

EASA	AIRWORTHINESS DIRECTIVE	
	<p>AD No.: 2011-0169</p> <p>Date: 02 September 2011</p> <p>Note: This Airworthiness Directive (AD) is issued by EASA, acting in accordance with Regulation (EC) No 216/2008 on behalf of the European Community, its Member States and of the European third countries that participate in the activities of EASA under Article 66 of that Regulation.</p>	
<p>This AD is issued in accordance with EC 1702/2003, Part 21A.3B. In accordance with EC 2042/2003 Annex I, Part M.A.301, the continuing airworthiness of an aircraft shall be ensured by accomplishing any applicable ADs. Consequently, no person may operate an aircraft to which an AD applies, except in accordance with the requirements of that AD, unless otherwise specified by the Agency [EC 2042/2003 Annex I, Part M.A.303] or agreed with the Authority of the State of Registry [EC 216/2008, Article 14(4) exemption].</p>		
<p>Type Approval Holder's Name : DASSAULT AVIATION</p>	<p>Type/Model Designation(s) : Falcon 7X aeroplanes</p>	
<p>TCDS Number : EASA.A.155</p>		
<p>Foreign AD : Not applicable</p>		
<p>Supersedure : None</p>		
<p>ATA 27</p>	<p>Flight Controls - Horizontal Stabilizer Pitch Trim - Modification</p>	
<p>Manufacturer(s):</p>	<p>Dassault Aviation</p>	
<p>Applicability:</p>	<p>Falcon 7X aeroplanes, all serial numbers except those having Dassault Aviation modification M1245 embodied in production.</p>	
<p>Reason:</p>	<p>In May 2011, a Dassault Aviation Falcon 7X aeroplane experienced an uncontrolled pitch trim runaway during descent. The crew succeeded in recovering a stable situation and performed an uneventful landing.</p> <p>The results of the investigations showed that there was a production defect in the Horizontal Stabilizer Electronic Control Unit (HSECU) which could have contributed to the cause of the event.</p> <p>This condition, if not corrected, could lead to a loss of control of the aeroplane.</p> <p>To address this unsafe condition, EASA issued emergency AD 2011-0102-E which prohibited further flights. Following further technical investigations accomplished by Dassault Aviation, EASA issued AD 2011-0114, currently at revision 2, which superseded EASA AD 2011-0102-E. Following accomplishment of all the actions as required by EASA AD 2011-0114R2, all aeroplanes could resume flying with operational limitations.</p> <p>Since EASA AD 2011-0114R2 was issued, Dassault Aviation have developed a modification (M1245 to be embodied through accomplishment of Dassault Aviation Service Bulletin F7X-214) of the Fly-By-Wire (FBW) current standard which improves the monitoring and reversion logic of the Horizontal</p>	

	<p>Stabilizer Trim System (HSTS). This modification results in earlier failure detection and quicker reversion.</p> <p>Dassault Aviation have issued as well Revision 13 of the Aircraft Flight Manual (AFM) which incorporates the changes introduced in EASA AD 2011-0114R2 (CP55 and 56) as well as the new changes resulting from Dassault Aviation M1245 (CP58).</p> <p>Dassault Aviation have introduced as well operational tests of the HSTS electric motors reversion relays and of the HSTS trim emergency command into the Chapter 5.40 of F7X Aircraft Maintenance Manual (CP010).</p> <p>For the reasons described above, this AD requires:</p> <ol style="list-style-type: none"> 1. accomplishing Dassault Aviation modification (M1245), 2. amending the AFM, 3. implementing the operational tests of the HSTS electric motors reversion relays and of the HSTS trim emergency command. <p>Accomplishment of all the above actions restores the full original certified flight envelope of the aeroplane.</p> <p>This AD is still considered to be an interim measure. Pending results of the ongoing analysis, further AD action may follow to restore the full original certified MEL for aeroplanes fitted with FBW standard 2.1.7.3.</p>
Effective Date:	05 September 2011
Required Action(s) and Compliance Time(s):	<p>Required as indicated unless previously accomplished:</p> <ol style="list-style-type: none"> (1) Within 12 months after having accomplished the actions as specified in EASA AD 2011-0114R2 or within 12 months after the effective date of this AD, whichever occurs later, upgrade the Fly-By-Wire system installed in the aeroplane to 2.1.7.3 standard, in accordance with the accomplishment instructions of Dassault Aviation Service Bulletin F7X-214. Concurrently to the aeroplane modification, amend the AFM to revision 13. (2) Within 5 050 flight hours (FH) after modifying the aeroplane as required by paragraph (1) of this AD and thereafter at intervals not to exceed 5 050 FH, accomplish an operational test of the HSTA electric motors reversion relays as described in Dassault Aviation revision 2 to Chapter 5.40 of F7X AMM. (3) Within 650 FH after modifying the aeroplane as required by paragraph (1) of this AD and thereafter at intervals not to exceed 650 FH, accomplish an operational test of the HSTA trim emergency command as described in Dassault Aviation revision 2 to Chapter 5.40 of F7X AMM. (4) If during any operational test as required by paragraphs (2) and (3) of this AD the HSTA electric motors reversion relays or the trim emergency command, as applicable, fail the test, before next flight, contact Dassault Aviation for approved repair instructions and, within the time period specified in those instructions, accomplish the repair accordingly. (5) Compliance with the new Certification Maintenance Requirements as required by paragraphs (2), (3) and (4) of this AD can be demonstrated by: <ol style="list-style-type: none"> (5.1) Revising as follows, the Aircraft Maintenance Programme on the basis of which the Operator or the Owner ensures the continuing airworthiness of each operated aeroplane: <p>Incorporate the Operational Tests of the HSTA electric motors reversion relays and the HSTA Trim emergency command as described in revision 2 of Chapter 5.40 of F7X AMM DGT 107838.</p> (5.2) Complying with the approved Aircraft Maintenance Program described in paragraph (5.1) of this AD.

Ref. Publications:	<p>Dassault Aviation Service Bulletin F7X-214 Original dated 30 August 2011.</p> <p>Dassault Aviation F7X Aircraft Maintenance Manual DGT107838 chapter 5.40 revision 2.</p> <p>Dassault Aviation F7X Aircraft Flight Manual DGT105608 Revision 13.</p> <p>The use of later approved revisions of these documents is acceptable for compliance with the requirements of this AD.</p>
Remarks :	<ol style="list-style-type: none"> 1. If requested and appropriately substantiated, EASA can approve Alternative Methods of Compliance for this AD. 2. The required actions and the risk allowance have granted the issuance of a Final AD with Request for Comments, postponing the public consultation process after publication. 3. Enquiries regarding this AD should be referred to the Safety Information Section, Executive Directorate, EASA. E-mail: ADs@easa.europa.eu. 4. For any question concerning the technical content of the requirements in this AD, please contact your Dassault Falcon Technical Assistance: <ul style="list-style-type: none"> - For Europe, Middle East and Africa based operators: Hot Line: (33) 1 47 11 31 37 / Fax: (33) 1 47 11 89 49 - For USA, Canada and Mexico based operators: Help Desk: (1) 800-2FALCON (325266) / Fax: (1) 201 541 4740 - All other areas: Help Desk: (1) 201 541 4747 / Fax: (1) 201 541 4740

Superseded