



EUROPEAN  
COMMISSION

Brussels, **XXX**  
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**COMMISSION REGULATION (EU) .../...**

**of **XXX****

**amending Commission Regulation (EU) No 965/2012, Commission Regulation (EU) No 1178/2011 and Commission Regulation (EU) No 139/2014 as regards all-weather operations**

# COMMISSION REGULATION (EU) .../...

of **XXX**

## **amending Commission Regulation (EU) No 965/2012, Commission Regulation (EU) No 1178/2011 and Commission Regulation (EU) No 139/2014 as regards all-weather operations**

THE EUROPEAN COMMISSION,

Having regard to the Treaty on the Functioning of the European Union,

Having regard to Regulation (EC) No 216/2008 of the European Parliament and of the Council of 20 February 2008 on common rules in the field of civil aviation and establishing a European Aviation Safety Agency, and repealing Council Directive 91/670/EEC, Regulation (EC) No 1592/2002 and Directive 2004/36/EC <sup>(1)</sup>, and in particular Articles 7 and 8(5) thereof,

Whereas:

- (1) Commission Regulation (EU) No 965/2012 <sup>(2)</sup> establishes conditions for the safe operation of aircraft.
- (2) Annex V to Commission Regulation (EU) No 965/2012 requires a specific approval for standard low-visibility operations; in order to enable the use of new technologies and to provide further operational flexibility beyond the limits of the defined standard operations, the concept of operations with operational credits is introduced in this Annex.
- (3) Annexes IV, VI, VII and VIII contain the requirements for operations not requiring specific approvals. In order to ensure consistency across all aviation domains and with the ICAO standards, a new operations classification is introduced.
- (4) Annex I contains the definitions of terms used in Annexes II to VIII; these definitions have to be consistent with the terminology used in the new operations classification and need to be updated to enable the use of new technologies.
- (5) Annex II contains the template for operations specifications; to ensure mutual, global recognition of European operations specifications, this template needs to be aligned with the amended template provided by ICAO.
- (6) Commission Regulation (EU) No 965/2012 should, therefore, be amended accordingly.
- (7) Commission Regulation (EU) No 1178/2011 <sup>(3)</sup> lays down detailed rules for pilot licensing.
- (8) Annex I (Part-FCL) to Commission Regulation (EU) No 1178/2011 contains the requirements for obtaining and maintaining pilot licences, ratings and certificates. The

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<sup>(1)</sup> OJ L 79, 19.3.2008, p. 1

<sup>(2)</sup> 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 (OJ L 296, 25.10.2012, p. 1).

<sup>(3)</sup> Commission Regulation (EU) No 1178/2011 of 3 November 2011 laying down technical requirements and administrative procedures related to civil aviation aircrew pursuant to Regulation (EC) No 216/2008 of the European Parliament and of the Council (OJ L 311, 25.11.2011, p. 1).

requirements related to the instrument rating (IR) (Subpart G of Part-FCL) also include rules with regard to extending IR privileges to fly aircraft under IFR with a decision height of less than 200 ft (60 m). These privileges for low-visibility operations (LVOs) can be obtained after having undergone specific training at an approved training organisation (ATO) as per Annex VII (Part-ORA) to Commission Regulation (EU) No 1178/2011 and after having passed a skill test as prescribed in Appendix 9 to Part-FCL. For the skill test programmes related to aeroplanes, powered-lift aircraft and airships, Appendix 9 to Part-FCL contains specific sections with training exercises dedicated to LVO (CAT II/III operations).

- (9) Following the principles of developing better regulation, it is recommended to group all the requirements for training, testing and checking for LVO in a single regulation. For this reason, and considering that LVO operations are invariably connected to operations approved in accordance with Commission Regulation (EU) No 965/2012, all requirements with regard to LVOs should be moved from Commission Regulation (EU) No 1178/2011 to Annex V (Part-SPA) to Commission Regulation (EU) No 965/2012, which already today also contains provisions on the qualification of an operator's flight crew involved in LVO operations. Consequently, training for LVOs should be moved from the scope of ATOs to the scope of operators approved in accordance with Annex V (Part-SPA) to Commission Regulation (EU) No 965/2012.
- (10) While the detailed contents of Appendix 9 to Part-FCL should be included in the acceptable means of compliance to Commission Regulation (EU) No 965/2012 Annex V (Part-SPA) in order to provide more flexibility, Commission Regulation (EU) No 1178/2011 Annex I (Part-FCL), including its Appendix 9, should be amended in such a way that all requirements related to LVOs are deleted.
- (11) Commission Regulation (EU) No 139/2014 lays down requirements and administrative procedures related to aerodromes.
- (12) Annex I to Commission Regulation (EU) No 139/2014 contains the definitions of terms used in Annex II to IV; these definitions have to be consistent with the terminology used in Commission Regulation (EU) No 965/2012 to enable the use of new technologies.
- (13) Annex IV to Commission Regulation (EU) No 139/2014 contains the requirements for surface movement guidance and control systems. The requirements for the design of the system have to consider the operational environment and operational requirements of aerodromes and the coordination with air traffic services.
- (14) Annex IV to Commission Regulation (EU) No 139/2014 contains the requirements for LVOs. These requirements have to be aligned with the requirements of Commission Regulation (EU) No 965/2012 to allow the use of new technologies.
- (15) The measures provided for in this Regulation are based on the opinion<sup>4</sup> issued by the European Aviation Safety Agency in accordance with Articles 17(2)(b) and 19(1) of Regulation (EC) No 216/2008.
- (16) The measures provided for in this Regulation are in accordance with the opinion of the committee established by Article 65 of Regulation (EC) No 216/2008,

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<sup>4</sup> European Aviation Safety Agency Opinion No .../... of ... for a Commission Regulation as regards all-weather operations.

