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UNCLASSIFIED
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MSG DTG 211930Z JUL 05

FROM CDRAMCOM, REDSTONE ARSENAL, AL //AMSAM-SF-A//

SUBJECT - AVIATION SAFETY ACTION MESSAGE (ASAM), MAINTENANCE MANDATORY, RCS CSGLD-1860(R1), CH-47 AIRCRAFT, VERTICAL HINGE PIN BEARINGS, CH-47-05-ASAM-03.

........NOTE......

....This message is effective until rescinded or superseded.

....This message is issued IAW AR 95-1 and has not been

....transmitted to units subordinate to addressees.Addressees will immediately retransmit this message

....to all subordinate units, activities or elementsaffected or concerned. MACOMs will immediately

....verify this transmission to the AMCOM SOF Compliance

....Officer (AMSAM-SF-A, safeadm@redstone.army.mil).

.....NOTE.....

....MACOM commanders may authorize temporary exception frommessage requirements IAW AR 95-1, Ch 6. Exception mayonly occur when combat operations or matter of life ordeath in civil disasters or other emergencies are so

....urgent that they override the consequences of continuedaircraft operation.

....Commanders unable to comply with the requirements ofthis message within the time frame specified will change

....the affected aircraft status symbol to a Red //X//.

1. SUMMARY -

Background - Twenty four vertical hinge pin upper bearings have been found that were marked incorrectly as vertical hinge pin lower bearings. The DA Form 2410 for these parts correctly identified them as upper bearings, but the parts themselves and their packaging were marked as lower bearings. Additionally, 20 of the bearings had corrosion on the inner diameter vertical hinge pin mating surface. The upper bearing inner diameter is larger than the lower bearing inner diameter. The bearing manufacturer has isolated the problem to one set of 78 bearings. As many as 54 mislabeled bearings could still be installed or in stock.

1.2. Message Purpose -

1.2.1. Require a serial number records check of upper and lower vertical hinge pin bearings.

1.2.2. Remove discrepant bearings from service and the supply

END ITEMS AFFECTED - All H-47 series aircraft.

ASSEMBLIES/COMPONENTS/PARTS AFFECTED -

3.1. Suspect/discrepant assemblies/components/parts -..Nomenclature NSN

114RS214-6 3110-00-455-6179 .Vertical Hinge Pin Upper Bearing

- 3.2. Additional assemblies/components/parts to be inspected -..Nomenclature PNNSN
- .. Vertical Hinge Pin Lower Bearing 114RS214-5 3110-00-455-6188 ..Head, Rotary Wing FWD 145R2003-10 1615-01-391-4398

Head, Rotary Wing AFT 145R2004-20 1615-01-391-4399

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.....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.
     INITIAL TAMMS (THE ARMY MAINTENANCE MANAGEMENT SYSTEM)
COMPLIANCE REQUIREMENTS -
4.1. Upon receipt of this message, make the following entry on
the DA Form 2408-13-1. Enter a Red Horizontal Dash //-// status symbol with the following statement: "Comply with requirements of
CH-47-05-ASAM-03 before [####.#] aircraft hours, but NLT 4 August 2005." Calculate [####.#] as current aircraft flight hours plus
10 hours.
         .....NOTE.....
....The TAMMS compliance reporting form is available at
.... "www.redstone.army.mil/sof/tamms.xls" (use lower case
....letters only) or may be obtained from the units
....servicing LAR. Alternate forms may be approved by
....the AMCOM SOF Compliance Officer.
.....The TAMMS Compliance Report only confirms the unit has
....made the initial logbook entry for assigned aircraft.
....TAMMS Compliance Reports will include aircraft serial
....numbers (in numerical order), date of entry on DA Form
....2408-13-1, unit address, local POC name and phone number.
4.2. TAMMS Compliance Report - Submit TAMMS Compliance Report via priority email to "safeadm@redstone.army.mil" NLT 28 Jul 05 IAW AR 95-1. If email is not available, the report may be faxed to: SOF Compliance Officer at DSN 897-2111 or (256) 313-2111.
5. TASK/INSPECTION COMPLIANCE REPORTING REQUIREMENTS -
             . . . . . . . . . . . NOTE . . . . . . . . . . .
....The Task/Inspection Reporting Form is available at .... "www.redstone.army.mil/sof/log.xls" (use lower case
....letters only) or may be obtained from the units
....servicing LAR. This report will cite the message
....number, date of inspection, aircraft serial number,
....aircraft hours, component serial number, component
....hours, and results of the inspection.
5.1. Aircraft - Submit Task/Inspection Compliance Report for
this message to Log POC NLT 6 Aug 05.

