

RAM AIRCRAFT  
**The Engine Specialist**  
FOR CESSNA, BEECHCRAFT, & CIRRUS AIRCRAFT



# AIRFRAME MAINTENANCE RECORDS



**Registration No.** N33PM N414JT  
**Serial No.** 414-0840 Book 1



## AIRFRAME MAINTENANCE RECORDS

Log No. \_\_\_\_\_

Aircraft Registration No. N 33PM

Model 414

Serial No. 414-0840

Waco Regional Airport • P.O. Box 5219 • Waco, Texas 76708  
Phone: (254) 752-8381 Fax: 254-752-3307  
[www.ramaircraft.com](http://www.ramaircraft.com)



10-22-1997 I certify that this AIRFRAME has been inspected in accordance with an ANNUAL / 100 hr inspection and determined to be airworthy. Refer to engine and propeller logs for engine and prop times

Replaced the following exhaust components with new:

- 2ea K9910295-14 RH stack left and right engine
- 2ea K9910295-13 LH stack left and right engine
- 4ea K5355108-4 Slip joints 2 ea left and right engine
- 2ea K9910299-3 Elbow slip joint to wye left and right engine
- 2ea K9910299-4 Elbow slip joint to wye left and right engine
- 1ea K9910299-1 Tail pipe left engine installation
- 1ea K9910299-2 Tail pipe right engine installation

All the above new parts supplied by KNISLEY WELDING  
CRS NJ3R712L

The following parts reworked and certified by KNISLEY WELDING CRS NJ3R712L

- 2ea K9910299-8 Wye header assembly
- 2ea K9910299-6 Wastegate overboard pipe
- 2ea K9910299-5 Wastegate elbow

Replaced the following engine controls with new RAM FAA PMA parts

- Left throttle cable p/n 1220-11
- Right throttle cable p/n 1220-12
- Left prop cable p/n 1220-15
- Right prop cable p/n 1220-16
- Left mixture cable p/n 1220-13
- Right mixture cable p/n 1220-14
- Left cowl flap cable p/n 1820-7
- Right cowl flap cable p/n 1820-7

All cables rigged I/A/W Cessna 414 service manual.

Replaced all engine hose assemblies with new

Replaced ship battery with new Gill G246 Cleaned battery box

Replace nose tire and tube with new Flight Custom 6.00-6

Replaced seals in left and right main gear struts and serviced I/A/W RAM instructions.

Replaced fuel quick drain in left main tank w/new

Replaced damaged rudder skin with new p/n 5133000-22

Replaced aft rudder spar p/n 5133000-20 Replaced rudder aft trailing edge p/n 5133000-23 Rebalanced rudder I/A/W Cessna 414 service manual.

Replaced B3-5-1 vac filters in wing roots

C/W FAR 91-207(d) ELT inspection no defects next due 10-1998  
ELT battery due 10-1999

C/W AD 75-23-08R5 Visual and pressure check of exhaust system clamps,springs,aft elbows,wye collector no defects next due 4835.1  
hobbs

Hobbs Reads: 4785.1

A/C TT: 4785.1

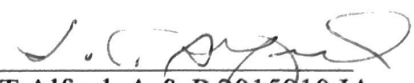
*J.C. Dejean*  
 JT Alfred A & P 2015910 IA



DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				<b>TOTALS</b> brought forward from previous page


12-17-1997 Installed Rosen products Cessna 400 series monorail visor system I/A/W STC SA2650NM. Refer to Form 337 this date.

Hobbs Reads : 4800.1

  
 J T Alfred A & P 2015910 IA

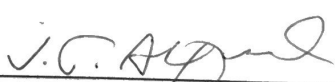
3-20-1998 C/W AD 75-23-08R5 Visual and pressure inspection of exhaust system, clamps, springs, aft elbows, collector wye no defects next due 4881.0 hobbs

Hobbs Reads : 4831.0  
 A/C TT: 4831.0

  
 J T Alfred A & P 2015910

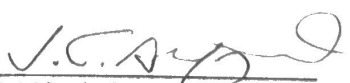
4-21-1998 Collins HSI 331A6R p/n 792-6356-003 repaired by Aerospace Instruments CRS Xi7R807J w.o. # 5542. Reinstalled and function checked satis. Pilot VSI converted to lighted bezel by Mid Continent Instruments CRS OL2D061L w.o. # 191851  
 Installed Terra by Trimble Radar Altimeter system TRA 3000/ TRI 40. All work done in accordance with Terra drawings and instruction. RA output coupled to rising runway on Collins. ADI. Refer to Form 337 this date for additional data. Weight and Balance and Equipment list revised Electrical load checked less than 80% continuous

Avtronics Inc  
 CRS AY3R388L

  
 J T Alfred Co- Inspector

6-09-1998 Replaced battery in Eventide Argus 7000 p/n 427012. Updated data base 103002-011-01

Avtronics Inc  
 CRS AY3R388L

  
 J T Alfred Co-Inspector

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DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME
11-17-1998			

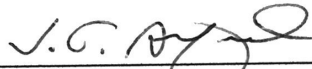
TOTALS brought forward from previous page

11-17-1998

I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy. All routine inspection and service items completed.

