



**March 21, 2010**

**To: Kristie Dunks  
NTSB**

**From: Greg Woodruff  
Auburn Flight Service**

**Kristie,**

**Per your request enclosed is the Work Order for the February, 2010 Annual Inspection and maintenance done on N224GS.**

**On a work order for an annual inspection our policy is to stamp the work order with a signature of the AI or myself, indicating the aircraft approval for return to service. Note that the work order for N224GS has such stamp.**

**The AI, James Bartley, who signed off the aircraft for return to service remembers typing the endorsement for the aircraft return to service on a self adhesive sticker.**

**Note that Jim is no longer an employee of Auburn Flight Service as he voluntarily terminated with the Company due to another opportunity.**

**Please contact me if I may be of further assistance in the investigation.**

A handwritten signature in black ink, which appears to be 'G. Woodruff', is written over a thick black horizontal redaction bar.

**AUBURN FLIGHT SERVICE**

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Auburn Flight Service  
1725 E Street NE  
Auburn, WA 98002

Feb.  
Year 2009

CUSTOMER INFORMATION	
NAME:	
ADDRESS:	
PHONE:	

WORK ORDER 7631
N #: 22463
DATE: 1-8-10
TACH: 677.4
Hobbs

AIRCRAFT INFORMATION	
MAKE/MODEL: Cessna/510-22	S/N: 1326
TOTAL TIME: 677.4	
ENGINE INFORMATION	
MAKE/MODEL: Tecumseh/550-N	S/N: 917609
TOTAL TIME: 677.4	TSMOH:
PROP INFORMATION	
MAKE/MODEL: McCulloch/40-531F	HUB S/N: FP350013
TOTAL TIME: 677.4	TSMOH:
ANNUAL DUE: Oct. 2009	
ALT/STATIC DUE: Mar. 2009	
TRANSPONDER DUE: Mar. 2009	
ELT BATT DUE: Mar. 2009 / Mar. 2016 or on condition	
TIME FLOWN SINCE LAST 100HR (ANNUAL): 96.1	

ACCESSORIES		
MAGNETOES		
LEFT - MODEL:	P/N:	S/N:
RIGHT - MODEL:	P/N:	
CARBURETOR / MODEL:	<p><b>NOTIFY THAT THIS AIR/ENG PROP HAS BEEN INSPECTED IN ACCORDANCE WITH FAA ANNUAL 100-HOUR INSPECTION AND WAS DETERMINED TO BE IN AN AIRWORTHY CONDITION.</b></p> <p>DATE 2-5-10</p> <p>SIGNATURE: [Redacted]</p>	
STARTER MAKE / MODEL:		
ALTERNATOR MAKE / MODEL:	P/N:	S/N:
VAC PUMP MAKE / MODEL:	P/N:	S/N:

#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITIALS
#1	Annual Due	#1-70 #2-64 #3-66 #4-70 #5-70 #6-69			2-5	GW
#2	AD & SB search Done	AD's checked thru 2009-26 2010-03 SB's checked thru 1-8-2010 2-5-10 (GW)			1-8	JFB

