



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference  Definition	<p style="text-align: center;"><b>INTERNATIONAL STANDARDS AND RECOMMENDED PRACTICES</b></p> <p style="text-align: center;"><b>PART I. DEFINITIONS AND SYMBOLS</b></p> <p style="text-align: center;"><b>CHAPTER 1. DEFINITIONS</b></p> <p><i>Aeroplane.</i> A power-driven heavier-than-air aircraft, deriving its lift in flight chiefly from aerodynamic reactions on surfaces which remain fixed under given conditions of flight.</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Cockpit crew zone.</i> The part of the cabin that is exclusively designated for flight crew use.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference  Definition	<p><b>Derived version of a CO2-certified aeroplane.</b> An aeroplane which incorporates a change in the type design that either increases its maximum take-off mass, or that increases its CO2 emissions evaluation metric value by more than:</p> <p>a) 1.35 per cent at a maximum take-off mass of 5 700 kg, decreasing linearly to;</p> <p>b) 0.75 per cent at a maximum take-off mass of 60 000 kg, decreasing linearly to;</p> <p>c) 0.70 per cent at a maximum take-off mass of 600 000 kg; and</p> <p>d) a constant 0.70 per cent at maximum take-off masses greater than 600 000 kg.</p> <p><i>Note.— In some States, where the certifying authority finds that the proposed change in design, configuration, power or mass is so extensive that a substantially complete investigation of compliance with the applicable airworthiness regulations is required, the aeroplane requires a new Type Certificate.</i></p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<p><b>Derived version of a non-CO2-certified aeroplane.</b> An individual aeroplane that conforms to an existing Type Certificate, but which is not certified to Annex 16, Volume III, and to which a change in the type design is made prior to the issuance of the aeroplane's first certificate of airworthiness that increases its CO2 emissions evaluation metric value by more than 1.5 per cent or is considered to be a significant CO2 change.</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference  Definition	<i>Equivalent procedure.</i> A test or analysis procedure which, while differing from the one specified in this volume of Annex 16, in the technical judgement of the certifying authority yields effectively the same CO2 emissions evaluation metric value as the specified procedure.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Maximum passenger seating capacity.</i> The maximum certificated number of passengers for the aeroplane type design.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Maximum take-off mass.</i> The highest of all take-off masses for the type design.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Optimum conditions.</i> The combinations of altitude and airspeed within the approved operating envelope defined in the aeroplane flight manual that provides the highest specific air range value at each reference aeroplane mass.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Performance model.</i> An analytical tool or method validated from corrected flight test data that can be used to determine the SAR values for calculating the CO2 emissions evaluation metric value at the reference conditions.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference  Definition	<i>Reference geometric factor.</i> An adjustment factor based on a measurement of aeroplane fuselage size derived from a two-dimensional projection of the fuselage.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Specific air range.</i> The distance an aeroplane travels in the cruise flight phase per unit of fuel consumed.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>State of Design.</i> The State having jurisdiction over the organization responsible for the type design.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<i>Subsonic aeroplane.</i> An aeroplane incapable of sustaining level flight at speeds exceeding a Mach number of 1.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference  Definition	<b>Type Certificate.</b> A document issued by a Contracting State to define the design of an aircraft, engine or propeller type and to certify that this design meets the appropriate airworthiness requirements of that State.  <i>Note.— In some Contracting States a document equivalent to a Type Certificate may be issued for an engine or propeller type.</i>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference  Definition	<b>Type design.</b> The set of data and information necessary to define an aircraft, engine or propeller type for the purpose of airworthiness determination.