Replaced Vac filters in wing stubs with new B 3-5-1  
 Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions  
 Replaced battery in King KLN90B p/n 015-00251-0000  
 Replaced battery for Davtron 811 clock Replaced batteries in Hoskins fuel flow. Replaced wing locker fuel transfer pump p/n 4010-00-153 s/n 714 w/ overhauled pump. Pump overhauled by Duke OEM w.o. R32061. Removed O2 bottle for hydro test p/n 176088-11 s/n 339100/0263. Bottle checked and certified by Overland Aviation Services CRS OV7R830J w.o.# 100855  
 next due 9-2003  
 C/W FAR 91.207(d) ELT inspection no defects next due 11-1999  
 ELT battery replacement due 10-2001  
 C/W AD 75-23-085R Visual and pressure inspection of exhaust system, clamps, springs, aft elbows, wye collector no defects next due 4897.2 hobbs  
 C/W AD 78-13-05 Seat installation. All correctly installed

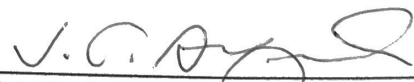
Hobbs Reads : 4847.2  
 A/C TT: 4847.2

  
 J T Alfred A & P 2015910 IA

5-10-1999

C/W AD 75-23-08R5 Visual and pressure inspection of exhaust system, clamps, springs, aft elbows, collector wye no defects next due 4975.3 hobbs

Hobbs Reads : 4925.3  
 A/C TT: 4925.3

  
 J T Alfred A&P 2015910

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DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				TOTALS brought forward from previous page

11-08-1999

I certify that this AIRFRAME has been inspected in accordance with an ANNUAL / 100 hr inspection and determined to be airworthy.

All routine inspection and service items completed.

Replaced vac filters in wing stubs with 2 new B 3-5-1

Replaced air inlet filters left and right engines with new p/n 128156-016-190 per RAM instructions.

Replaced Weldon electric boost pump p/n 8150 s/n 087542 with pump overhauled by Fleet Support Services CRS NE5D064N w.o. # 904133. Leak and function check satis.

C/W FAR 91-207(d) ELT inspection no defects next due 11-2000

ELT battery replacement due 10-2001

C/W AD 76-13-07 replaced 5/8 in. Fork bolts in left and right main gear with new bolts p/n 5141052-1 Re-rigged gear as necessary

Next due 9975.0 hours hobbs.

C/W AD 75-23-08 R5 Visual and pressure inspection of exhaust system clamps, springs, aft elbows wye collector no defects next due 5025.0 hobbs

C/W AD 78-13-05 Seat installation. All correctly installed.

Hobbs Reads: 4975.0

A/C TT : 4975.0

  
J T Alfred A&P 2015910 IA



Waco Regional Airport

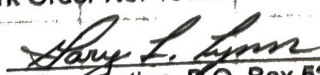
CESSNA 414-0840 N414JT

Airframe Total Time: \_\_\_\_\_

Hour Meter: 5002.4

Date: 3/20/00

On above referenced aircraft, installed RAM remanufactured engine s/n L-266554-R. See 337. Floscan fuel flow transducer installation c/w per STC SE5726SW. Slick pressurized magnetos p/n 6320 installed per STC SE4651SW. See 337. Installed red silicone impregnated fiberglass baffle material on engine. FAA-PMA replacement baffles. Negligible weight and balance change. Aircraft is airworthy and is approved for return to service for engine run-in procedures and modifications performed. Pertinent details on file under Work Order No. 4369.

  
RAM Aircraft Corporation, P.O. Box 5219, Waco, Texas 76708 CRS VA1R551K


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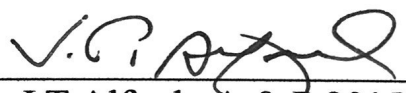


TIME IN ICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
			TOTALS brought forward from previous page

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I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy.  
 All routine inspection and service items completed.  
 Replaced Vac filters in wing stubs with new B 3-5-1  
 Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions  
 Replaced Autopilot Attitude Gyro p/n G519B-1 s/n C4960  
 Gyro overhauled by Mid Continent instruments CRS OL2D016L w.o. 2406110. Function check satis.  
 C/W FAR 91.207(d) ELT inspection no defects next due 12-2003  
 ELT battery replacement due 11-2003  
 C/W AD 78-13-05 Seat installation. All correctly installed  
 C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5151.2.0 hobbs plus 10% 5156.2 hobbs  
 ppg ( c ) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 12-2003  
 ppg ( e ) pressure test of exhaust system no defects next due 12-2003  
 ppg ( f ) no multi segment clamps installed

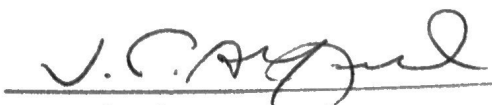
Hobbs Reads: 5101.2  
 A/C TT 5101.2



J T Alfred A & P 2015910 IA

5-01-2003 The following Avionics Equipment changes this date  
 Removed Bendix IN-152 Radar display and ART-161 R/T Unit.  
 Installed the following:  
 Per STC SA01105WI-D installed Bendix/King KMD 850 MFD  
 Installed Bendix/King ART 2100 Radar Transceiver  
 Both units installed in space provided by removed equipment.  
 All work performed I/A/W KMD installation manual 006-20016-0000  
 ART 2100 Installation manual 006-00648-0002  
 and AC 43:13 2A chapters 2 and 3  
 position provided to KMD 850 from existing King KLN 90B GPS  
 Revised weight & balance and equipment list .  
 electrical load checked less than 80 continuous  
 Refer form 337 this date for additional data and ICA's.

