
AIRWORTHINESS DIRECTIVE

For the reasons set out in the background section, the CASA delegate whose signature appears below issues the following Airworthiness Directive (AD) under subregulation 39.1 (1) of CASR 1998. The AD requires that the action set out in the requirement section (being action that the delegate considers necessary to correct the unsafe condition) be taken in relation to the aircraft or aeronautical product mentioned in the applicability section: (a) in the circumstances mentioned in the requirement section; and (b) in accordance with the instructions set out in the requirement section; and (c) at the time mentioned in the compliance section.

Eurocopter AS 355 (Twin Ecureuil) Series Helicopters**AD/AS 355/81****Hydraulic Fluid in Cold Weather****10/2004**

Applicability: AS 355 E helicopters that operate in a flight envelope where the outside air temperature (OAT) is below -15 °C (+5 °F).

Requirement: Insert the following into the aircraft flight manual: "Do not operate the helicopter in an environment where the OAT is below -15 °C (+5 °F) unless the hydraulic system fluid has been replaced in the previous 110 flight hours or 1 calendar month, whichever occurs first".

This may be accomplished by placing a copy of this Directive in the aircraft flight manual at Section 2 Limitations, or in Supplement 4 Instructions for operation in cold weather.

Note 1: DGAC AD F-2004-056 refers. (EASA reference no. 2004-4047 of April 20 2004).

Note 2: Where operation in an environment where the OAT is below -15 °C (+5 °F) is anticipated, the due date for the next hydraulic oil change could be entered in the Maintenance Release as maintenance required.

Compliance: Within 14 days of the effective date of this Directive.

This Airworthiness Directive becomes effective on 30 September 2004.

Background: Ice has formed in some parts of the flight control system where the hydraulic system was highly contaminated with water, causing malfunction in helicopters operating at below -15 °C (+5 °F). This Directive requires the flight crew to be aware of the maintenance requirement before commencing cold weather operations.



Gary J Carr
Delegate of the Civil Aviation Safety Authority

20 August 2004