

UNCLASSIFIED

MSG DTG 171445Z JUN 09

FROM COMMANDER, AMCOM, REDSTONE ARSENAL, AL //AMSAM-SF-A//

**SUBJECT - AVIATION MAINTENANCE ACTION MESSAGE (AMAM),
MAINTENANCE MANDATORY, ALL OH-58D AND AH-64 SERIES AIRCRAFT,
EMBEDDED GLOBAL POSITIONING AND INERTIAL NAVIGATION UNIT (EGI),
H-58-09-AMAM-04 / H-64-09-AMAM-10**

NOTE

This message is effective until rescinded or superseded.

NOTE

This message is issued IAW AR 750-6 and has not been officially transmitted to units subordinate to addressees. Commanders of Army Commands (AC), Army National Guard (ARNG), United States Army Reserve (USAR), Army Service Component Commands (ASCC), and Direct Reporting Units (DRU) will immediately retransmit this message to all subordinate units, activities or elements affected or concerned, and immediately confirm this retransmittal by notification to the AMCOM SOF Compliance Officer at "safeadm@conus.army.mil".

NOTE

Commanders or Directors (not lower than the grade of Major General or civilian equivalent) of ACs, ARNG, USAR, ASCCs, and DRUs may authorize temporary exception from message requirements IAW AR 750-6, para 2-9. Exception may only occur when combat operations, matter of life or death in civil disasters, or other emergencies, are so urgent that they override the consequences of continued aircraft operation.

NOTE

Commanders unable to comply with the requirements of this message within the time frame specified will change the affected aircraft status symbol to a Red //X//.

NOTE

Commanders, Facility Managers, and Contractors at all levels, to include DD 250 aircraft, will not issue aircraft until they are in compliance with this message.

NOTE

A listing of published safety messages, to include TAMMS Reports, Inspection Reports, and any Supplements/Addendums

required by this message can be viewed/downloaded at:
"<https://asmprd.redstone.army.mil>". This is a secure
website which requires an Army Knowledge Online (AKO),
"<https://www.us.army.mil>", user ID and password.

1. SUMMARY -

1.1. Background - The Embedded Global Positioning and Inertial Navigation Unit (EGI) vendor has identified an elevated temperature anomaly that affects 67 EGIs. The anomaly is isolated to systems running the EGI's 256 Hz Operational Flight Software (OFS) in the OH-58D, AH-64A, and AH-64D. The cause of the anomaly has been isolated to a Field Programmable Gate Array (FPGA) located on the Inertial Electronics (IE) Circuit Card Assembly (CCA) which will cause the EGI to fail when temperatures exceed 30 degrees Celsius (86 degrees Fahrenheit). When the ambient temperature drops below 30 degrees Celsius, the EGI may begin to operate normally. This suspect FPGA was introduced into the H764 product line in response to the original FPGA becoming obsolete. Post replacement regression testing failed to detect the elevated temperature anomaly. Use of the suspect FPGA has been halted, and suspect EGIs have been identified by SN.

1.2. Message Purpose -

- 1.2.1. Inspect for the installation of a suspect EGI.
- 1.2.2. Brief all crewmembers of the possible EGI failure modes.

2. END ITEMS AFFECTED - All OH-58D and AH-64 series aircraft.

3. ASSEMBLIES/COMPONENTS/PARTS AFFECTED - Suspect

Assemblies/Components/Parts -

Nomenclature	PN	NSN
Inertial Navigation Unit (EGI)	34200650-300J	6605-01-421-0076

NOTE

When complying with the requirements of this message, complete forms and records entries IAW DA PAM 738-751. ULLS-A units will use appropriate "E" forms.

4. INITIAL AIRCRAFT TAMMS (THE ARMY MAINTENANCE MANAGEMENT SYSTEM) ENTRY

- Upon receipt of this message, make the following entry on DA Form 2408-13-1. Enter a Red Horizontal Dash //-// status symbol with the appropriate following statement:

4.1. OH-58D: "Comply with requirements of H-58-09-AMAM-04 NLT 20 JUN 09."

4.2. AH-64: "Comply with requirements of H-64-09-AMAM-10 prior to next flight, but NLT 20 JUN 09."

NOTE

Report compliance with this message, as defined below, via the AMCOM Message Tracking System (AMTRACKS) at ["https://amtracks.redstone.army.mil"](https://amtracks.redstone.army.mil). Unit personnel designated to submit compliance reports, that have not registered with AMTRACKS, must establish a profile at this web site before submitting their compliance reports.