Avtronics Inc  
 CRS AY3R388L



J T Alfred Co-Inspector

Repairman 25375BS

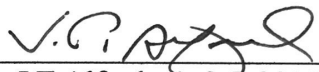
DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
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TOTALS brought forward from previous page

12-01-2002


I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy.  
 All routine inspection and service items completed.  
 Replaced Vac filters in wing stubs with new B 3-5-1  
 Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions  
 Replaced Autopilot Attitude Gyro p/n G519B-1 s/n C4960  
 Gyro overhauled by Mid Continent instruments CRS OL2D016L w.o. 2406110. Function check satis.  
 C/W FAR 91.207(d) ELT inspection no defects next due 12-2003  
 ELT battery replacement due 11-2003  
 C/W AD 78-13-05 Seat installation. All correctly installed  
 C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5151.2.0 hobbs plus 10% 5156.2 hobbs  
 ppg (c) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 12-2003  
 ppg (e) pressure test of exhaust system no defects next due 12-2003  
 ppg (f) no multi segment clamps installed

Hobbs Reads: 5101.2  
 A/C TT 5101.2

  
 J T Alfred A & P 2015910 IA

5-01-2003 The following Avionics Equipment changes this date  
 Removed Bendix IN-152 Radar display and ART-161 R/T Unit.  
 Installed the following:  
 Per STC SA01105WI-D installed Bendix/King KMD 850 MFD  
 Installed Bendix/King ART 2100 Radar Transceiver  
 Both units installed in space provided by removed equipment.  
 All work performed I/A/W KMD installation manual 006-20016-0000  
 ART 2100 Installation manual 006-00648-0002  
 and AC 43:13 2A chapters 2 and 3  
 position provided to KMD 850 from existing King KLN 90B GPS  
 Revised weight & balance and equipment list .  
 electrical load checked less than 80 continuous  
 Refer form 337 this date for additional data and ICA's.

Avtronics Inc  
 CRS AY3R388L

  
 J T Alfred Co-Inspector  
 Reparation 2537885


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DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				TOTALS brought forward from previous page
12-13-2003				<p>I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy.                      All routine inspection and service items completed.                      Replaced Vac filters in wing stubs with new B 3-5-1                      Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions                      Repaired intermittent de-ice light                      Replaced battery in ELS-10 ELT                      C/W FAR 91.207(d) ELT inspection no defects next due 12-2004                      ELT battery replacement due 11-2005                      C/W AD 78-13-05 Seat installation. All correctly installed                      C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5169.8 hobbs plus 10% 5174.8 hobbs                      ppg (c) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 12-2004                      ppg (e) pressure test of exhaust system no defects next due 12-2004                      ppg (f) no multi segment clamps installed</p> <p>Hobbs Reads: 5119.8                      A/C TT 5119.8</p> <p style="text-align: right;"><i>J.T. Alfred</i>                      _____                      J T Alfred A &amp; P 2015910 IA</p>
7-10-2004				<p>Installed King KT 73 Mode S transponder                      Unit installed in center avionics stack in space provided by previously removed ADF receiver. Second transponder antenna installed on right hand nose section at station 64.2                      Transponder interfaced with previously installed KMD 850 to supply TIS traffic.                      All work done I/A/W King KT-73 Mode S transponder installation manual 006-105300-0001 Rev 1 dated Feb 2003 and AC 43:13 2A chapters 2 and 3.                      Transponder system checked I/A/W Part 43 appendix F Satis.                      Revised weight &amp; balance &amp; equipment lists.                      Transponder power supplied thru 5 amp c b labeled Transponder 2                      Electrical load checked less than 80% continuous</p> <p>Avtronics Inc                      CRS AY3R388L</p> <p style="text-align: right;"><i>J.T. Alfred</i>                      _____                      J T Alfred Co-Inspector                      Repairman 2537585</p>
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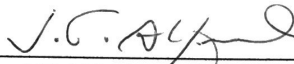
DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
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12-15-2004

I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy. All routine inspection and service items completed.

