10/19/2026 **FOR YOUR INFORMATION** 2026-354/11-73

2406059

To: Garmin International, FAA (AFS-400)

Info: FAA (AVP-1, AVP-200, AFS-260, AFS-800, AFS-200, AFS-100, AIR-360, AIR-780, MKC-AEG, ANM-100), AMFA, AOPA, ASAP, ATSG, GAMA, IAM, IBT, ICASS, NBAA, NTSB, PAMA, TWU

From: Becky L. Hooey, Director
NASA Aviation Safety Reporting System

Re: Garmin GI 275 Installation Manual Issues

We recently received ASRS reports describing a safety concern that may involve your area of operational responsibility. We do not have sufficient details to assess either the factual accuracy or possible gravity of the report. It is our policy to relay the reported information to the appropriate authority for evaluation and any necessary follow-up. We feel you should be aware of the enclosed deidentified report.

To properly assess the usefulness of our alert message service, we would appreciate it if you would take the time to give us your feedback on the value of the information that we have provided. Please contact Dr. Becky Hooey at (408) 541-2854 or email at becky.l.hooey@nasa.gov.

Aviation Safety Reporting System
P.O. Box 189 | Moffett Field, CA | 94035-0189

ACN 2406059	
DATE / TIME	
Date of Occurrence	202609
Local Time Of Day	0601 to 1200
PLACE	
Locale	ZZZ.Airport
State	US
Altitude - AGL	0
AIRCRAFT / EQUIPMENT X	
Make Model Name	Baron 58/58TC
COMPONENT 1	
Aircraft Component	Compass (HSI/ETC)
PERSON 1	
Function - Maintenance	Inspector
ASRS Report Number	2406059
EVENTS	
Anomaly	Aircraft Equipment Problem - Less Severe
Anomaly	Deviation / Discrepancy - Procedural - FAR
Anomaly	Deviation / Discrepancy - Procedural - Maintenance
Anomaly	Deviation / Discrepancy - Procedural - Published Material / Policy
Detector - Person	Maintenance
Result - General	Maintenance Action
NARRATIVE 1	

During an installation of a Garmin GI 275 system on a Beechcraft Baron B58, the GTP 59 OAT probe and GMU 11 magnetometer were inadvertently installed in an incorrect lightning zone location. The aircraft was subsequently returned to service. The installing inspector was made aware of the discrepancy after the customer took the aircraft to a separate maintenance facility for unrelated installation.

The initial installation was performed strictly adhering to the diagrams provided in the approved Garmin installation manual. However, the manual's structural diagram uses shaded regions to differentiate between the various lightning protection zones (Zone 1, Zone 2, and Zone 3). The specific shading patterns/gradients chosen for these zones are visually very similar, lacking sufficient contrast or distinct cross-hatching especially when printed. This subtle visual presentation makes it highly susceptible to optical confusion during a routine text-and-diagram cross-reference on the hangar floor.

Due to this visual ambiguity in the technical publication, a Zone 2/Zone 1 boundary region was easily misidentified as an acceptable zone, resulting in the hardware being physically mounted in an area vulnerable to direct lightning transients. The applicable manual with ambiguous instructions is Garmin GI 275 Part 23 Approved Model List (AML) STC Installation Manual Part Number (PN) 190-02246-10 Appendix G. The specific pages used were G3, G4 and G12.

This report is being filed immediately upon discovery to flag a critical human factors and clarity defect in the STC installation manual graphics to prevent similar visual misinterpretations by other maintenance providers, and to document that the resulting installation error was entirely inadvertent.

I have forwarded a copy of the report to them in order to review other installations and verify no other installs were performed with this issue.

SYNOPSIS

Repair Station Inspector reported a OAT probe and magnetometer were found to have been inadvertently installed in an incorrect lightning zone location, which may have been caused by the visual ambiguity of the Garmin installation manual.