

U.S. Department of Transportation Federal Aviation Administration

InFO

Information for Operators

InFO 10007 DATE: 6/17/10

Flight Standards Service Washington, DC

http://www.faa.gov/other_visit/aviation_industry/airline_operators/airline_safety/info

An InFO contains valuable information for operators that should help them meet certain administrative, regulatory, or operational requirements with relatively low urgency or impact on safety.

Subject: Reporting "Glass Cockpit" Malfunctions on General Aviation (GA) Aircraft

Purpose: To inform aircraft and avionics maintenance technicians about the critical role of voluntary service difficulty reporting system reports involving malfunctions or defects associated with electronic primary flight, navigation, and control display systems.

Background: In only a span of a few years, the cockpits of light aircraft have undergone a transition from conventional flight instruments to integrated, computerized displays commonly referred to as glass cockpits. The introduction of this advanced technology in to light aircraft has brought with it a new set of potential safety concerns, including equipment design and operation; pilot performance and training; and new accident investigation techniques. The National Transportation Safety Board (NTSB) conducted a study to determine the impact these glass cockpits have had on the overall operational safety. The NTSB found that introduction of glass cockpit displays has not yet resulted in the anticipated improvement in safety when compared to similar aircraft with conventional instruments. Also during that study, they found that multiple instances of glass cockpit avionics malfunctions were not reported to the Federal Aviation Administration (FAA) and did not result in a service difficulty reports. Identification and tracking of service difficulties, equipment malfunctions or failures, abnormal operations, and other safety issues will be increasingly important as light aircraft avionics systems and equipment continue to increase in complexity and variation of design.

Recommended Action: Aircraft operators and maintenance technicians should voluntarily report equipment malfunctions or failures, abnormal operations, and other safety issues associated with glass cockpit display systems on the FAA's Service Difficulty Reporting site at http://av-info.faa.gov/sdrx/Default.aspx

Contact: Any questions or comments concerning this InFO should be directed to the Aircraft Maintenance Division, AFS-300, at (202) 267-1675.

Distributed by: AFS-200 OPR: AFS-300