5.2. Retail Stock (Installation level and below) - Report receipt of this message to Log POC NLT 25 Jul 05. Provide unit POC, address and phone number. Submit Task/Inspection Compliance Report for this message to Log POC NLT 6 Aug 05.

5.3. Wholesale Stock (Including Depot stock, Depot Maintenance and Single Stock Fund) - Report receipt of this message to
and Single Stock Fund) - Report receipt of this message to
Wholesale Bearing POC listed in para 13.3.1. NLT 25 Jul 05
Provide local POC, address and phone number. Report compliance
with this message IAW para 8 to Wholesale Bearing POC NLT 6
Aug 05. DLA stock has been inspected and no report of Wholesale
Stock from DLA is required for this ASAM.

6. SPECIAL PROVISIONS TO MESSAGE REQUIREMENTS (AIRCRAFT)
        Aircraft in AVIM or Depot level maintenance - Commanders
facility managers and contractors will not issue aircraft until
they are in compliance with this message.
6.2. Aircraft at Contractor Facility - DD 250 aircraft will be
in compliance with this message prior to departure.
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c47a0503 6.3. Aircraft in Transit -6.3.1. Surface/Air Shipment - Comply with message requirements within 10 aircraft hours/14 days of arrival. 6.3.2. Ferry Status/Aircraft away from home station - Comply with message requirements within 10 aircraft hours/14 days of arrival. 6.4. Maintenance Trainers (Cat A and B) - Comply with message requirements NLT 21 Sep 05. TECHNICAL PROCEDURES/INSTRUCTIONS -Inspect aircraft historical records, DA Forms 2408-16 (FWD/AFT Rotor Head Assy), for the serial numbers of the six (6) upper and six (6) lower pitch varying housing vertical hinge pin bearings. If any of the bearings have serial numbers in the range N33900-N33977 perform the following: If discrepant bearings were installed as upper bearings 7.1.1. change the aircraft status on the DA Form 2408-13-1 to a Red //X// status with the following entry: "Replace SN discrepant vertical hinge pin bearings IAW CH-47-05-ASAM-03." Disposition the bearings IAW para 10.4. Replace all bearings removed from the aircraft by installing new bearings (with serial numbers outside the range N33900-N33977) IAW TM 55-1520-240-23-4 Task 5-39 or TM 1-1520-252-23-5 Tasks 5-49. 7.1.2. If discrepant bearings were installed as lower bearings, the bearings and rotor head are unserviceable. Change the aircraft status on the DA Form 2408-13-1 to a Red //X// with the following entry: "Replace SN ____ Discrepant vertical hinge pin bearings and suspect rotor head IAW CH-47-05-ASAM-03." Disposition the bearings and rotor head IAW para 10.4. Replace rotor head IAW TM 55-1520-240-23-4 Task 5-8 and 5-9, TM 1-1520-252-23-5 Task 5-9 and 5-10. Replace all bearings removed from the aircraft by installing new bearings (with serial numbers outside the range N33900-N33977) IAW TM 55-1520-240-23-4 Task 5-39 or TM 1-1520-252-23-5 Tasks 5-49. 7.2. Clear the initial entry from para 4.1. and note compliance on DA Form 2408-5-1 (Rotor Head Assy). PROCEDURES/INSTRUCTIONS FOR ASSEMBLIES/COMPONENTS/PARTS IN

WORK OR IN STOCK (AT ALL LEVELS INCLUDING WAR RESERVES) - Annotate the serviceability tag with: "CH-47-05-ASAM-03, Vertical Hinge Pin Upper Bearing, 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. Report message receipt to Log POC IAW para 5.

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

8.1.3. Contact the supported aviation unit, as required, to perform the procedures required on affected items. 8.1.4. Comply with inspection and correction procedures as

required to return items to serviceable stock.

8.1.5. Submit a Task/Inspection report to Log POC IAW para 5. 8.2. Items in Single Stock Fund and in Work (Overhaul/Repair Facility) - Comply with inspection and correction procedures as required to return items to serviceable stock.

8.2.1. Depot, unit and other maintenance activity commanders will ensure items listed in para 3 are not issued until they are in compliance with this message.