5. COMPLIANCE REPORTING REQUIREMENTS

5.1. Aircraft Initial Compliance Report - Submit Initial Compliance Report via AMTRACKS NLT 23 JUN 09 IAW AR 750-6. The Initial Compliance Report consists of the Aircraft SN, MDS, Date of Initial TAMMS Entry, and the Inspection Results/Comments as indicated below:

AH-64D - Enter "PASS" if both EGIs are NOT suspect, or "FAIL" if either EGI is suspect.

AH-64A and OH-58D - Enter "PASS" or "FAIL".

ALL AIRCRAFT - If entering "FAIL" include the EGI SN.

5.2. Aircraft Final Compliance Report - Submit Final Compliance Report via AMTRACKS within three (3) days of the EGI Replacement, but NLT 16 JUN 10 IAW AR 750-6. This report will include Date Replaced (if no replacement is required

enter the TAMMS Entry Date), and check the box "Entered on DA Form 2408-15".

5.3. Retail Stock Task/Inspection Compliance Report (Installation level and below) - Submit Retail Stock Task/Inspection Compliance Report via AMTRACKS NLT 23 JUN 09 IAW AR 750-6. This report will include Component Nomenclature, SN, and Inspection Results (enter "PASS" or "FAIL").

5.4. Wholesale Stock Task/Inspection Compliance Report (Including Depot Stock, Depot Maintenance and Single Stock Fund) - Report compliance with this message IAW para 8 to the EGI Replacement POC in para 13.2.1.

6. SPECIAL PROVISIONS TO MESSAGE REQUIREMENTS (AIRCRAFT) -
Aircraft in Transit (Surface/Air Shipment/Ferry Status/ Aircraft Away From Home Station) - Unit commanders unable to comply with the requirement specified in para 4 may defer making the initial Aircraft TAMMS entry until arrival at final destination. Adjust the date in the TAMMS Entry to be NLT 3 days after arrival at destination.

7. TECHNICAL PROCEDURES/INSTRUCTIONS -

NOTE

Units will obtain replacement EGIs IAW para 10 of this message. Prior to installing replacement EGIs, verify SN is not listed in para 7.1 of this AMAM. Suspect EGIs that have been repaired can be identified by a sticker which reads "HOT TEMP UPDATE". Quality Control (QC) can also verify repair by contacting the 2410 hotline, or by reviewing DA Form 2410 data in the Maintenance Consolidated Database (MCDS) at "<https://tammsa.redstone.army.mil>". If the EGI has a "HOT TEMP UPDATE" sticker, but there is no

Copy 2, DA Form 2410, the unit will complete the Copy 2 through MCDS.

7.1. Conduct visual inspection of the aircraft EGI(s) SN to determine if any of the suspect EGIs listed below are installed.

32233	32280	32281	32378	32387	32419	32388	32462
32420	32466	32468	32515	32514	32512	32516	32580
32581	32582	32608	32604	32628	32631	32696	32687
32760	32825	32878	32875	32876	32877	32963	32952
32954	32962	32991	32994	32958	32993	32990	32992
33063	33062	33067	33070	33069	33078	33071	33079
33132	33060	33159	33118	33160	33161	33162	33163
33135	33216	33215	33217	33226	33299	33298	33300
33434	33435	33436					

7.1.1. If a suspect EGI is installed , perform the following -
AH-64D - Proceed to para 7.2.

OH-58D and AH-64A - Proceed to para 7.3.

7.1.2. If NO suspect EGI(s) are installed, the inspection is complete. Proceed to para 7.4.

7.2. **AH-64D REQUIREMENTS** -

CAUTION

Commanders should NOT operate AH-64D aircraft with two (2) suspect EGIs installed.

7.2.1. Make the following entries (as appropriate) on the aircraft DA Form 2408-13-1.

7.2.1.1. If both EGIs are suspect, enter a Red //X// status symbol with the following statement: "Replace EGI [1 or 2], SN [#####], IAW H-64-09-AMAM-10."