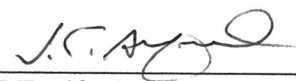
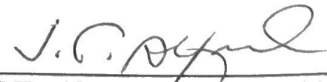
Replaced Vac filters in wing stubs with new B 3-5-1  
 Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions  
 Replaced left engine vac pump Pesco p/n 3p-207 s/n DG35531 overhauled by M-20 oil separator  
 CRS OX7R729X w.o. # 784 Function check satis.  
 Replaced Co-Pilot NDS 360 H S I p/n 52D137-1332 s/n 1-12001C with unit overhauled by Mid Continent instruments CRS OL2D061L w.o. 0038968 Function and slaving functions checked satis.  
 Replaced "O" ring onaux tank quick drains.  
 Replaced all fuel cap "O" rings with new MS29513-232  
 Replaced "O" rings in shimmy damped and serviced with MIL 5606 C/W FAR 91.207(d) ELT inspection no defects next due 12-2005  
 ELT battery replacement due 11-2005  
 C/W AD 78-13-05 Seat installation. All correctly installed  
 C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5179.0 hobbs plus 10% 5184.0 hobbs  
 ppg ( c ) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 12-2004  
 ppg ( e ) pressure test of exhaust system no defects next due 12-2004  
 ppg (f) no multi segment clamps installed

Hobbs Reads: 5129.0  
 A/C TT 5129.0

  
 J T Alfred A & P 2015910 IA

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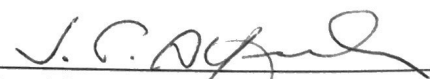
DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				<b>TOTALS</b> brought forward from previous page
11-15-2005				<p>I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy.                      All routine inspection and service items completed.                      Replaced Vac filters in wing stubs with new B 3-5-1                      Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions                      Replace battery in ELS-10 ELT                      C/W FAR 91.207(d) ELT inspection no defects next due 11-2006                      ELT battery replacement due 10-2007                      C/W AD 78-13-05 Seat installation. All correctly installed                      C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5190.0 hobbs plus 10% 5195.0 hobbs                      ppg (c) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 11-2005                      ppg (e) pressure test of exhaust system no defects next due 11-2005                      ppg (f) no multi segment clamps installed</p> <p>Hobbs Reads: 5140.0                      A/C TT        5140.0</p> <p style="text-align: right;"><i>J. T. Alfred</i>                      _____                      J T Alfred A &amp; P 2015910 IA</p>
7-13-2006				<p>C/W AD 2005-20-25 Replaced both Avionics circuit breakers with new 593-250-101 date stamp 0512. Function check satis.</p> <p>Hobbs Reads: 5150.1                      A/C TT        : 5150.1</p> <p style="text-align: right;"><i>J. T. Alfred</i>                      _____                      J T Alfred A &amp; P 2015910</p>
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DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				TOTALS brought forward from previous page
12-13-2006				<p>I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy.  All routine inspection and service items completed.  Replaced Vac filters in wing stubs with new B 3-5-1  Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions  C/W FAR 91.207(d) ELT inspection no defects next due 12-2007  ELT battery replacement due 10-2007  C/W AD 78-13-05 Seat installation. All correctly installed  C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5202.3 hobbs plus 10% 5207.3 hobbs  ppg ( c ) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 12-2006  ppg ( e ) pressure test of exhaust system no defects next due 12-2006  ppg (f) no multi segment clamps installed</p> <p>Hobbs Reads: 5152.2  A/C TT 5152.2</p> <p>  J T Alfred A &amp; P 2015910 IA</p>
12-20-2007				<p>I certify that this AIRFRAME has been inspected in accordance with an ANNUAL/100 hr inspection and determined to be airworthy.  All routine inspection and service items completed.  Replaced Vac filters in wing stubs with new B 3-5-1  Replaced air inlet filters in both left and right engine with new p/n P128156-016-190 per RAM instructions  Replaced ELS-10 ELT with new Kannad 406 model # 406AF compact. All work done in accordance with Kannad instructions and drawings. System function and self test satis.  C/W FAR 91.207(d) ELT inspection no defects next due 12-2008  ELT battery replacement due 12-2012  C/W AD 78-13-05 Seat installation. All correctly installed  C/W AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5207.4 hobbs plus 10% 5212.4 hobbs  ppg ( c ) removed and inspected tail pipes no defects. Inspected turbine wheel for freedom no defects next due 12-2008  ppg ( e ) pressure test of exhaust system no defects next due 12-2008  ppg (f) no multi segment clamps installed</p> <p>Hobbs Reads: 5157.4  A/C TT 5157.4</p> <p>  J T Alfred A &amp; P 2015910 IA</p>
				SUB-TOTALS this page
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1-20-2010 I certify that this AIRFRAME has been inspected in accordance with an ANNUAL /100hr inspection and determined to be airworthy. All routine maintenance inspection and servicing items completed. Replace both vac filters in stub wings with new B-3-5-1 Replaced both engine inlet air filters with new p/n P128156-016-190. O2 bottle p/n 176088-11 (C166001-0813) s/n 33910U/0263 removed for hydro test. Bottle and regulator overhauled by C & L Aero CRS LOJR785Y w.o. # 005161. Bottle re-installed serviced to 1800 psi and leak checked satis. Next due 11-2014 Removed both left and right propellers for overhaul. McCauley 3AF32C515 s/n 960509 and 960537. Propellers overhauled by Sullivan Propeller CRS S5UR963J w.o. # 7708 and 7709. See details in propeller logs. Re-installed leak check and feather check satisfactory. Replaced both Propeller De-ice brush assemblies p/n B40189. Replaced central vacuum filter w/ new AM 103451A next due 5682.9 hobbs. Removed all four magnetos for 500 hr inspection by Aircraft Electrical components CRS S7HR883J Refer to engine logs for details. Replaced battery in King KLN90B GPS w/ new p/n 015-00257-0000 Replace battery in Davtron 811 Clock and batteries in Hoskins Fuel Flow indicator. C/W FAR 91-207(d) ELT inspection no defects next due 1-2011 ELT battery replacement due 12-2012 C/W AD 78-13-05 Seat installation. All correct C/W AD 2000-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5232.9 hobbs plus 10% 5237.9 hobbs. ppg (c) removed and inspected tail pipes for inspection and checked turbine wheel for freedom no defects next due 1-2011 ppg (e) pressure test of exhaust system no defects next due 1-2011 ppg (f) no multi segment clamps installed.