8.2.2. Submit Task/Inspection Compliance Report to Wholesale POC IAW para 5.3.

Items in Wholesale Stock - N/A. DLA stock has been inspected and no report of Wholesale Stock from DLA is required for this ASAM.

9. SPECIAL TOOLS AND FIXTURES REQUIRED - Units should have these Page 3

c47a0503

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special tools on hand -
..Nomenclature
                                              PN
                                                                NSN
                                         SC518099CLB13 5180-01-375-6928
...Tool Kit, Powertrain
      Repairer's (T273)
..Puller Assy, Bearing (T102)
..Drift, Soft Aluminum
                                          114G1236-1
                                                            5120-00-879-3710
                                         1/2 \times 1/2 \times 1/2 inches
..Heater Gun (T319)
                                         M83521/5-01
                                                            4920-01-215-0985
..Puller, Bearing and Seal (T10)
                                         114E5814-7
                                                            5120-00-917-1020
10. SUPPLY/PARTS (REQUISITION/DISPOSITION) -
10.1. Parts Required
..Nomenclature
                            PN/NSN
                                           Qty
                                                   Cost ea.
                                                                   Total $
                                                   $3,295.20
                                                                   $39,542.40
..Bearing, Upper
                        114RS214-6
                                            12
......3110-00-455-6179
..Bearing, Lower 114RS214-5
                                         12
                                                  $3,295.20
                                                                   $39,542.40
.....3110-0-455-6188
..Head, 145R2003-10 1 $293,483.00
                                                                 $293,483.00
                             1615-01-391-4398
.....Rotary Wing FWD
                        145R2004-20
                                           1 $276,395.00
                                                                 $276,395.00
                             1615-01-391-4399
.....Rotary Wing AFT
 .....Total cost per aircraft = $648,962.80 (if all 12 bearings plus Rotor head (if required) are replaced)
10.2. Bulk and consumable materials
..Nomenclature
                                                                  NSN
                                           Model 110-4
                                                            6685-01-477-7443
...Strips, Temperature
       Indicating (E413.2)
.. Pencil, Marking (E270.1)
                                                            7510-00-465-0994
                                           24402
.. Paper Tag (E264)
                                                            8135-00-292-2345
                                           A-A-1266
..Gloves, Anti-Contact (E184.1)
                                           MIL-G-87066
                                                            8415-01-147-6263
..Gloves, Kevlar (E187)
..Cloth, Cleaning (E120)
                                           MIL-M-11199
                                                            8415-01-092-0039
                                           CCC-C-46
                                                            8305-00-753-2967
6850-01-474-2320
                                           MIL-PRF-680
                                          MIL-PRF-7808 9150-00-782-2627
                                          MIL PRF-23699 9150-00-955-7099
..Oil, Lubricating
                        (E253)
 Oil, Lubricating (E254.1)
                                          DOD-L85734
                                                            9150-01-209-2684
10.3. Requisitioning instructions - Requisition replacement
parts using normal supply procedures. All requisitions shall use Project Code (CC 57-59) "X3C" (X-ray-Three-Charlie).
.....Project Code "X3C" is required to track and establish
....a data base of stock fund expenditures incurred by
....the field as a result of message actions.
10.4. Disposition of discrepant parts/components - Unit will
submit a CAT 1 QDR. Hold part(s) as a QDR exhibit and wait for QDR disposition instructions. If instructed to dispose of using normal supply procedures, all turn-in documents must include Project Code (CC 57-59) "X3C" (X-ray-Three-Charlie).