#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
3	EIT Check done IAW FAR 91.207 (d)	Complied with EIT check IAW FAR 91.207(d) ops good, next due Jan. 2011.			1-8	JTB
4	Annually LH HWR cool appears to have bit of strier	Paint repair - New Insing -				Car
5	#6 possible crack cyl. between injector port to top plug	Confirmed cracked JTB 1-7 Removed #6 cylinder. Removed prop governor to Excite state maint. cleaned and inspected piston and found OK for continued service. Replaced piston pin PN 630046 and Ring set PN 654716. checked ring gap & side clearance per TEM 10550 mm section 15. Installed cylinder PN 655932A3 SN AC09GA906 per TEM mm section 18. Reinstalled prop governor with new gasket PN MS9144-01. Cylinder (MS9144-01 gasket) installed with new gasket set PN 646565A1.			2/2	JTB
6	#3 possible crack cyl. between injector port to top plug	Confirmed cracked JTB 1-7 Removed #3 cylinder. cleaned & inspected piston and found OK for continued service. Replaced piston pin PN 630046 and Ring set PN 654716. Installed new cylinder PN 655932A3 SN AC09GA816 with new gasket Kit P.N 646565A1. checked rings gap & clearance per TEM mm section 15 and installed piston & cylinder per TEM mm section 18.			2/2	JTB
7	#5 possible crack cyl. between injector port to top plug	Confirmed cracked JTB 1-7 Removed #5 cylinder. removed and inspected piston & found OK for continued service. Installed piston with new piston pin PN 630046 and Ring set PN 654716. checked gaps & side clearance of rings per TEM mm sect 15. Installed new cylinder PN 655932A3 SN AC09GA950 per TEM mm section 18.			2/2	JTB

#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
8	AD 09-26-01 Anti-ice fluid distribution line Compression fittings.	N/A by SW				
9	AD 09-16-03 Superior investment cylinders	N/A by manufacturer.				
10	AD 09-19-07 EQ3 cylinders head assys.	N/A by model.				
11	AD 09-24-02 Hydraulic valve filters	N/A, engine manufactured before June 19 <sup>th</sup> 2009.				
12	#2 batteries due Mar. 2009  (4RS)	Removed #2 Battery Assembly. Removed old batteries and installed two new PN 50979-001. All work performed as outlined in the Cirrus MAM CMT 24-30. Next Due <u>JAN. 2012</u>  50979-001 (2) (Part) Part 101964 Part DATE 09/10/2009			1/14	JPB

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#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
13	FAIR 91.411 3 413 over due.  (yes)	performed work with A 7643.			1-18	Law 13
14	SB 2X-05-01 overhaul & replacement Schedule Brakes easy O-rings (optional)	Complied with Cirrus SB 2X-05-01 by installing kit # 70227-002, 3 installed, 4 each new 101-34500 o-rings, 3. Installed brakes onto acft, torqued hardware & bled brakes, ops normal.			1-13	STD 14
15	SB 2X-27-16 Flap Act. Mod. (Recommended)  (yes)	Ordered 2-2-10 No parts available  70231-001 <sup>Q</sup>				Law 15
16	SB 2X-32-19R1 N/G Assy insp. & reinforcement	No parts available				Law 16
17	PFD screen flashes on/off Horiz hold. line rolls thru, Fuzzy background	Unable to verify discrepancy. Dealer will fly & report.			1-14	Law 17

#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
18	stylus pen between armrest & pilots seat	Inspected pilots seat area, found pink nintendo DS stylus looking pen.			1-13	JTB
19	EKT Batteries due for replacement (D-cells)	Replaced EKT batteries with 8 each new MN1300 D-cell batteries. Next due March 15 2016 or on condition.			1-8	JTB
20	Induction air filter due 50% BA-24	Installed 1 each new BA-24 filter			1-13	JTB
21	Ice Protection System Filter due yes	Drained TKS reservoir to facilitate filter replacement. Removed Filter, and <sup>product</sup> <del>removed</del> inducance. Attached mount, replaced 2ea 15164-092 and installed 26115-101 filter. Serviced system with drained TKS Fluid and Topped TKS Tank with 1 qt. of Fluid. * Needs Leak check * <del>K9</del> <sup>JTB</sup> Leak good. 26115-101 Filter / 15164-092 seals NEXT DUE JAN 2012			2/2	JTB
22	Ice Protection in-line Strainer due	N/A per installation			1-14	Can