7.2.1.2. For all suspect EGIs remaining installed, enter two (2) Red Diagonal "/" status symbols with the following statements: "Replace EGI [1 or 2], SN [#####], IAW H-64-09-

AMAM-10 NLT 16 JUN 10" and "Suspect EGI installed, select EGI [1 or 2] as the primary IAW H-64-09-ASAM-##."

7.2.2. Proceed to para 7.4.

7.3. OH-58D / AH-64A REQUIREMENTS -

7.3.1. Make the following entry on the aircraft DA Form 2408-13-1 as applicable.

7.3.1.1. OH-58D - Enter a Red Diagonal "/" status symbol with the following statement: "Replace EGI, SN [#####], IAW H-58-09-AMAM-04 NLT 16 JUN 10."

7.3.1.2. AH-64A - Enter a Red Diagonal "/" status symbol with the following statement: "Replace EGI, SN [#####], IAW H-64-09-AMAM-10 NLT 16 JUN 10."

7.4. A copy of this message will be placed in the unit's Aircrew Reading File until all suspect EGIs are replaced. Replacement EGIs will be IAW para 10.3 of this AMAM and replacement will be done thru a rotatable pool.

7.5. Clear the initial entry from para 4 and note compliance on DA Form 2408-15.

8. PROCEDURES/INSTRUCTIONS FOR ASSEMBLIES/COMPONENTS/PARTS IN WORK OR IN STOCK (AT ALL LEVELS INCLUDING WAR RESERVES) -

Annotate the serviceability tag with: "Embedded Global Positioning and Inertial Navigation Unit (EGI), H-58-09-AMAM-04 / H-64-09-AMAM-10, not complied with". Do not remove original condition tags.

8.1. Items in Retail Stock - Commanders and facility managers that maintain retail stock at installation level and below will complete the following procedures.

8.1.1. Suspend issue of affected items until in compliance with message requirements.

8.1.2. Contact the supported aviation unit, as required, to perform the procedures required on affected items.

- 8.1.3. Comply with inspection and correction procedures as required to return items to serviceable stock.
- 8.1.4. Submit a Task/Inspection report IAW para 5.
- 8.2. Items in Wholesale Stock, Single Stock Fund, and in Work (Overhaul/Repair Facility) -
 - 8.2.1. Submit a list of SNs for all affected items in stock to the EGI Replacement POC in para 13.2.1.
 - 8.2.2. Follow instructions from the EGI Replacement POC in para 13.2.1 to return items to service.

9. SPECIAL TOOLS AND FIXTURES REQUIRED - N/A.

10. SUPPLY/PARTS (REQUISITION/DISPOSITION) -

10.1. Parts Required -

Nomenclature	PN/NSN	Qty	Cost ea
Inertial Navigation Unit (EGI)	34200650-300J 6605-01-421-0076	1	No Cost to the Unit

10.2. Bulk and Consumable Materials - N/A.

NOTE

When the rotatable pool is established, priority of issue will be first to deployed OH-58Ds, second to deployed AH-64Ds, and last to all non-deployed aircraft.

10.3. Requisitioning Instructions - Contact the Replacement POC in para 13.2.1 for a replacement EGI.

10.4. Disposition of Discrepant Parts/Components - Hold discrepant part pending disposition instructions from the Replacement POC in para 13.2.1.

10.5. Disposition of Hazardous Material - N/A.

11. MAINTENANCE APPLICATION -

11.1. Category of maintenance - AVUM.

11.2. Estimated Time Required -

11.2.1. Time to complete inspection - Total of 0.5 man-hours using 1 person.

NOTE

The time stated below does not include time for Maintenance Operational Checks (MOC) or Maintenance Test Flights (MTF), if required.