10.5. Disposition of hazardous material - IAW Environmental
Protection Agency directives as implemented by your servicing environmental coordinator (AR 200-1).
11. MAINTENANCE APPLICATION -
11.1. Category of maintenance - AVUM.
11.2. Estimated time required -
11.2.1. Time to complete inspection - Total of 1 man-hour using 1 person with no "Not Mission Capable Maintenance" (NMCM) time per end item.
             . . . . . . . . . NOTE . . . .
....The time stated below does not include time for
....Maintenance Operational Checks or Maintenance Test
....Flights, if required.
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Time for bearing replacement - Total of 10 man-hours
using 2 persons with 5 hours "Not Mission Capable Maintenance"
(NMCM) time per end item.
11.2.3. Time for Rotor Head replacement - Total of 123 man-hours using 6 persons with 20.5 hours NMCM time per end item.
12. PUBLICATION REQUIREMENTS -
12.1. References -
12.1.1. AR 95-1.
              AR 200-1.
12.1.2.
               DA Pam 738-751.
12.1.3.
               TM 1-55-1520-240-23, Aviation Unit and Aviation
Intermediate Maintenance Manual, CH-47D Helicopter.
12.1.5. TM 1-1520-252-23, Aviation Unit and Aviation Intermediate Maintenance Manual, MH-47E Helicopter. 12.2. Publication changes - TM 1-1520-240-23-1, Overhaul and
Retirement Schedule, Task 1-91, The following "NOTE" will be
added as Note H: "The following Vertical Pin Bearings.
PN 114R214-5, with a serial number range of (N33900 thru N33977) will NOT be used. If installed, contact SFAE-AV-CH-CS, DSN 897-0721 or (256) 313-0721. Fax is 897-4726 or (256) 313-4726." For TM 1-1520-252-23-1, Overhaul and Retirement Schedule, Task 1-99, The following "NOTE" will be added as Note F: "The following Vertical Pin Bearings, PN 114R214-5, with a serial number range of (N33900 thru N33977) will NOT be used. If
number range of ( N33900 thru N33977) will NOT be used. If
installed, contact SFAE-AV-CH-CS, DSN 897-0721 or (256) 313-0721. Fax is 897-4726 or (256) 313-4726."
13. POINTS OF CONTACT -
13.1.
           Technical POCs are -
13.1.1. Primary - Mr. Neil Sutherland, AMSRD-AMR-AE-C, DSN 897-3382 or (256) 313-3382. Fax is 897-4726 or (256) 313-4726. Email is "neil.sutherland@peoayn.redstone.army.mil".
13.1.2. Alternate - Mr. Tim Rickmeyer, AMSRD-AMR-AE-C, DSN 645-6485 or (256) 955-6485. Fax is 897-4726 or (256) 313-4726.
Email is "timothy.rickmeyer@peoavn.redstone.army.mil".
          Logistical POCs are -
13.2.1. Primary - Mr. Bill Olson, SFAE-AV-CH-L, DSN 897-0721 or
(256) 313-0721. Fax is 897-4726 or (256) 313-4726. Email is "william.olson@peoavn.redstone.army.mil".
13.2.2. Alternate - CW4 Hank Rexing, SFAE-AV-CH-L, DSN 897-0720 or (256) 313-0720. Fax is 897-4726 or (256) 313-4726. Email is "hank.rexing@us.army.mil".
13.3. Wholesale Materiel POC (spares)
13.3.1. Bearings - Ms. Sharon whitt, DLA, DSN 695-4323 (804) 279-4323. Fax is DSN 279-5695. Email is "sharon.whitt@dla.mil".
13.3.2. Rotary Wing Head - Mr. Phil Batey, AMSAM-MMC-AV-CA, DSN 897-3369 or (256) 313-3369. Fax is DSN 897-4348. Email is
  phillip.batey@us.army.mil"
13.4. Forms and Records POC's are -
13.4.1. Primary - Ms. Ann Waldeck, AMSAM-MMC-MA-NM, DSN 746-5564 or (256) 876-5564. Fax is DSN 746-4904 or (256) 876-4904. Email is "ann.waldeck@us.army.mil".
13.4.2. Alternate - Ms. Sibyl Johnson, AMSAM-MMC-MA-NM, DSN 788-
6696 or (256) 842-6696. Fax is DSN 746-4904 or (256) 876-4904. 
Email is "sibyl.johnson@redstone.army.mil".
13.5. Safety POCs are -
13.5.1. Primary - Mr. Frank Rosebery (SAIC), AMSAM-SF-A, DSN 788-8631 or (256) 842-8631. Fax is DSN 897-2111 or (256) 313-2111. Email is "james.rosebery@us.army.mil".
13.5.2. Alternate - Mr. Russell Peusch, AMSAM-SF-A, DSN 788-8632 or (256) 842-8632. Fax is DSN 897-2111 or (256) 313-2111. Email
is "russell.peusch@us.army.mil".
13.6. Foreign Military Sales POC is Mr. Ronnie W. Sammons,
                                                                 Page 5
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c47a0503

AMSAM-SA-AS-UT, DSN 897-0875 or (256) 313-0875. Fax is DSN 897-0411 or (256) 313-0411. Email is "ronnie.sammons@us.army.mil". 13.7. After hours, contact the AMCOM Operations Center (AOC) DSN 897-2066/7 or (256) 313-2066/7.