Hobbs Reads: 5182.9  
A/C TT : 5182.9

  
JT Alfred A & P 2015910 IA



TOTALS—Carry forward to next page



7-17-2010

Replaced ELT with new Kannad 406 AF-Compact  
p/n S1840501-01 s/n 2620339-0336 identification  
number 264477.

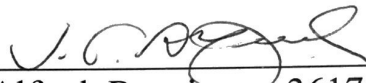
ELT installed tail cone in position of removed ELS-10  
Antenna installed in same position of existing  
ELT antenna on left hand aft fuselage.

ELT remote switch installed in center avionics panel  
Installation and interconnect wire done in accordance  
with Kannad supplied instructions and drawings. Function  
check satis. Revised weight and balance and equipment  
lists. Battery due date 4/2015.

Refer to Authorized Release Certificate in A/C records

Avtronics Inc CRS 3AXR823B  
w.o. # 2010- 178

Hobbs Reads: 5205.5  
A/C TT : 5205.5

  
J T Alfred Repairman 3617004  
co-inspector

DATE = 1-Nov-10\* N414JT \* W/O = 22899 \*

1. Altimeter and static system tests required by FAR 91.411 were performed and comply with FAR 43, Appendix E, on N414JT. Both Pilot and Co-Pilot Altimeters were tested to 30K feet.
2. ATC transponder tests required by FAR 91.413 were performed and comply with FAR 43, Appendix F, on Models KT-73 and TDR-950 with TR-220

Date 11/1/10 Insp. By Mark Colman  
DEPOT AVIONICS, INC. FAA # GM6R566N

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No. \_\_\_\_\_

DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				<b>TOTALS</b> brought forward from previous page

10-10-2014 The following Avionics equipment changes completed this date:

- Removed the following:
- Collins AMR-350 Audio / Marker Panel
  - Dual Collins VHF-251 Com Transceiver
  - Dual Collins VIR-351 Nav Receiver
  - Collins GLS-350 Glide Slope Receiver
  - Dual King KA-39 Voltage Converters
  - King KLN-90B GPS panel mount receiver
  - King KA-92 GPS Antenna
  - Collins TDR-950 Transponder

- Installed the following new equipment:
- King KMA-24 Audio / Marker Panel
  - Garmin GNS-530W WAAS GPS/COM/NAV/G/S System
  - Garmin GNS-430W WAAS GPS/COM/NAV/G/S System
  - Garmin GTX-330ES Transponder
  - Garmin GDL 88 Data Link
  - GA-35 WAAS GPS Antenna Dual
  - Honeywell Bendix/King KGP560 EGPWS
  - Honeywell Bendix/King KDR 610 XM Weather Receiver
  - Sandia SAC 7-35 Air Data Computer
  - Mid-Continent MD41-1498W GPS Annunciation Unit
  - Mid-Continent MD41-1208 EGPWS Annunciation Unit
  - King KA-60 L Band antenna for GDL88
  - Comat XM Antenna for XM weather

All work done in accordance with the following:

- King KMA 24 Audio panel installation manual 006-0180-00
- protected by 5 amp circuit breaker on avionics buss labeled "audio amp"
- protected by 5 amp circuit breaker on avionics buss labeled "speaker amp"

DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				<b>TOTALS</b> brought forward from previous page

10-10-2014 Avionics installation page 2 of 2

Garmin GNS 530W p/n 011-01064-40 s/n 78410066 and GA 35 WAAS antenna s/n 94991 installed per STC SA01933LA-02

Installed Mid-Continent Instruments MD41-1498W Annunicator for GNS 530W I/A/W MCI install manual 9016478 Rev D

See Form 337 this date for installation data and ICA's

Garmin GNS 430W p/n 011-01060-00 s/n 23436684 and GA 35 WAAS antenna s/n 98964 installed per STC SA01933LA-D

See Form 337 this date for installation data and ICA's

Garmin GTX330 ES transponder with ADS-B out p/n 011-00455-60 s/n 841464487 per STC SA01714WI

See Form 337 this date for installation data and ICA's

Garmin GDL 88 Data link and L-Band antenna p/n per STC SA02119SE

See Form 337 this date for installation data and ICA's

Honeywell Bendix King KGP EGPWS p/n 965-10611-0003 s/n EMKGA-07435 per STC 01105WI-D

Installed Mid-Continent Instruments MD41-1208 EGPWS Annunicator I/A/W MCI installation manual 9012220 Rec C

