



PROPOSED AIRWORTHINESS DIRECTIVE



Number: 1980

Issue date: 17 June 2021

In accordance with the CAA Continuing Airworthiness Procedures, the issuance of an Airworthiness Directive (AD) is proposed which will be applicable to the aeronautical product(s) identified below.

All interested persons may send their comments, referencing the PAD Number above, to the e-mail address specified in the 'Remarks' section, prior to the consultation date indicated.

Design Approval Holder's Name: BAE SYSTEMS (OPERATIONS) LTD	Type/Model Designation(s): Jetstream 3100 and 3200 aeroplanes
TCDS:	(UK) EASA.A.191, Issue 3, 15 January 2015
Supersedure:	None
ATA 27	Flight Controls – Push Rod Assembly at Gustlock/Power Lever Baulk Mechanism - Replacement
Manufacturer(s):	BAe Systems (Operations) Ltd
Applicability:	Models Jetstream Series 3100 and Series 3200 Aircraft up to and including constructor's number 927, and from constructor's number 929 to 936 inclusive
Definitions:	For the purpose of this AD, the following definitions apply: <ul style="list-style-type: none">• Affected part: push rod assembly Part Number 137201E419• AMM: Aircraft Maintenance Manual• The SB: unless otherwise specified, refers to BAE Systems Service Bulletin 27-JM 5350 – Flight Controls - Introduction of Modified Push Rod Assembly at Gustlock/Power Lever Baulk Mechanism (Modification JM 5350), Revision 01, dated 06 May 1994.

<p>Reason:</p>	<p>On 8 October 2019, a Jetstream Series 3200 aircraft aborted take-off at a speed of approximately 130 kt and veered off runway. The investigation into the serious incident concluded the take-off was initiated with an engaged Gust Lock Mechanism, resulting in a temporary loss of aircraft control. Damage was identified in the Gust Lock mechanism, which allowed both power levers to be moved beyond flight idle with the gust locks engaged.</p> <p>The serious incident investigation determined that a bent control rod within the gust lock system made it possible to move both power levers simultaneously to the max position, even though the gust locks were still engaged.</p> <p>The gust lock system is designed to lock and prevent damage to the control surfaces when the aircraft is parked during gusting wind conditions. The system contains a mechanical baulk which prevents both power levers from being moved beyond the flight idle position when the gust locks are engaged.</p> <p>Three previous occurrences in which a bent control rod enabled both power levers to be moved simultaneously beyond the flight idle position while the gust lock system was engaged have been identified by the Type Certificate Holder. Service Bulletin 27-JM 5350 was first published in 1992 to introduce a stronger control rod.</p> <p>This condition, if not prevented, could lead to partial or total loss of aircraft control. To address this potential unsafe condition, this AD mandates the installation of a modified push rod assembly.</p> <p>BAE Systems operating manuals contain pre-flight checks that are designed to ensure the gust locks are not engaged during take-off.</p>
<p>Effective Date:</p>	<p>(TBD upon issue of final AD)</p>
<p>Required Action(s) and Compliance Time(s):</p>	<p>Corrective Action</p> <p>Service Bulletin 27JM-5350 instructs replacement of the affected part with a stronger new or serviceable Push Rod Assembly, Part Number 137201E429.</p> <p>Replacement</p> <p>Required as indicated, unless accomplished previously:</p> <ul style="list-style-type: none"> - Within 2 years after the effective date of this AD, replace the affected part in accordance with the instructions of the SB.

Reference Publications:	<ul style="list-style-type: none">• Jetstream Series 3100 and Series 3200 Aircraft Maintenance Manual, Chapters 24, 25, 27 and 76• Jetstream Series 200 Aircraft Maintenance Manual, Chapters 19, 30, 40 and 55• Jetstream Series 3100 and Series 3200 Aircraft Illustrated Parts Catalogue, Chapter 27-70-00-01 (Ref. 120 (Push Rod Assy PN 137201E429)).• BAe Systems Service Bulletin 27-JM 5350 – Flight Controls – Introduction of Modified Push Rod Assembly at Gustlock/Power Lever Baulk Mechanism (Modification JM 5350), Revision 01, dated 06 May 1994
Remarks:	<ol style="list-style-type: none">1. This Proposed AD will be closed for consultation on 17 July 2021.2. Enquiries regarding this PAD should be referred to: Continued.Airworthiness@caa.co.uk3. For any question concerning the technical content of the requirements in this PAD, please contact: BAE Systems (Operations) Ltd, Customer Information Department, Prestwick International Airport, Ayrshire, KA9 2RW, Scotland, United Kingdom; E-mail: Rpublications@baesystems.com. <hr/>