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2  Standard	<p style="text-align: center;"><b>CHAPTER 2. SYMBOLS</b></p> <p>Where the following symbols are used in Volume III of this Annex, they have the meanings, and where applicable the units, ascribed to them below:</p> <p>AVG            Average CG            Centre of gravity CO2           Carbon dioxide g0            Standard acceleration due to gravity at sea level and a geodetic latitude of 45.5 degrees, 9.80665 (m/s<sup>2</sup>) Hz            Hertz (cycle per second) MTOM        Maximum take-off mass (kg) OML           Outer mould line RGF           Reference geometric factor RSS           Root sum of squares SAR           Specific air range (km/kg) TAS           True airspeed (km/h) Wf            Total aeroplane fuel flow (kg/h)</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference 1.1  Standard	<p style="text-align: center;"><b>PART II. CERTIFICATION STANDARD FOR AEROPLANE CO2 EMISSIONS BASED ON THE CONSUMPTION OF FUEL</b></p> <p style="text-align: center;"><b>CHAPTER 1. ADMINISTRATION</b></p> <p>1.1 The provisions of 1.2 to 1.11 shall apply to all aeroplanes included in the classifications defined for CO2 emissions certification purposes in Chapter 2 of this part where such aeroplanes are engaged in international air navigation.</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.2  Standard	1.2 CO2 emissions certification shall be granted or validated by the State of Registry of an aeroplane on the basis of satisfactory evidence that the aeroplane complies with requirements that are at least equal to the applicable Standards specified in this Annex.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.3  Standard	1.3 Contracting States shall recognize as valid a CO2 emissions certification granted by another Contracting State provided that the requirements under which such certification was granted are at least equal to the applicable Standards specified in this Annex.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference 1.4  Standard	<p>1.4 The amendment of this volume of the Annex to be used by a Contracting State shall be that which is applicable on the date of submission to that Contracting State for either a Type Certificate in the case of a new type, approval of a change in type design in the case of a derived version, or under equivalent application procedures prescribed by the certifying authority of that Contracting State.</p> <p><i>Note.— As each new edition and amendment of this Annex becomes applicable (according to Table A of the Foreword), it supersedes all previous editions and amendments.</i></p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.5  Standard	<p>1.5 Unless otherwise specified in this volume of the Annex, the date to be used by Contracting States in determining the applicability of the Standards in this Annex shall be the date the application for a Type Certificate was submitted to the State of Design, or the date of submission under an equivalent application procedure prescribed by the certifying authority of the State of Design.</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.6  Standard	<p>1.6 An application shall be effective for the period specified in the airworthiness regulations appropriate to the aeroplane type, except in special cases where the certifying authority grants an extension. When the period of effectivity is extended, the date to be used in determining the applicability of the Standards in this Annex shall be the date of issue of the Type Certificate, or approval of the change in type design, or the date of issue of approval under an equivalent procedure prescribed by the State of Design, less the period of effectivity.</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference 1.7  Standard	1.7 For derived versions of non-CO2-certified aeroplanes and derived versions of CO2-certified aeroplanes, the applicability provisions concerning the Standards of this Annex refer to the date on which “the application for the certification of the change in type design” was made. The date to be used by Contracting States in determining the applicability of the Standards in this Annex shall be the date on which the application for the change in type design was submitted to the Contracting State that first certified the change in type design.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.8  Standard	1.8 Where the provisions governing the applicability of the Standards of this Annex refer to the date on which the certificate of airworthiness was first issued to an individual aeroplane, the date to be used by Contracting States in determining the applicability of the Standards in this Annex shall be the date on which the first certificate of airworthiness was issued by any Contracting State.