HAS ADOPTED THIS REGULATION:

*Article 1*

Annexes I, II, IV, V, VI, VII and VIII to Commission Regulation (EU) No 965/2012 are amended in accordance with Annex I to this Regulation.

*Article 2*

Annex I to Commission Regulation (EU) No 1178/2011 is amended in accordance with Annex II to this Regulation.

*Article 3*

Annex I and IV to Commission Regulation (EU) No 139/2014 are amended in accordance with Annex III to this Regulation.

*Article 4*

This Regulation shall enter into force on the xxx day following that of its publication in the *Official Journal of the European Union*.

It shall apply from 1 January 2018.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Brussels,

*For the Commission*

*The President*

**ANNEX I**  
**to COMMISSION REGULATION (EU) .../...**  
**of ...**

**amending Commission Regulation (EU) No 965/2012, Commission Regulation (EU) No 1178/2011 and Commission Regulation (EU) No 139/2014 as regards all-weather operations**

Annexes I, II, IV, V, VI, VII and VIII to Commission Regulation (EU) No 965/2012 are amended as follows:

(1) In Annex I (Definitions):

(a) The following definitions are inserted:

“aerodrome operating minima” means the limits of usability of an aerodrome for:

- (a) take-off operations, expressed in terms of visibility and/or runway visual range (RVR) and, if necessary, cloud conditions;
- (b) two-dimensional (2D) instrument approach operations or circling approach operations, expressed in terms of visibility and/or RVR, minimum descent altitude/height (MDA/H) and, if necessary, cloud conditions; and
- (c) three-dimensional (3D) instrument approach operations, expressed in terms of visibility and/or RVR and decision altitude/height (DA/H);

“circling approach operation” means an instrument approach operation to bring an aircraft into position for landing on a runway/final approach and take-off area (FATO) that is not suitably located for a straight-in approach;

“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;

“final approach segment” means that segment of an instrument approach procedure in which alignment and descent for landing are accomplished;

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

“instrument approach operations” means an approach and landing using instruments for navigation guidance based on an instrument approach procedure. There are two methods for conducting instrument approach operations:

- (a) 2D instrument approach operation, using lateral navigation guidance only; and
- (b) 3D instrument approach operation, using both lateral and vertical navigation guidance;

“instrument approach procedures” 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. Instrument approach procedures are classified as follows:

- (a) non-precision approach (NPA) procedure, which means an instrument approach procedure designed for Type 2 2D instrument approach operations;
- (b) approach procedure with vertical guidance (APV) means a performance-based navigation (PBN) instrument approach procedure designed for Type A 3D instrument approach operations;
- (c) precision approach (PA) procedure means an instrument approach procedure based on navigation systems designed for Type A or B 3D instrument approach operations;

“low-visibility operations (LVOs)” means taxiing, approach or take-off operations with an RVR lower than 550 m;

“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 performed without the required visual reference;

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

“operation with an operational credit” means an operation using specific aircraft or ground equipment, or a combination of aircraft and ground equipment, such that lower than standard aerodrome operating minima can be applied for a particular classification of operation;

“Type A instrument approach operation” means an operation with a minimum MDA/H or DA/H at or above 250 ft;

“Type B instrument approach operation” means an operation with a minimum DA/H below 250 ft. Type B instrument approach operations are categorised as:

- (a) Category I (CAT I): a DA/H 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;
- (b) The following definitions are replaced by the following:
- “circling” means the visual phase of a circling approach operation;
- “continuous descent final approach (CDFA)” means a technique, consistent with stabilised approach procedures, for flying the final approach segment of a non-

precision approach procedure as a continuous descent, without level-off, from an altitude/height at or above the final approach fix altitude/height to a point approximately 15 m (50 ft) above the landing runway threshold or the point where the flare manoeuvre begins for the type of aircraft flown; for the final approach segment of a non-precision approach procedure followed by a circling, the CDFA technique applies until circling minima (Circling OCA/H) or visual flight manoeuvre altitude/height is reached;

“low-visibility take-off (LVTO)” means a take-off with a runway visual range (RVR) lower than 550 m. It is subcategorised into “LVTO I” which means a take-off with an RVR less than 550 m but not lower than 400 m, and “LVTO II” which means a take-off with an RVR less than 400 m;

“stabilised approach (SAp)” means an approach operation that is flown in a controlled and appropriate manner in terms of configuration, energy and control of the flight path from a predetermined point or altitude/height down to a point of 50 ft above the threshold or the point where the flare manoeuvre is initiated if higher;

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

“visual approach operation” means an approach operation when either part or all parts of an instrument approach procedure are not completed and the approach operation is executed with visual reference to the terrain;

“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 a safe landing will be possible;’

- (c) The following definitions are deleted:

“approach procedure with vertical guidance (APV) operation”;

“Category I (CAT I) approach operation”;

“Category II (CAT II) approach operation”;

“Category IIIA (CAT IIIA) approach operation”;

“Category IIIB (CAT IIIB) approach operation”;

“enhanced vision system (EVS)”;

“head-up display (HUD)”;

“head-up guidance landing system (HUDLS)”;

“low-visibility procedures (LVPs)”;

“lower-than-standard Category I (LTS CAT I) operation”;

“non-precision approach (NPA) operation”;

“other-than-standard Category II (OTS CAT II) operation”;

(2) In Annex II (Part-ARO):

(a) Appendix II is replaced by the following:

‘Appendix II

<b>OPERATIONS SPECIFICATIONS</b> (subject to the approved conditions in the operations manual)				
Issuing authority contact details Telephone <sup>1</sup> : _____; Fax: _____; E-mail: _____				
AOC <sup>2</sup> : _____ Operator's name <sup>3</sup> : _____ Date <sup>4</sup> : _____ Signature: _____ Dba trading name Operations specifications#:				
Aircraft model <sup>5</sup> : Registration marks <sup>6</sup> :				
<input type="checkbox"/> Commercial operations				
Area of operation <sup>7</sup> :				
Special limitations <sup>8</sup> :				
Specific approvals:	Yes	No	Specification <sup>9</sup>	Remarks
Dangerous goods	<input type="checkbox"/>	<input type="checkbox"/>		
Low-visibility operations			CAT <sup>10</sup> ....	
Take-off	<input type="checkbox"/>	<input type="checkbox"/>	RVR <sup>11</sup> : m	
Approach and landing	<input type="checkbox"/>	<input type="checkbox"/>	DA/H: ft, RVR: m	
Operational credits	<input type="checkbox"/>	<input type="checkbox"/>	DA/H: ft, RVR: m	
RVSM <sup>12</sup> N/A	<input type="checkbox"/>	<input type="checkbox"/>		
ETOPS <sup>13</sup> N/A	<input type="checkbox"/>	<input type="checkbox"/>	Maximum diversion time <sup>14</sup> : min.	
Complex navigation specifications for PBN operations <sup>15</sup>	<input type="checkbox"/>	<input type="checkbox"/>		16



Minimum navigation performance specification	<input type="checkbox"/>	<input type="checkbox"/>		
Helicopter operations with the aid of night-vision imaging systems	<input type="checkbox"/>	<input type="checkbox"/>		
Helicopter hoist operations	<input type="checkbox"/>	<input type="checkbox"/>		
Helicopter emergency medical service operations	<input type="checkbox"/>	<input type="checkbox"/>		
Helicopter offshore operations	<input type="checkbox"/>	<input type="checkbox"/>		
Cabin crew training <sup>17</sup>	<input type="checkbox"/>	<input type="checkbox"/>		
Issue of CC attestation <sup>18</sup>	<input type="checkbox"/>	<input type="checkbox"/>		
Continuing airworthiness	<input type="checkbox"/>	<input type="checkbox"/>	<sup>19</sup>	
Others <sup>20</sup>				

(3) In Annex IV (Part-CAT):

(a) CAT.OP.MPA.107 is replaced by the following:

‘CAT.OP.MPA.107 Adequate aerodrome

The operator shall only select 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 reporting, navigation aids and emergency services.’

(b) CAT.OP.MPA.110 is replaced by the following:

‘CAT.OP.MPA.110 Aerodrome operating minima

(a) The operator shall establish aerodrome operating minima for each departure, destination or alternate aerodrome planned to be used to mitigate the risk of insufficient separation of the aircraft to terrain and obstacles and loss of visual references during the visual flight segment of an instrument operation.

(b) When establishing aerodrome operating minima for a specific operation, the operator shall in particular take into account the instrument procedure, aerodrome characteristics, available air navigation services (ANS), the aircraft performance and capabilities, the flight crew qualifications, any limitations from specific approvals and any limitations established by the State in which the aerodrome is located.

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

(c) CAT.OP.MPA.115 is replaced by the following:

‘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 instrument approach procedure to a particular runway.
- (b) The continuous descent final approach (CDFA) technique shall be used for non-precision approach (NPA) procedures except for such particular runways for which the competent authority has approved another flight technique.’
- (d) CAT.OP.MPA.185 is replaced by the following:

‘CAT.OP.MPA.185 Planning minima for IFR flights — aeroplanes

- (a) Planning minima for a take-off alternate aerodrome

The operator shall only select an aerodrome as a take-off alternate aerodrome when the appropriate meteorological reports and/or forecasts indicate that, during a period commencing 1 hour before and ending 1 hour after the estimated time of arrival at the aerodrome, the meteorological conditions will be at or above the established aerodrome operating minima.

- (b) Planning minima for a destination aerodrome other than an isolated destination aerodrome.

The operator shall only select the destination aerodrome when:

- (1) the appropriate meteorological reports and/or forecasts indicate that, during a period commencing 1 hour before and ending 1 hour after the estimated time of arrival at the aerodrome, the meteorological conditions will be at or above the established aerodrome operating minima, or
- (2) two destination alternate aerodromes are selected.
- (c) Planning minima for a destination alternate aerodrome, isolated aerodrome, fuel en-route alternate (fuel ERA) aerodrome, en-route alternate (ERA) aerodrome

The operator shall only select an aerodrome for one of these purposes when the appropriate weather reports and/or forecasts indicate that, during a period commencing 1 hour before and ending 1 hour after the estimated time of arrival at the aerodrome, the meteorological conditions will be at or above the planning minima specified in the operations manual ( OM).’

- (e) CAT.OP.MPA.186 is replaced by the following:

‘CAT.OP.MPA.186 Planning minima for IFR flights — helicopters

- (a) Planning minima for a take-off alternate aerodrome

The operator shall only select an aerodrome or landing site as a take-off alternate aerodrome when the appropriate meteorological reports and/or forecasts indicate that, during a period commencing 1 hour before and ending 1 hour after the estimated time of arrival at the take-off alternate aerodrome, the weather conditions will be at or above the established aerodrome operating minima.

- (b) Planning minima for a destination aerodrome and destination alternate aerodrome(s)

The operator shall only select the destination and/or destination alternate aerodrome(s) when the appropriate meteorological reports and/or forecasts indicate that, during a period commencing 1 hour before and ending 1 hour after the estimated time of arrival at the aerodrome or operating site, the meteorological conditions will be at or above the applicable planning minima specified in the operations manual OM.'

