

V/C Reg #: N407HC

V/C Ser #: 53745

V/C Make / Model : Bell Helicopter / 407

XO #: MR4387

A/C TT : 1929.60

A/C Tach / Hour Meter : 1929.60

Landings / Cycles : 2654

Date : 12/05/2014

Eng Make : Allison Engine Company, Inc.

Eng Model : 250-C47B

Eng Ser #: CAE-848010

Eng TT : 1929.6

Eng TSO : 0.0

Eng TC : 2338

Eng CSO : 0.0

1. Complied with Sudden Stoppage Main Rotor Power "On" or "Off" Conditional Inspection IAW BHT-407-MM-1 Chap. 5-00-00. Para. 5-28.
2. Complied with Sudden Stoppage Tail Rotor Power "On" or "Off" Conditional Inspection IAW BHT-407-MM-1 Chap. 5-00-00. Para 5-29.
3. Complied with Hard Landing Conditional Inspection IAW BHT-407-MM-1 Chap. 5-00-00. Para. 5-27.
4. Disassembled and reassembled aircraft for repair. Sent fuselage to USCAN Limited in Ontario Canada for fuselage repairs detailed in their USCAN WO# 7574. Ref SAI W/O 4387 for details.
5. Complied with Main rotor hub overhaul P/N 407-010-100-123 S/N LK 330 T.S.O. 0.0 IAW BHT-407-CR&O Chapter 62-00 Para. 62-2. See component cards for details.
6. Complied with Main Mast Assembly overhaul P/N 407-040-011-107 S/N 53745 T.S.O. 0.0 IAW BHT-407-MM Chapter 63-00. Overhauled by Piney Flats reference WO 65010957. See component cards for details.
7. Complied with Freewheeling unit overhaul P/N 406-040-500-131 S/N A-6581 T.S.O. 0.0 IAW BHT-407-MM Chapter 63-00 and BHT-407-CR&O Chapter 63-00. See component cards for details.
8. Complied with Main rotor gearbox overhaul P/N 407-040-006-115 S/N A-788 T.S.O. 0.0 IAW BHT-407-CR&O Chapter 63-00 Para 63-23. See component cards for details.
9. Removed Main Gearbox corner mounts P/N 407-310-203-101 and replaced with new P/N 407-310-203-101 S/N's LK8810, LK8813, LK8963, and LK8911 IAW BHT-407-MM Chapter 63-00.
10. Removed engine Rolls Royce 250-C47B S/N CAE-848010. Engine was inspected and repaired at Keystone Turbine Services for hard landing of less than 10g with sudden stoppage. overhauled the gearbox, turbine and fuel nozzle, repaired the compressor, and tested the engine IAW C47B Overhaul Manual Ed 2, Rev. 14 Reference Keystone Turbine Services CRS# 8MHR895B. Re installed engine after repair I.A.W. BHT-407-MM-9 chapter 71-00. Installed overspeed adapter P/N M250-10684 Complying with **ASB 407-14-102 part I,II, and IV**, and customer supplied Fadec Assembly P/N 23088856 S/N JG12ANU1454 with software version 5.400 complying with **TB 407-14-111**. No further action required.
11. Removed Driveshaft Assembly P/N 407-340-310-101 S/N KC 421 due to sudden stoppage per BHT-407-MM-1-5-28. Installed new main rotor drive shaft assy (Kaflex) P/N 407-340-310-101 S/N KC1279 IAW BHT-407-MM-6 Chapter 63-00.
12. Removed and re installed 3 main rotor blades P/N 407-015-001-137 S/N A-3795, A-3788, and A-3807 after repair from Bell Helicopter Ref Bell W/O's 407M-3795, 407M-3807, 407M-3788 that were inspected for sudden stoppage hard landing and repaired per 204-099-223 Vol. XX Rev L. Received 1 reconditioned main rotor blade P/N 407-015-001-137 S/N A-4100. Installed IAW BHT-407-MM Chapter 62-00.
13. Removed Tail Rotor Hub Assembly P/N 407-012-101-113 S/N HB 261, Blade P/N 406-016-100-119 S/N A-4345, and blade P/N 406-016-100-119 S/N A-4410. Installed new tail rotor hub assembly P/N 407-012-101-113 S/N HB883 and new blades P/N 406-016-100-119 S/N BH174620 AND S/N BH171423. Static balanced and installed as an assembly onto the aircraft IAW BHT-407-MM Chapter 62-00 and 63-00.
14. Removed Tail Rotor Gearbox P/N 406-040-400-121 S/N A-1687 from service IAW BHT-407-MM-05 Chapter 5-00-00 Par. 5-29. Installed new tail rotor gearbox P/N 406-040-400-113 S/N BH 69684 IAW BHT-407-MM Chapter 65.
406-121 1986/9
15. Removed damaged tail rotor control tube P/N 407-001-026-101. Installed new tail rotor control tube P/N 407-001-026-101 IAW BHT-407-MM Chapter 67-00.
16. Replaced the following tail rotor pitch change assemblies with new parts: control tube assembly P/N 406-012-118-101, crosshead P/N 407-012-109-101, Pitch Link Assemblies P/N 406-312-103-101 @2, Control rod driver plate P/N 406-012-104-103, Rod assembly P/N 406-012-129-101, Housing assembly P/N 206-011-721-113 Bearing P/N 206-011-731-001, Boot P/N 406-312-106-101. Work done I.A.W. BHT-407-MM-8 chapter 67-00. Performed directional control rigging and minimum friction IAW BHT-407-MM Chapter 67-00.
17. Installed new tail rotor driveshaft assemblies P/N 407-040-330-107 S/N's BH 229782, BH 229780, BH 229778, and BH 229781. Performed shimming procedure, bearing alignment, and driveshaft alignment. All work performed IAW BHT-407-MM-7 Chapter 63-00.
18. Installed new oil cooler bearings P/N 407-340-339-107 S/N ZS33734 and S/N ZS33762 onto new bearing hangers P/N 407-040-322-105 (qty 2). Installed new oil cooler shaft P/N 407-040-320-103 S/N BH084076 on to oil cooler blower impeller P/N 206-061-432-117. All work performed IAW BHT-407-MM Chapter 65-00.
19. Removed damaged Tailboom P/N 407-030-801-205 S/N 53475 and installed new Tailboom P/N 407-030-801-219 S/N BP1766 IAW BHT-407-MM Chapter 53-00.
20. Removed damaged horizontal stabilizer P/N 407-023-801-109 S/N 53745 and replaced with new horizontal stabilizer P/N 407-023-801-109 S/N BP1807 IAW BHT-407-MM Chapter 53-00.
21. Installed new horizontal slat assemblies P/N 407-023-001-103 BP1607 IAW BHT-407-MM Chapter 53-00.
22. Installed new horizontal finlets LH finlet P/N 407-023-003-105 S/N BP2914 and RH finlet P/N 407-023-003-106 S/N TWE15128-00 IAW BHT-407-MM Chapter 53-00.
23. Installed repaired vertical stabilizer P/N 206-020-113-233 S/N 4617 and new tail skid assembly 206-020-110-103 IAW BHT-407-MM Chapter 53-00.
24. Installed new landing gear Fwd cross tube P/N 407-724-101 S/N 6209 and new Rear cross tube P/N 407-725-106 S/N 1510 onto new LH skid gear P/N 407-011-301 S/N 5836 and new RH skid gear P/N 407-011-302 S/N 5838. Installed new LH Flite step P/N 206-330-101 S/N L2114 and new RH Flite step P/N 206-330-102 S/N R2163 to new crosstubes. All installations IAW AAI report's AA-95090 Rev. S, AA-98006 Rev. D, and AA-00006 Rev. F. Installed complete landing gear assembly to the fuselage IAW BHT-407-MM Chapter 32-00.