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.9  Standard	1.9 The certifying authority shall publish the certified CO2 emissions evaluation metric value granted or validated by that authority.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 1 Reference 1.10  Standard	1.10 The use of equivalent procedures in lieu of the procedures specified in the appendices of this volume of Annex 16 shall be approved by the certifying authority.  <i>Note.— Guidance material on the use of equivalent procedures is provided in the Environmental Technical Manual (Doc 9501), Volume III — Procedures for the CO2 Emissions Certification of Aeroplanes.</i>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 1 Reference 1.11  Standard	<p>1.11 Contracting States shall recognize valid aeroplane exemptions granted by the competent authority of another Contracting State having jurisdiction over the organization responsible for production of the aeroplane provided that an acceptable process was used.</p> <p><i>Note.— Guidance on acceptable processes and criteria for granting exemptions is provided in the Environmental Technical Manual (Doc 9501), Volume III — Procedures for the CO2 Emissions Certification of Aeroplanes.</i></p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
<p>Chapter 2 Reference 2.1.1</p> <p>Standard</p>	<p style="text-align: center;"><b>CHAPTER 2.</b></p> <p style="text-align: center;"><b>2.1 Applicability</b></p> <p><i>Note.— See also Chapter 1, 1.4, 1.5, 1.6, 1.7, 1.8 and 1.11.</i></p> <p>2.1.1 The Standards of this chapter shall, with the exception of amphibious aeroplanes, aeroplanes initially designed or modified and used for specialized operational requirements, aeroplanes designed with zero reference geometric factor (RGF), and those aeroplanes specifically designed or modified and used for fire-fighting purposes, be applicable to:</p> <ul style="list-style-type: none"> <li>a) subsonic jet aeroplanes, including their derived versions, of greater than 5 700 kg maximum take-off mass, for which the application for a type certificate was submitted on or after 1 January 2020, except for those aeroplanes of less than or equal to 60 000 kg maximum take-off mass with a maximum passenger seating capacity of 19 seats or less;</li> <li>b) subsonic jet aeroplanes, including their derived versions, of greater than 5 700 kg and less than or equal to 60 000 kg maximum take-off mass with a maximum passenger seating capacity of 19 seats or less, for which the application for a type certificate was submitted on or after 1 January 2023;</li> <li>c) all propeller-driven aeroplanes, including their derived versions, of greater than 8 618 kg maximum take-off mass, for which the application for a type</li> </ul>	<p>Article 9(2) of Reg. (EU)2018/1139</p>	<p>No Difference</p>		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
	<p>certificate was submitted on or after 1 January 2020;</p> <p>d) derived versions of non-CO2-certified subsonic jet aeroplanes, including their subsequent CO2-certified derived versions, of greater than 5 700 kg maximum certificated take-off mass, for which the application for certification of the change in type design was submitted on or after 1 January 2023;</p> <p>e) derived versions of non-CO2 certified propeller-driven aeroplanes, including their subsequent CO2-certified derived versions, of greater than 8 618 kg maximum certificated take-off mass, for which the application for certification of the change in type design was submitted on or after 1 January 2023;</p> <p>f) individual non-CO2-certified subsonic jet aeroplanes of greater than 5 700 kg maximum certificated take-off mass, for which a certificate of airworthiness was first issued on or after 1 January 2028; and</p> <p>g) individual non-CO2-certified propeller-driven aeroplanes of greater than 8 618 kg maximum certificated take-off mass, for which a certificate of airworthiness was first issued on or after 1 January 2028.</p> <p><i>Note.— Aeroplanes initially designed or modified and used for specialized operational requirements refer to aeroplane type designs which, in the view of the certifying authority, have different design characteristics to meet specific operational needs compared to typical civil aeroplane types covered by the scope of this volume of Annex 16, and which may result in a very different CO2 emissions evaluation metric value.</i></p>				