- (f) CAT.OP.MPA.265 is replaced by the following:

'CAT.OP.MPA.265 Take-off conditions

Before commencing take-off, the commander shall verify that:

- (a) the meteorological conditions at the aerodrome or 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 minimum is consistent with:
  - (1) the operative ground equipment;
  - (2) the operative aircraft systems;
  - (3) the aircraft performance; and
  - (4) flight crew qualifications.'

- (g) CAT.OP.MPA.300 is replaced by the following:

CAT.OP.MPA.300 Approach and landing conditions

Before commencing an approach operation, the commander shall verify that:

- (a) the meteorological conditions at the aerodrome or operating site and the condition of the runway/FATO intended to be used will not prevent a safe approach, landing or go-around; and
- (b) the selected aerodrome operating minima are consistent with:
  - (1) the operative ground equipment;
  - (2) the operative aircraft systems;
  - (3) the aircraft performance; and
  - (4) flight crew qualifications.'

- (h) CAT.OP.MPA.305 is replaced by the following:

'CAT.OP.MPA.305 Commencement and continuation of an approach operation

- (a) The commander, or the pilot to whom conduct of the flight has been delegated, may commence an instrument approach regardless of the reported RVR/VIS.
- (b) If the reported relevant RVR/VIS is less than the applicable minimum, the approach operation shall not be continued:
  - (1) below 1 000 ft above the aerodrome; or

- (2) into the final approach segment in the case where the DA/H or MDA/H is more than 1 000 ft above the aerodrome.
- (c) Where the RVR is not available, RVR values may be derived by converting the reported visibility.
- (d) If, after passing 1 000 ft above the aerodrome, the reported RVR/VIS falls below the applicable minimum, the approach may be continued to DA/H or MDA/H.
- (e) The approach operation may be continued below DA/H or MDA/H and the landing may be completed provided that the visual reference adequate for the type of approach operation and for the intended runway/FATO is established at the DA/H or MDA/H and is maintained.'
- (i) CAT.OP.MPA.310 is replaced by the following:

'CAT.OP.MPA.310 Operating procedures — threshold crossing height — aeroplanes

The operator shall establish operational procedures designed to ensure that an aeroplane conducting Type B approach operations crosses the threshold of the runway by a safe margin, with the aeroplane in the landing configuration and attitude.'
- (4) In Annex V (Part-SPA):
  - (a) SPA.GEN.100(b) is replaced by the following:

'(b) Notwithstanding (a)(2), for non-commercial operators using aircraft registered in a third country, the applicable requirements under this Annex for the approval of the following operations shall not apply if these approvals are issued by a third-country State of Registry:

    - (1) performance-based navigation (PBN);
    - (2) minimum operational performance specifications (MNPS);
    - (3) reduced vertical separation minima (RVSM) airspace; and
    - (4) low-visibility operations.'
  - (b) The heading of Subpart E is replaced by the following:

'SUBPART E:

LOW-VISIBILITY OPERATIONS (LVOs) AND OPERATIONS WITH OPERATIONAL CREDITS'
  - (c) SPA.LVO.100 is replaced by the following:

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

The operator shall only conduct the following operations when approved by the competent authority:

    - (a) standard take-off operations with visibility conditions less than 400 m RVR;
    - (b) standard approach operations with visibility conditions less than 550 m RVR; and

- (c) operations with operational credits.’
- (d) SPA.LVO.105 is replaced by the following:

‘SPA.LVO.105 Specific approval criteria

To obtain a specific approval from the competent authority for LVOs and/or operations with operational credits, the operator shall demonstrate for the intended operations that:

- (a) the aircraft is certified and information relevant to the aircraft capabilities is stated in the aircraft flight manual (AFM) or in any other document approved by the certifying authority;
  - (b) the flight crew is competent to conduct the intended operation, and a training and checking programme is established for the flight crew and relevant personnel involved in the flight preparation;
  - (c) operating procedures are established, specifying:
    - (1) normal, abnormal and contingency procedures;
    - (2) flight crew composition, qualification, experience and recency;
    - (3) aerodrome facilities and air navigation services;
    - (4) reportable events;
  - (d) any relevant information is included in the minimum equipment list (MEL);
  - (e) any relevant information is included in the maintenance programme; and
  - (f) safety assessments are carried out and performance indicators are established to evaluate conditions for ensuring continuous safe operations.’
- (e) SPA.LVO.110 is replaced by the following:
- ‘SPA.LVO.110 ATM/ANS and aerodrome-related requirements
- (a) The operator shall ensure that the flight crew uses an instrument procedure and an aerodrome that are suitable for the intended operation.
  - (b) The operator shall conduct an operational assessment for any aerodrome, where the instrument procedure design criteria significantly deviate from those published in PANS-OPS Volume II.’

- (f) SPA.LVO.120 is replaced by the following:

‘SPA.LVO.120 Flight crew competence

- (a) The operator shall ensure that the flight crew is competent to conduct the intended operation.
- (b) The operator shall establish a flight crew training and checking programme that each flight crew member shall successfully complete. Such programme shall:
  - (1) include an initial and a recurrent training and checking part;
  - (2) include normal, abnormal and emergency procedures;

- (3) be adapted to the type of technologies used in the intended operations; and
      - (4) take into account the human factor risks associated to the intended operations.
    - (c) The operator shall be responsible for keeping records of the qualifications of the flight crew.
    - (d) The training and checking shall be conducted by personnel competent to conduct the intended operations and qualified in accordance with Annex I (Part-FCL) to Regulation (EU) No 1178/2011.'
  - (g) SPA.LVO.115, 125 and 130 are deleted.
- (5) In Annex VI (Part-NCC):
- (a) NCC.OP.110 is replaced by the following:

'NCC.OP.110 Aerodrome operating minima — general

    - (a) For instrument flight rules (IFR) flights, the operator shall establish aerodrome operating minima for each departure, destination or alternate aerodrome planned to be used to mitigate the risk of insufficient separation of the aircraft from terrain and obstacles, as well as the risk of loss of visual references during the visual flight segment of an instrument operation.
    - (b) When establishing aerodrome operating minima for a specific operation, the operator shall in particular take into account the instrument procedure, aerodrome characteristics, available air navigation services, the aircraft performance and capabilities, the flight crew qualifications, any limitations from specific approvals, and any limitations established by the State in which the aerodrome is located.'
  - (b) NCC.OP.111 is replaced by the following:

'NCC.OP.111 Aerodrome operating minima — Type A and Type B CAT I approach operations

    - (a) The decision altitude/height (DA/H) for a 3D approach operation shall not be lower than:
      - (1) the obstacle clearance altitude/height (OCA/H) for the aircraft category;
      - (2) the published DA/H of the instrument procedure, where applicable;
      - (3) the system minimum specified in Table 1; nor
      - (4) the minimum DA/H specified in the AFM or equivalent document, where applicable.
    - (b) The minimum descent altitude/height (MDA/H) for a 2D approach operation shall not be lower than:
      - (1) the OCA/H for the aircraft category;
      - (2) the published MDA/H of the instrument procedure, where applicable;
      - (3) the system minimum specified in Table 1; and

- (4) the minimum MDA/H specified in the AFM or equivalent document, where applicable.

Table 1

System minima

Facility	Lowest DA/H, MDA/H (ft)
Instrument landing system (ILS)	200
Ground-based augmentation system (GBAS)	200
Global navigation satellite system (GNSS)/Satellite-based augmentation system (SBAS) (Lateral precision with vertical guidance approach (LPV))	200
GNSS (Lateral navigation (LNAV))	250
GNSS/Baro-vertical navigation (VNAV) (LNAV/VNAV)	250
Localiser (LOC) with or without distance-measuring equipment (DME)	250
Surveillance radar approach (SRA) (terminating at 0.5 NM)	250
VHF omnidirectional radio range (VOR)/DME	250
VOR	300
SRA (terminating at 1 NM)	300
SRA (terminating at 2 NM or more)	350
Non-directional beacon (NDB)/DME	300
NDB	350
VHF direction finder (VDF)	350'

- (c) NCC.OP.112 is replaced by the following:

‘NCC.OP.112 Aerodrome operating minima — circling approach operations with aeroplanes

- (a) The MDA/H for a circling approach operation with aeroplanes shall not be lower than:
- (1) the published circling OCA/H for the aeroplane category;
  - (2) the MDA/H for circling approach operations derived from Table 1; nor

- (3) the DA/H or MDA/H of the preceding instrument approach operation.
- (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;
  - (2) the minimum visibility derived from Table 1; and
  - (3) the runway visual range/converted meteorological visibility (RVR/CMV) of the preceding instrument approach operation.

Table 1

MDA/H and minimum visibility for circling approach operations for aeroplane categories

	Aeroplane categories			
	A	B	C	D
MDA/H (ft)	400	500	600	700
Minimum meteorological visibility (m)	1 500	1 600	2 400	3 600'

- (d) NCC.OP.113 is replaced by the following:  
 'NCC.OP.113 Aerodrome operating minima — onshore circling approach operations with helicopters  
 The MDA/H for an onshore circling approach operation with helicopters shall not be lower than 250 ft and the meteorological visibility not less than 800 m.'
- (e) NCC.OP.195 is replaced by the following:  
 'NCC.OP.195 Take-off conditions  
 Before commencing take-off, the pilot-in-command shall verify that:
  - (a) the meteorological conditions at the aerodrome or 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 minimum is consistent with:
    - (1) the operative ground equipment;
    - (2) the operative aircraft systems;
    - (3) the aircraft performance; and
    - (4) flight crew qualifications.'
- (f) NCC.OP.225 is replaced by the following:  
 'NCC.OP.225 Approach and landing conditions



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

- (a) the meteorological conditions at the aerodrome or operating site and the condition of the runway/FATO intended to be used will not prevent a safe approach, landing or go-around; and
- (b) the selected aerodrome operating minima are consistent with:
  - (1) the operative ground equipment;
  - (2) the operative aircraft systems;
  - (3) the aircraft performance; and
  - (4) flight crew qualifications.’
- (g) NCC.OP.230 is replaced by the following:

‘NCC.OP.230 Commencement and continuation of an approach operation

  - (a) The pilot-in-command may commence an instrument approach regardless of the reported RVR/visibility (VIS).
  - (b) If the reported relevant RVR/VIS is less than the applicable minimum, the approach operation shall not be continued:
    - (1) below 1 000 ft above the aerodrome; or
    - (2) into the final approach segment in the case where the DA/H or MDA/H is more than 1 000 ft above the aerodrome.
  - (c) Where the RVR is not available, RVR values may be derived by converting the reported visibility.
  - (d) If, after passing 1 000 ft above the aerodrome, the reported RVR/VIS falls below the applicable minimum, the approach may be continued to DA/H or MDA/H.
  - (e) The approach operation may be continued below DA/H or MDA/H and the landing may be completed provided that the visual reference adequate for the type of approach operation and for the intended runway/FATO is established at the DA/H or MDA/H and is maintained.
  - (f) The touchdown zone RVR shall always be controlling.’