See Form 337 this date for installation data and ICA's

Honeywell Bendix King KDR 610 XM Weather Receiver and XM Antenna per STC 01105WI-D


See Form 337 this date for installation data and ICA's

Sandia SAC 7-35 Airdata computer. Installation manual p/n 305586-00

AC 43.13-2B Chapters 2 and 3

Electrical load checked less than 80% continuous  
Revised weight and balance and equipment lists

Avtronics Inc CRS 3AXR823B  
w. o. C2014-138

  
\_\_\_\_\_  
J T Alfred  
Co-Inspector  
Repairman 3617004


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2-10-21015

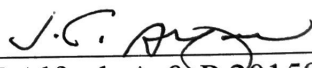
I certify that this AIRFRAME has been inspected in accordance with an ANNUAL / 100 hr inspection and determined to be airworthy  
 All routine maintenance inspection and service items completed  
 Replaced both vac filters in stub wings with new B-3-5-1  
 Replaced both engine inlet filters with new p/n P128156-016-190  
 Replaced both engine breather air/oil filters p/n 201957-07  
 C/W FAR 91-207 (d) ELT inspection no defects next due 2-2016  
 ELT battery replacement due 04-2015  
 C/W AD 78-13-05 Seat installation All correct  
 C/W AD 2000-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5342.2 hobbs plus 10% 5347.2 hobbs.  
 ppg (c) removed and inspected tail pipes for inspection no defects checked turbine wheel for freedom no defects next due 2-2016  
 ppg (e) pressure test of exhaust system no defects next due 2-2016  
 ppg (f) no multi segment clamps installed

Hobbs Reads: 5292.2  
 A/C TT : 5292.2

  
 J T Alfred  
 A & P 2015910 IA

4-02-2015 Replaced Kannad ELT battery with new. Next due 2-2021  
 C/W FAR 91.207 (d) no defects

Hobbs Reads: 5294.4

  
 J T Alfred A & P-2015910

7-12-2015 Replaced ship battery with new Gill G-246.

Hobbs Reads 5296.6


  
 J T Alfred A & P 2015910

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TOTALS—Carry forward to next page

3-24-2016 I certify that this AIRFRAME has been inspected in accordance with an ANNUAL / 100 hr inspection and determined to be airworthy.  
 All routine maintenance and service items completed.  
 Replaced both vac filters in stub wings with new B3-5-1  
 Replaced both engine air inlet filters with new p/n P128156-016-190  
 c/w FAR 91:207(d) ELT inspection no defects. Next due 3-2017  
 ELT battery replacement due 2-2021  
 c/w 78-13-05 Seat installation all checked correctly installed  
 c/w AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5363.6 hobbs plus 10% 5368.6 hobbs  
 ppg (c) removed and inspected tail pipes no defects, checked turbine wheel for freedom no defects next due 3-2017  
 ppg (e) pressure test of exhaust system no defects next due 3-2017  
 ppf (f) no multi segment clamps installed

Hobbs reads: 5313.6  
 A/C TT : 5313.6

  
 J. T Alfred A&P(2015)10 IA

7-11-2016 I certify that this AIRFRAME has been inspected in accordance with a 50 hr inspection and determined to be airworthy.  
 C/w AD 2001-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5386.8 plus 10% 5391.8 hobbs

Hobbs Reads: 5336.8  
 A/C TT 5336.8

  
 J T Alfred A&P(2015)910

10-6-16	Ship Battery failed to hold charge		
	Replaced with new GILL 6246		
	HOBBS 5345.0		J. T. Alfred
			A&P 2015910

10-6-16	Replaced RIGHT main fuel w/ FLIGHT CUSTOMER III		
	6:50-10		
	HOBBS 5345.0		J. T. Alfred
			A&P 2015910

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DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				TOTALS brought forward from previous page
10-24-2016		#1 GARMIN GTX330ES		# 2 KING KT73
		The ATC Transponder Tests I/A/W Part 43 Appendix F as required by 91.413 Avtronics W.O. # C2016-282		The ATC Transponder Tests I/A/W Part 43 Appendix F as required by 91.413 Avtronics W.O. # C2016-282
		<u>J.C. Alfred</u> Sig <u>3617004</u> #		<u>J.C. Alfred</u> Sig <u>3617004</u> #
		Avtronics, Inc. FAA CRS# 3AXR823B		Avtronics, Inc. FAA CRS# 3AXR823B
		PILOT EA801 S/N 578		CO PILOT UNITED 5934PA 3 S/N 42490
		The Altimeter, Encoder, and Pitot / Static Systems Test I/A/W Part 43 Appendix E as required by 91.411. Altimeter certified to <u>C2016-282</u> feet. Avtronics W.O. # <u>3617000</u>		The Altimeter, Encoder, and Pitot / Static Systems Test I/A/W Part 43 Appendix E as required by 91.411. Altimeter certified to <u>C2016-282</u> feet. Avtronics W.O. # <u>certified to 35,000</u>
		<u>J.C. Alfred</u> Sig <u>3617004</u> #		<u>J.C. Alfred</u> Sig <u>3617004</u> #
		Avtronics, Inc. FAA CRS# 3AXR823B		Avtronics, Inc. FAA CRS# 3AXR823B
		11-15-2016 Replaced Vertical Gyro Collins 332D-11 p/n 522-3985-001 with overhauled unit Gyro overhauled by Mid Continent Instruments FAA CRS OL2R061L w/o 000254187. Refer to form 8130-3 in aircraft file. Function check satis.		
		Avtronics Inc CRS 3AXR823B		
		Hobbs Reads: 5355.7		<u>J.C. Alfred</u> J T Alfred Repairman 3617004 Co-Inspector
		12-09-2016 C/W AD 2016-17-08 ppg (f)(1) Installation of new hardware per Cessna MEB 27-02. Visual inspection per ppg (f) (2) due at hobbs 5473.7 or 12-2017, whichever first. Per (f)(3) New hardware required anytime hardware is removed for any reason. Refer to AD text for details		
		Hobbs Reads: 5363.7		<u>J.C. Alfred</u> J T Alfred A&P 2015910
12-09-2016		Replaced R Nav light w/ new bulb A7512-24 function check satis		<u>J.C. Alfred</u> A&P 2015910
		HOBBS 5363.7		
				SUB-TOTALS this page
				TOTALS—Carry forward to next page