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.1.2  Standard	2.1.2 Notwithstanding 2.1.1, it may be recognized by a Contracting State that aeroplanes on its registry do not require demonstration of compliance with the provisions of the Standards of Annex 16, Volume III, for time-limited engine changes. These changes in type design shall specify that the aeroplane may not be operated for a period of more than 90 days, unless compliance with the provisions of Annex 16, Volume III, is shown for that change in type design. This applies only to changes resulting from a required maintenance action.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 2 Reference 2.1.3  Standard	2.1.3 The certifying authority or the competent authority having jurisdiction over the organization responsible for production of the aeroplane may grant exemptions from the applicability specified in 2.1.1. In such cases, the authority shall issue an exemption document. The grant of exemption shall be noted in the permanent aeroplane record. The authority shall take into account the number of exempted aeroplanes that will be produced and their impact on the environment. Exemptions shall be reported by aeroplane serial number and made available via an official public register.  <i>Note.— Further guidance on issuing exemptions, including guidance on the certifying authority or the competent authority having jurisdiction over the organization responsible for production of the aeroplane for granting exemptions, is provided in the Environmental Technical Manual (Doc 9501), Volume III — Procedures for the CO2 Emissions Certification of Aeroplanes.</i>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.2  Standard	<p><b>2.2 CO2 emissions evaluation metric</b></p> <p>The metric shall be defined in terms of the average of the 1/SAR values for the three reference masses defined in 2.3 and the RGF defined in Appendix 2. The metric value shall be calculated according to the following formula:</p> <p style="text-align: center;">CO2 emissions evaluation metric value</p> <p><i>Note 1.— The metric value is quantified in units of kg/km.</i></p> <p><i>Note 2.— The CO2 emissions evaluation metric is a specific air range (SAR)-based metric adjusted to take into account fuselage size.</i></p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 2 Reference 2.3.1  Standard	<p><b>2.3 Reference aeroplane masses</b></p> <p>2.3.1 The 1/SAR value shall be established at each of the following three reference aeroplane masses, when tested in accordance with these Standards:</p> <p>a) high gross mass: 92 per cent maximum take-off mass (MTOM)</p> <p>b) mid gross mass: simple arithmetic average of high gross mass and low gross mass</p> <p>c) low gross mass: <math>(0.45 \times \text{MTOM}) + (0.63 \times (\text{MTOM} \cdot 0.924))</math></p> <p><i>Note.— MTOM is expressed in kilograms.</i></p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.3.2  Standard	2.3.2 CO2 emissions certification for MTOM also represents the certification of CO2 emissions for take-off masses less than MTOM. However, in addition to the mandatory certification of CO2 metric values for MTOM, applicants may voluntarily apply for the approval of CO2 metric values for take-off masses less than MTOM.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 2 Reference 2.4.1  Standard	<b>2.4 Maximum permitted CO2 emissions evaluation metric value</b>  2.4.1 The CO2 emissions evaluation metric value shall be determined in accordance with the evaluation methods described in Appendix 1.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.4.2  Standard	<p>2.4.2 The CO2 emissions evaluation metric value shall not exceed the value defined in the following paragraphs:</p> <p>a) for aeroplanes specified in 2.1.1 a), b) and c) with a maximum take-off mass less than or equal to 60 000 kg:</p> <p>Maximum permitted value = <math>10 (-2.73780 + (0.681310 * \log_{10}(\text{MTOM})) + (-0.0277861 * (\log_{10}(\text{MTOM}))^2))</math></p> <p>b) for aeroplanes specified in 2.1.1 a) and c) with a maximum take-off mass greater than 60 000 kg, and less than or equal to 70 395 kg:</p> <p>Maximum permitted value = 0.764</p> <p>c) for aeroplanes specified in 2.1.1 a) and c) with a maximum take-off mass greater than 70 395 kg:</p> <p>Maximum permitted value = <math>10 (-1.412742 + (-0.020517 * \log_{10}(\text{MTOM})) + (0.0593831 * (\log_{10}(\text{MTOM}))^2))</math></p> <p>d) for aeroplanes specified in 2.1.1 d), e), f) and g) with a maximum certificated take-off mass less than or equal to 60 000 kg:</p> <p>Maximum permitted value = <math>10 (-2.57535 + (0.609766 * \log_{10}(\text{MTOM})) + (-0.0191302 * (\log_{10}(\text{MTOM}))^2))</math></p> <p>e) for aeroplanes specified in 2.1.1 d), e), f) and g) with a maximum certificated take-off mass greater than 60 000 kg, and less than or equal to 70 107 kg:</p> <p>Maximum permitted value = 0.797</p> <p>f) for aeroplanes specified in 2.1.1 d), e), f) and g) with a maximum take-off mass greater than 70 107 kg:</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