(6) In Annex VII (Part-NCO):

- (a) NCO.OP.110 is replaced by the following:

‘NCO.OP.110 Aerodrome operating minima — aeroplanes and helicopters

  - (a) For instrument flight rules (IFR) flights, the pilot-in-command shall specify the aerodrome operating minima for each departure, destination or alternate aerodrome planned to be used to mitigate the risk of insufficient separation of the aircraft from terrain and obstacles, as well as the risk of loss of visual references during the visual flight segment of an instrument operation.
  - (b) When specifying the aerodrome operating minima, the pilot-in-command shall take into account the instrument procedure, aerodrome characteristics, available air navigation services, the aircraft performance

and capabilities, any limitations from specific approvals, and any limitations established by the State in which the aerodrome is located.’

(b) NCO.OP.111 is replaced by the following:

‘NCO.OP.111 Aerodrome operating minima — Type A and Type B CAT I approach operations

- (a) The decision altitude/height (DA/H) for a 3D approach operation shall not be lower than:
  - (1) the obstacle clearance altitude/height (OCA/H) for the aircraft category;
  - (2) the published DA/H of the instrument procedure, where applicable;
  - (3) the system minimum specified in Table 1; nor
  - (4) the minimum DA/H specified in the AFM or equivalent document, where applicable.
- (b) The minimum descent altitude/height (MDA/H) for a 2D approach operation shall not be lower than:
  - (1) the OCA/H for the aircraft category;
  - (2) the published MDA/H of the instrument procedure, where applicable;
  - (3) the system minimum specified in Table 1; and
  - (4) the minimum MDA/H specified in the AFM or equivalent document, where applicable.

Table 1

System minima

Facility	Lowest DA/H, MDA/H (ft)
Instrument landing system (ILS)	200
Ground-based augmentation system (GBAS)	200
Global navigation satellite system (GNSS)/Satellite-based augmentation system (SBAS) (Lateral precision with vertical guidance approach (LPV))	200
GNSS (Lateral navigation (LNAV))	250
GNSS/Baro-vertical navigation (VNAV) (LNAV/VNAV)	250
Localiser (LOC) with or without distance-measuring equipment (DME)	250
Surveillance radar approach (SRA) (terminating at 0.5 NM)	250

VHF omnidirectional radio range (VOR)/DME	250
VOR	300
SRA (terminating at 1 NM)	300
SRA (terminating at 2 NM or more)	350
Non-directional beacon (NDB)/DME	300
NDB	350
VHF direction finder (VDF)	350

(c) NCO.OP.112 is replaced by the following:

‘NCO.OP.112 Aerodrome operating minima — circling approach operations with aeroplanes

(a) The MDA/H for a circling approach operation with aeroplanes shall not be lower than:

- (1) the published circling OCA/H for the aeroplane category;
- (2) the MDA/H for circling approach operations derived from Table 1; nor
- (3) the DA/H or MDA/H of the preceding instrument approach operation.

(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;
- (2) the minimum visibility derived from Table 1; and
- (3) the runway visual range/converted meteorological visibility (RVR/CMV) of the preceding instrument approach operation.

Table 1

MDA/H and minimum visibility for circling approach operations for aeroplane categories

	Aeroplane categories			
	A	B	C	D
MDA/H (ft)	400	500	600	700
Minimum meteorological visibility (m)	1 500	1 600	2 400	3 600’

- (d) NCO.OP.113 is replaced by the following:  
'NCO.OP.113 Aerodrome operating minima — onshore circling approach operations with helicopters  
The MDA/H for an onshore circling approach operation with helicopters shall not be lower than 250 ft and the meteorological visibility not less than 800 m.'
- (e) NCO.OP.175 is replaced by the following:  
'NCO.OP.175 Take-off conditions — aeroplanes and helicopters  
Before commencing take-off, the pilot-in-command shall verify that:
- (a) the meteorological conditions at the aerodrome or 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 applicable aerodrome operating minimum will be complied with.'
- (f) NCO.OP.205 is replaced by the following:  
'NCO.OP.205 Approach and landing conditions — aeroplanes and helicopters  
Before commencing an approach operation, the pilot-in-command shall verify 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; and
  - (b) the applicable aerodrome operating minima will be complied with.'
- (g) NCO.OP.210 is replaced by the following:  
'NCO.OP.210 Commencement and continuation of an approach operation — aeroplanes and helicopters
- (a) The pilot-in-command may commence an instrument approach regardless of the reported RVR/visibility (VIS).
  - (b) If the reported relevant RVR/VIS is less than the applicable minimum, the approach operation shall not be continued:
    - (1) below 1 000 ft above the aerodrome; or
    - (2) into the final approach segment in the case where the DA/H or MDA/H is more than 1 000 ft above the aerodrome.
  - (c) Where the RVR is not available, RVR values may be derived by converting the reported visibility.
  - (d) If, after passing 1 000 ft above the aerodrome, the reported RVR/VIS falls below the applicable minimum, the approach may be continued to DA/H or MDA/H.
  - (e) The approach operation may be continued below DA/H or MDA/H and the landing may be completed provided that the visual reference adequate for the type of approach operation and for the intended runway/FATO is established at the DA/H or MDA/H and is maintained.
  - (f) The touchdown zone RVR shall always be controlling.'

(7) In Annex VIII (Part-SPO):

(a) SPO.OP.110 is replaced by the following:

‘SPO.OP.110 Aerodrome operating minima — aeroplanes and helicopters

- (a) For instrument flight rules (IFR) flights, the pilot-in-command shall specify the aerodrome operating minima for each departure, destination or alternate aerodrome planned to be used to mitigate the risk of insufficient separation of the aircraft from terrain and obstacles, as well as the risk of loss of visual references during the visual flight segment of an instrument operation.
- (b) When specifying the aerodrome operating minima, the pilot-in-command shall take into account the instrument procedure, aerodrome characteristics, available air navigation services, the aircraft performance and capabilities, any limitations from specific approvals, and any limitations established by the State in which the aerodrome is located.’