January 27, 2017

Re-installed pilot side Flight Director Indicator Collins p/n 622-0836-003  
 s/n 2020. Unit repaired by DFW Instruments CRS DZMR112L w.o. # DF43600  
 Refer to form 8130-3 in aircraft records. Function checked all modes satisfactory.

Re-installed pilot side encoding altimeter EA-801 p/n 43300-61288 s/n 3499  
 Unit repaired and re-certified by DFW instruments CRS DZMR122L w.o. DF43588  
 Refer to form 8130 in aircraft records.  
 Leak checked pilot side static system satisfactory C/W FAR 91:411.

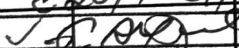
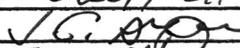
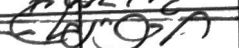

Recertified Co-pilot co-pilot altimeter United 5934PA-3 s/n 424910 to 35,000 feet.  
 Leak checked co-pilot static system satisfactory C/W FAR 91:411

Hobbs Reads: 5365.1

Avtronics Inc.  
 FAA CRS 3AXR823B

  
 J. T. Alfred Repairman 3617004 Co-Inspector

w.o. C2017-011

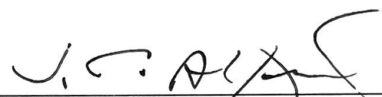
1-27-2017		
The Altimeter, Encoder, and Pitot / Static Systems Test I/A/W Part 43 Appendix E as required by 91.411. Altimeter certified to <u>35000</u> feet. Avtronics W.O. # <u>C2017-011</u>  # <u>3617004</u>		The Altimeter, Encoder, and Pitot / Static Systems Test I/A/W Part 43 Appendix E as required by 91.411. Altimeter certified to <u>35000</u> feet. Avtronics W.O. # <u>C2017-011</u>  # <u>3617004</u>
Avtronics, Inc. FAA CRS# 3AXR823B XPRND # 1 GARMIN 67390 ES 330 ES JN		Avtronics, Inc. FAA CRS# 3AXR823B XPRND # 2 KT73
The ATC Transponder Tests I/A/W Part 43 Appendix F as required by 91.413 Avtronics W.O. # <u>C2017-011</u>  # <u>3617004</u>		The ATC Transponder Tests I/A/W Part 43 Appendix F as required by 91.413 Avtronics W.O. # <u>C2017-011</u>  # <u>3617004</u>
		Avtronics, Inc. FAA CRS# 3AXR823B
		SUB-TOTALS this page  TOTALS—Carry forward to next page

DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
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**TOTALS** brought forward from previous page

May 1, 2017 I certify that this Airframe has been inspected in accordance with an ANNUAL / 100 hr inspection and determined to be airworthy.  
 All routine maintenance and service items completed.  
 Replaced both vac filters in stub wings with new B3-5-1  
 Replaced both engine air inlet filters with new p/n 128156-016-190  
 c/w FAR 91:207(d) ELT inspection no defects next due 5-2018  
 ELT Battery replacement due 2-2021  
 c/w AD 78-13-05 Seat installation all seats correctly installed  
 c/w AD 2000-01-16 ppg (b) visual inspection of entire exhaust system  
 no defects next due 5425.4 hobbs or plus 10% at 5430.4 hobbs.  
 ppg (c) remove and inspect tail pipes no defects, checked turbine  
 wheel for freedom no defects. Next due 5-2018.  
 ppg (e) pressure check of exhaust system no defects next due 5-2018  
 ppg (f) no multi segment clamps installed

Hobbs Reads: 5375.4  
 A/C Total time 5375.4

  
 J. T. Alfred A&P 2015910 IA

12-10-2017

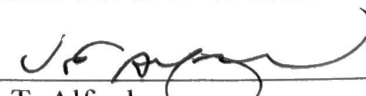
Per AD 2016-17-08 visual inspection of hardware per MEB 27-02  
 next due 12-2019 or 5507.4 hobbs Replaced nose tire with new  
 Flight Custom III 6.00-6

Hobbs Reads 5397.4

  
 J. T. Alfred A&P 2015910

06-01-1017

Per AD 2007-06-03 Heater hobbs reads 184.6 time since Overhaul 138.3  
 no heater operation last 30 days. Inspection due at 194.6 heater hobbs.