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#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
23	Prop log missing	Noted				GW 23
24	Fuel injectors see for cleaning (657.3 Hobbs)	Removed injectors for cleaning, soaking, and cleaned all injectors, installed all except for #3, #5 & #6. See item #'s 5, 6 & 7. Torqued injectors.  K1473 <sup>Ⓢ</sup> /640612 <sup>Ⓢ</sup> /AECU30919-9 <sup>Ⓢ</sup>			1-13	JH 24
25	All prop blade leading edges have small nicks	dressed several small nicks on leading edges of prop blades.			1-13	JH 25
26	several well nuts on LH & RH M/G upper fairing need replaced	Installed 2 each 50803-001 wellnuts on LH M/G upper fairing. Installed 1 each 50803-001 & 1 each 50802-001 wellnuts on RH M/G upper fairing.			1-13	JH 26
27	RH Fuel strainer leaking sump  yes	Removed leaking drain valve and installed new PIN 50141-001 drain valve and safetied as required.  50141-001 <sup>Ⓢ</sup>			1/15	JH 27

#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INIT'S
28	LH MLG Brake missing heat sticker	chk by complying with cirrus s/B 2X-05-01 see item # 14			1-13	JTB
29	LH MLG tire worn to limits	Replaced LH MLG tire with new 15600X6 tire & new 15600X6 tube. Retorqued wheel bolts. Reinstalled onto acct, torqued & safetied axle nut.			1-12	JTB
30	Both LH MLG strut fairing brackets cracked as marked	(UES) Replaced lower bracket PN 17205-001. Removed & replaced wheel to facilitate maint. 1/14 JTB Replaced upper bracket PN 13522-001 and installed existing rubber protector. 13522-001 / 13524-001			1/29	JTB
31	MCU external power receptacle bent	During MCU internal inspection, inspected external power receptacle, no defects noted. Straightened bent sheet metal, spot drilled both small cracks. Upon reinstallation of MCU cover resealed over <del>the</del> repaired damage. O.K. for continued service.			1-17	JTB
32	Defrost knob loose on shaft.	Tightened knob nut, ops normal.			1-13	JTB

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#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
33	Pilots door latch cable needs adjustment.	Adjusted Pilots door latch (upper) & replaced latch. 50834-014 screw. Ops normal.  50834-014 <sup>screw</sup> Ⓟ			1-13	JFB
34	Right main tire needs replaced. Flat spot	Replaced RH M/G tire with new 15-600X6 tire & 15-6.00X6 tube. Torqued wheel bolts. Reinstalled on to acct, torqued & safetied axle nut.			1-12	JFB
35	Left elevator center hinge has play	Replaced Left & Right center elevator hinge pin PN 11621-002 - Safetied & required.  11621-002 <sup>Ⓟ</sup>			1/19	JFB
36	Left aileron has 'clunk' when moved down.	Inspected LH aileron clunk, found to be aileron arm bearing. Lubed & tightened bearing. Ops normal. Reinstalled aileron, torqued & safetied.			1-13	JFB
37	Eng cowling #6 strut cover torn	Replaced latch 20660-004 FWD N/G-Upper seal on LWR cowling. Ops normal.			2-2	JFB

#	DISCREPANCY	CORRECTION	TIME	TACH	DATE	INITS
	Right lower Cowl missing lower strip of seal	Cleaned surface and installed new 2ft strip of rubber seal. Glued all other loose seal in place.  50700-0630 / 1ft rubber seal			1/25	AP
	perform qnd run & leak check check by one spec per Tem mm Table 19-1/tem sb	Installed meters for qnd run. 2/2 JB Found RPM @ 2710. Adjusted Down to 2670 RPM. RPM 2670 Fuel/gls per hr 27.3 MAP 29.1 All values within limits per metered 21.0 Tem of manual Table 19-1 Unmetered 30.5 MSG-21R			2/3	JB
	During Qnd Runs L/R msg drops rough	Found #5 #3 & #6 oil soaked with buildup oil. Removed, cleaned, Tested & Reinstalled #5, #3 & #6 plugs. Next qnd run found #5 upper & lower plugs still wet. Removed, cleaned & Tested plugs. Reinstalled #5 upper & lower plug. Grand Ann msg Drop smooth @ 40 RPM Drop			2/3	JB

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