(b) SPO.OP.111 is replaced by the following:

‘SPO.OP.111 Aerodrome operating minima — Type A and Type B CAT I approach operations

- (a) The decision altitude/height (DA/H) for a 3D approach operation shall not be lower than:
  - (1) the obstacle clearance altitude/height (OCA/H) for the aircraft category;
  - (2) the published DA/H of the instrument procedure, where applicable;
  - (3) the system minimum specified in Table 1; nor
  - (4) the minimum DA/H specified in the AFM or equivalent document, where applicable.
- (b) The minimum descent altitude/height (MDA/H) for a 2D approach operation shall not be lower than:
  - (1) the OCA/H for the aircraft category;
  - (2) the published MDA/H of the instrument procedure, where applicable;
  - (3) the system minimum specified in Table 1; and
  - (4) the minimum MDA/H specified in the AFM or equivalent document, where applicable.

Table 1

System minima

Facility	Lowest DA/H, MDA/H (ft)
Instrument landing system (ILS)	200
Ground-based augmentation system (GBAS)	200

Global navigation satellite system (GNSS)/Satellite-based augmentation system (SBAS) (Lateral precision with vertical guidance approach (LPV))	200
GNSS (Lateral navigation (LNAV))	250
GNSS/Baro-vertical navigation (VNAV) (LNAV/VNAV)	250
Localiser (LOC) with or without distance-measuring equipment (DME)	250
Surveillance radar approach (SRA) (terminating at 0.5 NM)	250
VHF omnidirectional radio range (VOR)/DME	250
VOR	300
SRA (terminating at 1 NM)	300
SRA (terminating at 2 NM or more)	350
Non-directional beacon (NDB)/DME	300
NDB	350
VHF direction finder (VDF)	350'

(c) SPO.OP.112 is replaced by the following:

‘SPO.OP.112 Aerodrome operating minima — circling approach operations with aeroplanes

(a) The MDA/H for a circling approach operation with aeroplanes shall not be lower than:

- (1) the published circling OCA/H for the aeroplane category;
- (2) the MDA/H for circling approach operations derived from Table 1; nor
- (3) the DA/H or MDA/H of the preceding instrument approach operation.

(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;
- (2) the minimum visibility derived from Table 1; and
- (3) the runway visual range/converted meteorological visibility (RVR/CMV) of the preceding instrument approach operation.

Table 1

MDA/H and minimum visibility for circling approach operations for aeroplane categories

	Aeroplane categories			
	A	B	C	D
MDA/H (ft)	400	500	600	700
Minimum meteorological visibility (m)	1 500	1 600	2 400	3 600'

- (d) SPO.OP.113 is replaced by the following:

‘SPO.OP.113 Aerodrome operating minima — onshore circling approach operations with helicopters

The MDA/H for an onshore circling approach operation with helicopters shall not be lower than 250 ft and the meteorological visibility not less than 800 m.’

- (e) SPO.OP.180 is replaced by the following:

‘SPO.OP.180 Take-off conditions — aeroplanes and helicopters

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

- (a) the meteorological conditions at the aerodrome or 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 minimum is consistent with:
  - (1) the operative ground equipment;
  - (2) the operative aircraft systems;
  - (3) the aircraft performance; and
  - (4) flight crew qualifications.’

- (f) SPO.OP.210 is replaced by the following:

‘SPO.OP.210 Approach and landing conditions — aeroplanes and helicopters

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

- (a) the meteorological conditions at the aerodrome or operating site and the condition of the runway/FATO intended to be used will not prevent a safe approach, landing or go-around; and
- (b) the selected aerodrome operating minima are consistent with:
  - (1) the operative ground equipment;
  - (2) the operative aircraft systems;
  - (3) the aircraft performance; and

(4) flight crew qualifications.’

(g) SPO.OP.215 is replaced by the following:

‘SPO.OP.215 Commencement and continuation of an approach operation — aeroplanes and helicopters

- (a) The pilot-in-command may commence an instrument approach regardless of the reported RVR/visibility (VIS).
- (b) If the reported relevant RVR/VIS is less than the applicable minimum, the approach operation shall not be continued:
  - (1) below 1 000 ft above the aerodrome; or
  - (2) into the final approach segment in the case where the DA/H or MDA/H is more than 1 000 ft above the aerodrome.
- (c) Where the RVR is not available, RVR values may be derived by converting the reported visibility.
- (d) If, after passing 1 000 ft above the aerodrome, the reported RVR/VIS falls below the applicable minimum, the approach may be continued to DA/H or MDA/H.
- (e) The approach operation may be continued below DA/H or MDA/H and the landing may be completed provided that the visual reference adequate for the type of approach operation and for the intended runway/FATO is established at the DA/H or MDA/H and is maintained.
- (f) The touchdown zone RVR shall always be controlling.’



## ANNEX II

to COMMISSION REGULATION (EU) .../...

of ...

**amending Commission Regulation (EU) No 965/2012, Commission Regulation (EU) No 1178/2011 and Commission Regulation (EU) No 139/2014 as regards all-weather operations**

Annex I to Commission Regulation (EU) No 1178/2011 is amended as follows:

- (1) FCL.605(b), on IR privileges, is replaced by the following:

**‘FCL.605 IR — Privileges**

[...]

- (b) Privileges for decision heights lower than 200 ft (60 m), as well as for acting as pilot during operations in accordance with Annex V (Part-SPA) Subpart E of Commission Regulation (EU) No 965/2012, may be obtained in accordance with the requirements of that Regulation. Such privileges shall be recorded by the operator in accordance with SPA.LVO.120(c) of Annex V (Part-SPA) to that Regulation.

[...]