  
 J. T. Alfred

**SUB-TOTALS** this page

**TOTALS**—Carry forward to next page

DATE

TOTAL TIME IN SERVICE

TOTAL TIME SINCE OVERHAUL

TACH OR RECORDING METER TIME

DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK

TOTALS brought forward from previous page

May 3, 2018 I certify that this AIRFRAME has been inspected in accordance with an ANNUAL / 100 hr inspection and determined to be airworthy. All routine maintenance, inspection and service items completed. Replaced both vac filters in stub wing with new B3-5-1 Replaced both engine air inlet filters with new p/n 128156-016-190 Replaced outboard static wick on left elevator with new part Replaced left main tire and tube with new Flight custom III Replaced the following brake parts: Left brake disc Cleveland 164-20306, New Brake Assembly p/n 30-100 Cessna p/n 9910393-3 complete with all new linings, seals and parts. Flexible brake hose assembly from brake caliper to airframe with new hose 303-4. Right brake disc Rapco PMA'ed p/n RA164-20306 New Brake Assembly p/n 30-100 Cessna p/n 9910393-3 complete with all new linings, seals and parts. Flexible brake hose assembly from brake caliper to airframe with new hose 303-4. Bleed brake system function checked and conditioned new lining per Cleveland Technician's Service guide AWBTSG0001-7 c/w FAR 91.207 d ELT inspection no defects next due 5-2019 ELT battery replacement due 2-2021 c/w AD 78-13-05 Seat installation all checked correctly installed c/w AD 2000-01-16 ppg (b) visual inspection of entire exhaust system no defects next due 5464.0 hobbs or plus 10% at 5469.0 hobbs. ppg (c) removed and inspected tail pipes no defects, checked turbine wheel for freedom no defects next due 5-2019 ppg (e) pressure check of exhaust system no defects next due 5-2019 ppg (f) no multi segment clamps installed c/w AD 2016-17-08 visual inspection of elevator trim hardware per MEB 27-02 next due 5-2019 or 5524 hobbs. c/w AD2007-06-03 Meggitt Southwind heater p/n 8472 Cessna p/n 9910088 s/n 1035. Accomplished inspection items (g) 1 through 4 no defects. Heater hobbs reads 185.0 next due 435 heater hobbs or 5-2020 Note heater times since overhaul 138.7 hours

Hobbs Reads: 5414.0  
 Aircraft TT : 5414.0

  
 J. T. Alfred A&P 2015910 IA

DATE	TOTAL TIME IN SERVICE	TOTAL TIME SINCE OVERHAUL	TACH OR RECORDING METER TIME	DESCRIPTION OF WORK PERFORMED— SIGNATURE & CERTIFICATION NO. OF PERSON PERFORMING WORK
				TOTALS brought forward from previous page

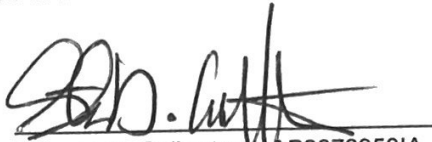
**STEVE'S AIRCRAFT**  
4695 Highland Springs Road  
Lakeport, Ca. 95453

Reg: N414JT  
Date: 09/26/2018

Make/Model: Cessna 414  
Page 1 of 1

S/N: 414-0840  
Hobbs: 5437.6

- 1) Remove and install new right windshield #5111604-202 in accordance with Cessna Service Manual D778-30-13 page 3-213.

  
Steven D. Culbertson AP20739581A

September 20, 2018

Both left and right alternators overhauled by Aircraft electrical components FAA CRS S7HR883J. w.o. # 37354 and 37355  
See aircraft records for Forms 8130-3 and Lamar shipper  
Replaces both left and right voltage regulators with new LAMAR PMA ed p/n 286 -1 s/n left 80R17711 s/n right 80R17712  
Alternators balanced in accordance with LAMAR adjustment procedures A-00310  
c/w AD 2016-17-08 Visual inspection of hardware per MEB 27-02 next due 9-2020 or 5551.4 hobbs.  
c/w AD 2000-01-16 ppg (b) visual inspection of entire exhaust system next due 5491.4 hobbs or plus 10% 5501.4 hobbs.

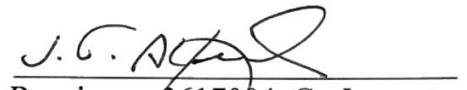
Hobbs Reads: 5441.4

  
J. T. Alfred A & P 2015910

December 17, 2018

Replaced Garmin GDL 88 Sub assembly, back plate and Fan. To correct fan fault message. Function check entire system. No fault codes. System operation normal.

Avtronics Inc.  
FAA CRS 3AXR823B  
w.o. 2018-510

  
Repairman 3617004 Co-Inspector

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