Continued on next page 1 of 2

25. Removed damaged SX-16 Nightsun. Installed new Aeropacific model AP407UM01 aft utility mount P/N AP407UM01 S/N 166 Ref. Aero Pacific Model Installation Manual AP407UM01-MM. Mounted New SX-16 P/N: 017500-211 S/N:015 and new Gimbal arm P/N: 019059-110 S/N: 4191.I.A.W. SX-16 nightsun searchlight system maintenance manual Document 031734-1/Revision NC Slass position sensor kit installed P/N 6105 S/N: N/A at Universal searchlight LLC Ref: P.O. 14-0524.1
26. Replaced windshields IAW Aeronautical Accessories installation instructions Report Number AA-01060, revision C, May 7, 2012
27. Removed Main Battery P/N: 31908-001 S/N: 10603565. Installed New Battery P/N: 31908-001 S/N: 11401364 IAW BHT-407-MM chapter 96-00-00.
28. Removed worn hydraulic pump shaft P/N 407-340-107-101 and installed a new hydraulic pump shaft P/N 407-340-107-101 IAW BHT-407-MM Chapter 29-00.
29. Painted Aircraft per scheme 1490B- Rev.G. Aircraft Painted with DuPont Aviation Colors Viper Blue B9638ES, Diamond Black N3894EP, Silver 43523EP, Chrome Yellow 6561EP. Complied I.A.W. BELL Helicopter Maintenance Procedures, BHT-ALL-SPM (Standard Practices Manual), Chapter 4-00-00
30. Complied with Main Rotor Drive system operational check I.A.W. BHT-407-MM-6 chapter 63-2. Serviced MGB with Aeroshell 555 IAW BHT-407-MM chapter 12-00-00.
31. Complied with all after first ground run torque checks I.A.W. BHT-407-MM-1 chapter 5-00 Table 5-3 Special Inspections.
32. Performed Main Rotor Ground Balance I.A.W. BHT-407-MM-2 chapter 18-00-00 using RADS-AT Balancer.
33. Performed Oil Cooler Balance I.A.W. BHT-407-MM-2 chapter 18-00 using RADS-AT Balancer.
34. Performed T/R Balance I.A.W. BHT-407-MM-2 chapter 18-00-00 using RADS-AT Balancer.
35. Performed actual weighing of aircraft I.A.W. BHT-407-MM-2 chapter 8-00 using Revere weighing kit Model# JW-100J5 S/N 115564 Cal. Date 5-30-14. Calculated Longitudinal and Lateral CG.

certify that this rotorcraft was repaired and/or inspected in accordance with current FAA regulations and is airworthy with respect to the work performed and is approved for return to service. Pertinent details are on file under the work order identified above.



4200 Summit Bridge Rd
Middletown, DE 19709
Tel 302-834-5400 Fax 302-378-7035

James Lewis
Summit Aviation, Inc.
SMTR2081 Airframe Class 3, Radio 1, 2, 3