- (2) Appendix 9 ‘Training, skill test and proficiency check for MPL, ATPL, type and class ratings, and proficiency check for IRs’ of Part-FCL is amended as follows:

- (a) Point 2 of Section B is replaced by the following:

‘2. In the case of multi-pilot and single-pilot high-performance complex aeroplanes, the applicant shall pass all sections of the skill test or proficiency check. Failure in more than five items will require the applicant to take the entire test or check again. Any applicant failing in five or less items shall take the failed items again. Failure in any item of the retest or recheck, including those items that have been passed at a previous attempt, will require the applicant to take the entire check or test again.’

- (b) In the table following point 6 of Section B, Section 6 comprising exercises 6.1 to 6.4, including the ‘General remarks’ on top of the headline as well as the ‘Note’ at the end of this Section, is deleted.

- (c) Point 1 of Section D is replaced by the following:
- ‘1. In the case of skill tests or proficiency checks for powered-lift aircraft type ratings, the applicant shall pass sections 1 to 5 of the skill test or proficiency check. Failure in more than five items will require the applicant to take the entire test or check again. An applicant failing in not more than five items, shall take the failed items again. Failure in any item of the retest or recheck or failure in any other items already passed will require the applicant to take the entire test or check again. All sections of the skill test or proficiency check shall be completed within 6 months.’
- (d) In point 6(a) of Section D, the phrase ‘and if applicable, section 6’ is deleted.
- (e) In point 6(b) of Section D, the phrase ‘ and/or 7’ is deleted.
- (f) In the table following point 8 of Section D, Section 6 comprising exercises 6.1 to 6.4 is deleted, and Section 7 ‘Optional equipment’ is renumbered to read ‘Section 6’.
- (g) Point 1 of Section E is replaced by the following:
- ‘1. In the case of skill tests or proficiency checks for airship type ratings, the applicant shall pass sections 1 to 5 of the skill test or proficiency check. Failure in more than five items will require the applicant to take the entire test/check again. An applicant failing in not more than five items, shall take the failed items again. Failure in any item of the retest/recheck or failure in any other items already passed will require the applicant to take the entire test/check again. All sections of the skill test or proficiency check shall be completed within 6 months.’
- (h) In point 6(a) of Section E, the phrase ‘and, if applicable, section 6’ is deleted.
- (i) In point 6(b) of Section E, the phrase ‘and, if applicable, section 6’ is deleted.
- (j) In the table after point 8 of Section E, Section 6 comprising exercises 6.1 to 6.4 is deleted, and Section 7 ‘Optional equipment’ is renumbered to read ‘Section 6’.

**ANNEX III**  
**to COMMISSION REGULATION (EU) .../...**  
**of ...**

**amending Commission Regulation (EU) No 965/2012, Commission Regulation (EU) No 1178/2011 and Commission Regulation (EU) No 139/2014  
as regards all-weather operations**

Annexes I and IV to Commission Regulation (EU) No 139/2014 are amended as follows:

- (1) In Annex I (Definitions)
  - (a) point (24a) is inserted:  
‘(24a) “low-visibility operations (LVO)” means taxiing, approach, or take-off operations with an RVR lower than 550 m;’
  - (b) point (25) is replaced by the following:  
‘(25) “low-visibility procedures” means procedures applied at an aerodrome for the purpose of ensuring safe operations during low-visibility operations;’
  - (c) point (26) is replaced by the following:  
‘(26) “low-visibility take-off (LVTO)” means a take-off with a runway visual range (RVR) lower than 550 m;’
  - (d) point (27) is deleted.
  - (e) point (34a) is inserted:  
‘(34a) “operation with an operational credit” means an operation using specific aircraft or ground equipment, or a combination of aircraft and ground equipment, such that lower than standard aerodrome operating minima can be applied for a particular classification of operation;’
  - (f) point (35) is deleted.
- (2) In Annex IV (Part-ADR.OPS)
  - (a) ADR.OPS.B.030 is replaced by the following:  
‘ADR.OPS.B.030 Surface movement guidance and control system
    - (a) The aerodrome operator shall ensure that a surface movement guidance and control system is provided at the aerodrome.
    - (b) The surface movement guidance and control system shall:
      - (1) take into account the design characteristics and the operational and meteorological conditions of the aerodrome, as well as human factor principles;
      - (2) be designed to assist in the prevention of:
        - (i) inadvertent incursions of aircraft and vehicles onto an active runway; and

- (ii) collisions between aircraft as well as between aircraft and vehicles or objects on any part of the movement area;
  - (3) be supported by appropriate technological means and procedures.
- (c) The aerodrome operator shall coordinate with the air traffic services provider for the development of the surface movement guidance and control procedures.'
- (b) ADR.OPS.B.045 is replaced by the following:
  - 'ADR.OPS.B.045 Low-visibility operations
  - (a) The aerodrome operator shall ensure that an aerodrome intended to be used for:
    - (1) take-off operations with visibility conditions less than 550 m RVR;
    - (2) approach operations with visibility conditions less than 550 m RVR and/or DH less than 200 ft (60 m);
    - (3) operations with an operational credit where the actual RVR is less than 550 m;
    - (4) taxiing operations with visibility conditions less than 550 m RVR, is provided with the appropriate aerodrome equipment and facilities, and that appropriate procedures are established and implemented. Such procedures shall coordinate the movement of aircraft and vehicles on the movement area, and restrict or prohibit activities on the movement area.
  - (b) The aerodrome operator shall establish the criteria for the preparation, initiation and termination of low-visibility procedures. The criteria shall be based on the RVR and cloud ceiling.
  - (c) When low-visibility procedures are in effect, the aerodrome operator shall make available to aeronautical information services and/or air traffic services, as appropriate, information on the status of the aerodrome equipment and facilities.
  - (d) Low-visibility procedures, and any changes thereto, shall require prior approval by the competent authority.'