional boundaries).
[9] Listing of applicable special limitations (e.g. VFR only, Day only, etc.).
[10] List in this column the most permissive criteria for each approval or the approval type (with appropriate criteria).
[11] Insertion approved minimum take-off RVR in meters. One line per approval may be used if different approvals are granted.
[12] Insertion of applicable precision approach category: CAT II or CAT III. Insertion of minimum RVR in metres and DH in feet. One line is used per listed approach category.
[13] Insertion of applicable operational credit: SA CAT I, SA CAT II, EFVS, etc. Insertion of minimum RVR in metres and DH in feet. One line is used per listed operational credit.
[14] The Not applicable (N/A) box may be checked only if the aircraft maximum ceiling is below FL290.
[15] Extended range operations (ETOPS) currently applies only two-engined aircraft. Therefore, the not applicable (N/A) box may be checked if the aircraft model has more or less than two engines.
[16] The threshold distance may also be listed (in NM), as well as the engine type.

(17) Performance-based navigation (PBN): one line is issued for each complex PBN specific approval (e.g. RNP AR APCH), with approved limitations listed in the "Specifications" and/ or "Remarks" columns. Procedure-specific approvals or specific RNP AR APCH procedures may be listed in the operations specifications or in the operations manual. In the latter case, the related operations specifications must have a reference to the related page in the operations manual.
(18) Specify if the specific approval is limited to certain runway ends or aerodromes, or both.
(19) Insertion of the particular airframe or engine combination.
(20) Approval to conduct the training course and examination to be completed by applicants for a cabin crew attestation as specified in Annex V (Part-CC) to Regulation (EU) No 1178/2011.
(21) Approval to issue cabin crew attestations as specified in annex V (Part-CC) to Regulation (EU) No 1178/2011.
(22) Insertion of the list of type B EFB applications together with the reference of the EFB hardware (for portable EFBs). This list is contained either in the operations specifications or in the operations manual. In the latter case, the related operations specifications must make a reference to the related page in the operations manual.
(23) The name of the person or organisation responsible for ensuring that the continuing airworthiness of the aircraft is maintained and a reference to the regulation that requires the work, i.e. Subpart G of Annex I (Part-M) to Regulation (EU) No 1321/2014.
(24) Other approvals or data may be entered here, using one line (or one multi-line block) per authorisation (e.g. short landing operations, steep approach operations, reduced required landing distance, helicopter operations to or from a public interest site, helicopter operations over a hostile environment located outside a congested area, helicopter operations without a safe forced landing capability, operations with increased bank angles, maximum distance from an adequate aerodrome for two-engined aeroplanes without an ETOPS approval).

Addendum 2.

Appendix I

DECLARATION
in accordance with Commission Regulation (EU) No 965/2012 on air operations

Operator
Name:
Place in which the operator has its principal place of business or, if the operator has no principal place of business, place in which the operator is established or residing and place from which the operations are directed:
Name and contact details of the accountable manager:

Aircraft operation

Starting date of operation or applicability date of the change

Information on aircraft, operation and continuing airworthiness management organisation [1]:

Type(s) of aircraft, registration(s) and main base

Aircraft MSN [2]	Aircraft type	Aircraft registration [3]	Main base	Type(s) of operation [4]	Organisation responsible for the continuing airworthiness management [5]

Operator shall obtain a prior approval [6] or specific approval [7] for certain activities before conducting such operations.

Where applicable, details of approvals held. Attach the list of specific approvals. Include:
- specific approvals granted by a third country, if applicable;
- name of operations conducted with operational credits (e.g. EFVS 200, SA CAT I, etc.).

Where applicable, details of specialised operations authorisation held (attach authorisation(s), if applicable)

Where applicable, list of alternative means of compliance (AltMoC) with references to the associated AMC they replace (attach AltMoC).

Statements

□ The operator complies, and will continue to comply, with the essential requirements set out in Annex V to Regulation (EU) 2018/1139 of the European Parliament and of the Council and with the requirements of Regulation (EU) No 965/2012.

□ The management system documentation, including the operations manual, shall comply with the requirements of Annex III (Part-ORO), Annex V (Part-SPA), Annex VI (Part-NCC), or Annex VIII (Part-SPO) to Commission Regulation (EU) No 965/2012 and all flights will be carried out in accordance with the provisions of the operations manual as required by point ORO.GEN.110(b) of Part-ORO.

□ All operated aircraft shall hold:
- a valid certificate of airworthiness in accordance with Commission Regulation (EU) No 748/2012 or, for aircraft registered in a third country, in accordance with ICAO Annex 8; and
- when used for SPO activities, a valid lease agreement as per ORO.SPO.100.

□ All flight crew members shall hold a licence in accordance with Annex I to Commission Regulation (EU) No 1178/2011 as required by point ORO.FC.100(c) of Part-ORO, and cabin crew members shall, where applicable, be trained in accordance with Subpart CC of Part-ORO.

□ (If applicable)
The operator shall implement and demonstrate conformity to a recognised industry standard.
Reference of the standard:
Certification body:
Date of the last conformity audit:

□ The operator shall notify to the competent authority any changes in circumstances affecting its compliance with the essential requirements set out in Annex V to Regulation (EU) 2018/1139 and with the requirements of Commission Regulation (EU) No 965/2012 as declared to the competent authority through this declaration, and any changes to the information and lists of AltMoC included in and annexed to this declaration, as required by point ORO.GEN.120(a) of Part-ORO.

□ The operator shall confirm that the information disclosed in this declaration is correct.
Date, name and signature of the accountable manager
(1) If there is not enough space to list the information in the space of declaration, the information shall be listed in a separate annex. The annex shall be dated and signed. (2) Manufacturer serial number. (3) If the aircraft is also registered with an AOC holder, specify the AOC number of the AOC holder. (4) 'Type(s) of operation' refers to the type of operations conducted with this aircraft, e.g. non-commercial operations or specialised operations such as aerial photography flights, aerial advertising flights, news media flights, television and movie flights, parachute operations, skydiving, maintenance check flights. (5) Information about the organisation responsible for the continuing airworthiness management includes the name of the organisation, the address and the approval reference. (6) (a) operations with any defective instrument or piece of equipment or item or function, under a minimum equipment list (MEL) (points ORO.MLR.105 (b), (f), and (j), NCC.IDE.A.105, NCC.IDE.H.105, SPO.IDE.A.105, and SPO.IDE.H.105). (b) Operations requiring prior authorisation or approval, including all of the following: - for specialised operations, wet lease-in and dry lease-in of aircraft registered in a third country (point ORO.SPO.100 (c)); -high-risk commercial specialised operations with aircraft with a MOPSC of more than 19, which are performed without an operating cabin crew member (point ORO.CC.100(d)); -use of IFR operating minima that are lower than those published by the State (points NCC.OP.110 and SPO.OP.110); -refuelling with engine(s) and/or rotors turning (point NCC.OP.157); -specialised operations (SPO) without oxygen above 10 000 ft (point SPO.OP.195). (7) Operations in accordance with Annex V (Part-SPA) to Regulation (EU) No 965/2012, including Subparts B 'Performance-based navigation (PBN) operations', C 'Operations with specified minimum navigation performance (MNPS)', D 'Operations in airspace with reduced vertical separation minima (RVSM)', E 'Low-visibility operations (LVOs) and operations with operational credits', G 'Transport of dangerous goods', K 'Helicopter offshore operations' and N 'Helicopter point-in-space approaches and departures with reduced VFR minima'.