11.2.2. Time for repair/replacement - Total of 1.0 man-hour using 1 person.

12. PUBLICATION REQUIREMENTS -

12.1. References -

12.1.1. AR 750-6.

12.1.2. DA Pam 738-751.

12.1.3. TM 1-1520-Longbow/Apache Interactive Electronic Technical Manual (IETM).

12.1.4 TM 11-1520-238-23-1.

12.1.5 TM 1-1520-248-23, Interactive Electronic Technical Manual (IETM).

12.1.6. TM 11-1520-248-23, Interactive Electronic Technical Manual (IETM).

12.2. Publication Changes - N/A.

13. POINTS OF CONTACT -

13.1. Technical POCs -

13.1.1. AH-64 (Primary) - Ms. Brenda Menees, DSN (256) 897-6367 or (256) 313-6367. Fax: DSN 897- 3208 or (256) 313-3208. Email: "brenda.menees@us.army.mil".

13.1.2. AH-64 (Alternate) - Mr. Andy Fabery, DSN 897-6260 or (256) 313-6260. Fax: DSN 897-3208 or (256) 313-3208. Email: "andy.fabery@us.army.mil".

13.1.3. OH-58D (Primary) - Mr. Ed Mueller, DSN 897-2393 or (256) 313-2393. Fax: DSN 788-6758 or (256)842-6758.
Email: "edward.mueller@us.army.mil".

13.1.4. OH-58D (Alternate) - Mr. Scott Harris, DSN 897-2405 or (256)313-2405. Fax: DSN 788-6758 or (256)842-6758.
Email: "michael.scott.harris@us.army.mil".

13.2. Project/Product Manager's (PM) Office POCs -

13.2.1. EGI Replacement POC (OH-58 and AH-64) - Mr. Scott Tisdale (VT Aepco), DSN 897-4055 or (256) 313-4055. Fax: DSN 897-4343 or (256) 313-4343. Email: "scott.tisdale@us.army.mil".

13.2.2. AH-64 (Primary) - Ms. Holly C. Berry (QTEC, Inc), DSN 897-4192 or (256) 313-4192. Fax: 897-4569 or (256) 313-4569.
Email: "holly.berry@us.army.mil".

13.2.3. AH-64 (Alternate) - Mr. Chaz Johnson (VT Aepco), DSN 897-4228 or (256) 313-4228. Fax: 897-4569 or (256) 313-4569.
Email: "charles.johnson19@us.army.mil".

13.2.4. OH-58D (Primary) - Mr. Scott Dunlap, DSN 788-2495 or (256) 842-2495. Fax: DSN 645-7125 or (256)955-7125.
Email: "scott.a.dunlap@us.army.mil".

13.2.5. OH-58D (Alternate) - Mr. Craig Lindsey (SAIC), DSN 746-3537 or (256)876-3537. Fax :DSN 645-7125 or (256)955-7125.
Email: "craig.lindsey@us.army.mil".

13.2.6. AH-64 Logistics - Mr. Bill Goforth (CAMBER), DSN 897-4044 or (256) 313-4044. Fax: DSN 897-4343 or (256) 313-4343. Email: "william.goforth@us.army.mil".

13.3. Forms and Records POCs -

13.3.1. Primary - Ms. Ann Waldeck, DSN 746-5564 or (256) 876-5564. Email: "ann.waldeck@conus.army.mil".

13.3.2. Alternate - Mr. David Derbort, DSN 746-5151 or (256) 876-5151. Email: "david.derbort@conus.army.mil".

13.4. AMCOM Safety POCs -

13.4.1. Primary - Mr. Harry Trumbull (SAIC), DSN 897-2095

or (256) 313-2095. Email: "harry.trumbull@conus.army.mil".

13.4.2. Alternate (OH-58D) - Mr. Don Swallow, DSN 788-8641 or (256) 842-8641. Email: "donald.swallow@conus.army.mil".

13.4.3. Alternate (AH-64) - Mr. Russell Peusch, DSN 788-8632 or (256) 842-8632. Email: "russell.peusch@conus.army.mil".

13.5. Foreign Military Sales POCs -

13.5.1. Primary - Mr. George Ashmore (CAS), DSN 788-1094 or (256) 842-1094. Email: "george.ashmore1@us.army.mil".

13.5.2. Alternate - Mr. Tom Gibson, DSN 788-1077 or (256) 842-1077. Email: "thomas.b.gibson@us.army.mil".

13.6. After hours, contact the AMCOM Operations Center (AOC), DSN 897-2066/7 or (256) 313-2066/7.