	Maximum permitted value = $10 (-1.39353 + (-0.020517 * \log_{10}(\text{MTOM})) + (0.0593831 * (\log_{10}(\text{MTOM}))^2))$				



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.5.1  Standard	<p><b>2.5 Reference conditions for determining aeroplane specific air range</b></p> <p>2.5.1 The reference conditions shall consist of the following conditions within the approved normal operating envelope of the aeroplane:</p> <ul style="list-style-type: none"> <li>a) the aeroplane gross masses defined in 2.3;</li> <li>b) a combination of altitude and airspeed selected by the applicant;</li> </ul> <p><i>Note.— These conditions are generally expected to be the combination of altitude and airspeed that results in the highest SAR value, which is usually at the maximum range cruise Mach number at the optimum altitude. The selection of conditions other than optimum conditions will be to the detriment of the applicant because the SAR value will be adversely affected.</i></p> <ul style="list-style-type: none"> <li>c) steady (unaccelerated), straight and level flight;</li> <li>d) aeroplane in longitudinal and lateral trim;</li> <li>e) ICAO standard day atmosphere;</li> <li>f) gravitational acceleration for the aeroplane travelling in the direction of true North in still air at the reference altitude and a geodetic latitude of 45.5 degrees, based on <math>g_0</math>;</li> <li>g) fuel lower heating value equal to 43.217 MJ/kg (18 580 BTU/lb);</li> <li>h) a reference aeroplane centre of gravity (CG) position selected by the applicant to be representative of a mid-CG point relevant to design cruise performance</li> </ul>	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
	<p>at each of the three reference aeroplane masses;</p> <p><i>Note.— For an aeroplane equipped with a longitudinal CG control system, the reference CG position may be selected to take advantage of this feature.</i></p> <p>i) a wing structural loading condition selected by the applicant for representative operations conducted in accordance with the aeroplane's payload capability and manufacturer standard fuel management practices;</p> <p>j) applicant selected electrical and mechanical power extraction and bleed flow relevant to design cruise performance and in accordance with manufacturer recommended procedures;</p> <p><i>Note.— Power extraction and bleed flow due to the use of optional equipment such as passenger entertainment systems need not be included.</i></p> <p>k) engine handling/stability bleeds operating according to the nominal design of the engine performance model for the specified conditions; and</p> <p>l) engine deterioration level selected by the applicant to be representative of the initial deterioration level (a minimum of 15 take-offs or 50 engine flight hours).</p> <p>----- Doc 7488/3 entitled <i>Manual of the ICAO Standard Atmosphere (extended to 80 kilometres (262 500 feet))</i>.</p>				



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.5.2  Standard	2.5.2 If the test conditions are not the same as the reference conditions, then corrections for the differences between test and reference conditions shall be applied as described in Appendix 1.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 2 Reference 2.6.1  Standard	<b>2.6 Test procedures</b>  2.6.1 The SAR values that form the basis of the CO2 emissions evaluation metric value shall be established either directly from flight tests or from a performance model validated by flight tests.	Article 9(2) of Reg. (EU)2018/1139	No Difference		
Chapter 2 Reference 2.6.2  Standard	2.6.2 The test aeroplane shall be representative of the type design for which certification is requested.	Article 9(2) of Reg. (EU)2018/1139	No Difference		



Report on entire Annex

Annex Reference	ENVIRONMENTAL PROTECTION  Standard or Recommended Practice	State Legislation, Regulation or Document Reference	Level of implementation of SARP's	Text of the difference to be notified to ICAO	Comments including the reason for the difference
Chapter 2 Reference 2.6.3  Standard	<p>2.6.3 The test and analysis procedures shall be conducted in an approved manner to yield the CO2 emissions evaluation metric value as described in Appendix 1. These procedures shall address the entire flight test and data analysis process, from pre-flight actions to post-flight data analysis.</p> <p><i>Note.— The fuel used for each flight test should meet the specification defined in either ASTM D1655-15, DEF STAN 91-91 Issue 7, Amendment 3, or equivalent.</i></p> <p>-----</p> <p>ASTM D1655-15 entitled <i>Standard Specification for Aviation Turbine Fuels</i>. Defence Standard 91-91, Issue 7, Amendment 3, entitled <i>Turbine Fuel, Kerosene Type, Jet A-1</i>.</p>	Article 9(2) of Reg. (EU)2018/1139	No Difference		

- END -