

European Aviation Safety Agency

EXPLANATORY NOTE

EXECUTIVE SUMMARY

This first issue of EASA Certification Specifications for aeroplane flight simulation training devices (FSTDs) describes the requirements an FSTD has to comply with in order to achieve a certain level of qualification (initial qualification) and to maintain this level of qualification (recurrent qualification). FSTDs are evaluated according to the qualification basis, which describes the performance, handling qualities and documentation requirements of FSTDs and their compliance with the applicable processes for flight crew member training, testing and checking. The various types of FSTDs have to comply with different technical standards and pass different validation tests as well as functional and subjective tests. These are listed and explained in these CSs.

CS-FSTD(A) is based on JAR-FSTD A and JAR-FSTD temporary guidance leaflets (TGLs).

<u>Certification Specifications for Aeroplane Flight Simulation Training Devices</u> (CS-FSTD(A))

1. General

Background

On 8 April 2008 Regulation (EC) No 216/2008 of 20 February 2008¹ (the 'Basic Regulation') entered into force. In addition, the Commission has adopted the necessary rules ('Commission Regulations') for the implementation of the Basic Regulation for the technical requirements and administrative procedures related to civil aviation aircrew².

Pursuant to Article 18 of the Basic Regulation the European Aviation Safety Agency ('the Agency') shall, where appropriate, issue Acceptable Means of Compliance (AMC) as well as Guidance Material (GM) for the application of the Basic Regulation and its Implementing Rules (IRs).

The purpose of the Comment Response Document (CRD) 2008-22d published on 1 December 2010 was to define the qualification code for aeroplane Flight Simulation Training Devices (FSTDs). These CSs for aeroplane FSTDs describe the requirements an FSTD has to comply with in order to achieve a certain level of qualification (initial qualification) and to maintain this level of qualification (recurrent qualification). FSTDs are evaluated according to the qualification basis, which describes the performance, handling qualities and documentation requirements of the FSTD's compliance with the applicable processes for flight crew member training, testing and checking. The various types of FSTDs have to comply with different technical standards and should pass different validation tests as well as functions and subjective tests. These are based on JAA JAR-FSTD A and the JAA FSTD TGLs # 3, 8, 12, 13 and 14. JAA FSTD TGLs # 9, 10 and 11 are proposed as AMC and GM to Subpart FSTD of Part-ORA (Annex VII to the Regulation (EU) No 290/2012 on Air Crew³).

Agency measures

CSs are used to demonstrate compliance with the Basic Regulation and its IRs.

AMC illustrate a means, but not the only means, by which a requirement of an IR can be met. Satisfactory demonstration of compliance using published AMC shall provide for presumption of compliance with the related requirement; it is a way to facilitate certification tasks for the applicant and the competent authority.

GM is issued by the Agency to assist in the understanding of the Basic Regulation, its IRs and CSs.

Publication

The full text of this CS is available on the Agency's website.

For more information, contact the Agency at: RPS@easa.europa.eu.

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. (OJ L 79, 19.03.2008, p. 1). Regulation as last amended by Regulation (EC) No 1108/2009 of the European Parliament and of the Council of 21 October 2009 (OJ L 309, 24.11.2009, p. 51).

Commission Regulation (EU) 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 (OJ L 311, 25.11.2011).

Commission Regulation (EU) No 290/2012 of 30 March 2012 amending Regulation (EU) No 1178/2011 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 100, 5.4.2012, p.1-56).

2. Consultation on draft proposals

CSs are developed by the Agency, following a structured process as required by Article 52(1) of the Basic Regulation. Such a process has been adopted by the Agency's Management Board and is referred to as 'The Rulemaking Procedure⁴'.

The Executive Director Decision 2012/010/R adopts the initial issue of CS-FSTD(A) as an output of the following Agency rulemaking tasks:

Rulemaking Task No	TITLE	NPA/CRD No
FCL.001 OPS.001	Implementing rules for pilot licensing Implementing rules for air operations	2008-22d

The Notice of Proposed Amendment (NPA) and subsequent Comment Response Document (CRD) have been subject to consultation in accordance with Article 52 of the Basic Regulation and Article 15 of the Rulemaking Procedure established by the Management Board. For detailed information on the proposed changes and their justification, consult NPAs 2008-22b and 2009-02d⁵, which are available on the Agency's website.

The Agency has addressed and responded to the comments received on the NPA. The responses are contained in a Comment Response Document (CRD) that has been produced for NPA 2008-22d (cf. CRD to NPA 2008-22d 'CS-FSTD(A) $^{\prime 6}$) and that is also available on the Agency's website.

In response to the CRD to NPA 2008-22d, the Agency received **10** reactions. All reactions received after the publication of the CRDs were taken into consideration for the drafting of the present CS.

3. Summary of changes

The CRD reactions mainly requested the correction of typos and content & layout changes in Table 1 of **Appendix 8 to AMC1-CS-FSTD(A).300**. In this table, the requirement to have a 'complete fidelity of sounds and motion buffets' has been replaced by 'extended set of sound and motion buffet tests'. This change has been considered as necessary since the word 'complete' does not allow for any tolerance and made the requirement technically impossible.

These CSs were developed in compliance with Management Board Decision concerning the procedure to be applied by the Agency for the issuing of opinions, certification specifications and guidance material ('Rulemaking Procedure'), EASA MB 08-2007, 13.6.2007. However, this Decision has been amended and replaced by EASA MB 01-2012, 13.03.2012.

⁵ See Rulemaking Archive page: http://www.easa.europa.eu/rulemaking/r-archives.php.

⁶ See Rulemaking Archive page: http://www.easa.europa.eu/rulemaking/r-archives.php.