

CEN23MA034

# AIRWORTHINESS

Group Chair's Factual Report - Attachment 2

P-63F Maintenance Records

July 12, 2023

# CAF AIRCRAFT FLIGHT LOG FORM 100

MAKE AND MODEL		MONTH / YEAR		PAGE	UNIT/SPONSOR GROUP		REGISTRATIONS AND SERIAL #			
BELL - P-63F					P-63 SPONSOR GROUP		N6763			
DATE OF FLIGHT	FROM	TO	PILOT'S LAST NAME/COL# (1 LINE PER PILOT)	PURPOSE OF FLIGHT	CREW POSITION	DURATION	AIRCRAFT TOTAL TIME	HOBBS TIME	# OF LNDS	MCRP EXEMPT
						HRS/TENTHS				
10/8/2021	BFD	BFD	HUTAIN	PHOTO	PIC	0.7	206.7	206.4	1	✓
10/9	BFD	BFD	TODD	A/S	PIC	0.2		206.3	1	
10/10	BFD	BFD	TODD	A/S	PIC	0.2		206.5	1	
10/10	BFD	BFD	HUTAIN	A/S	PIC	0.3		206.8	1	
10/15	CRS	CRS	HUTAIN	A/S	PIC	0.6		207.4	1	✓
10/16	CRS	RBD	HUTAIN	A/S	PIC	0.6		208.0	2	✓
10/23	RBD	RBD	TODD	PRACTICE	PIC	1.0		209.0	1	
10/28/21	RBD	RBD	HUTAIN	A/S	PIC	0.5		209.5		
10/29/21	↓	↓	↓	A/S	PIC	0.3		209.8		
10/30/21	↓	↓	↓	↓	↓	0.8		210.0	2	
10/31/21	RBD	RBD	↓	↓	↓	0.8		211.0	2	
11/19/21	RBD	CRS	HUTAIN	P-2-P	PIC	0.8		211.8	1	
2/28/22	CRS	LVS	HUTAIN	WX	PIC	0.3		212.1	1	
3/24/22	LVS	CRS	HUTAIN	WX	PIC	0.2		212.3	2	
3/20/22	CRS	CRS	HUTAIN	PRACTICE	PIC	0.7		212.3	1	
4/21/22	CRS	KRND	HUTAIN	AIRSHOW	PIC	1.2		212.3	1	

MCRP EXEMPTIONS: 1=1.5 hr pilot 2 = 30 min maintenance 3 = HQ mission 4 = 35 hr post restoration 6 = member appreciation day  
 7 = TRARON tng 8 = 1.5 hr non-pilot sponsor

# CAF AIRCRAFT FLIGHT LOG FORM 100

MAKE AND MODEL BELL - P-63F		MONTH / YEAR		PAGE	UNIT/SPONSOR GROUP P-63 SPONSOR GROUP		REGISTRATIONS AND SERIAL #	
DATE OF FLIGHT	FROM	TO	PILOT'S LAST NAME/COL# (1 LINE PER PILOT)	PURPOSE OF FLIGHT	CREW POSITION	DURATION		MCRP EXEMPTION
						HRS/TENTHS		
4/24/22	SKF	CXO	HUTCHINSON	Airstart	PIC	1.0		
4/28/22	CXO	IWS	HUTCHINSON	Wing Sup	PIC	0.5		
5/3/22	IWS	CXO	HUTCHINSON	P-2P	PIC	0.5		
6/9/22	CXO	IWS CXO	HUTCHINSON	Airstart	PIC	0.7		
7/21/22	CXO	FCM	HUTCHINSON	Airstart	PIC	4.3		
7/22/22	FCM	FCM	HUTCHINSON	Photo/Airstart	PIC	0.7		
7/23/22	FCM	FCM	HUTCHINSON	Airstart	PIC	0.3		
7/24/22	FCM	OSH	HUTCHINSON	Airstart/P2P	PIC	1.8		
8/1/22	OSH	CXO	HUTCHINSON	P-2-P	PIC	4.3		
8/12/22	CXO	GLS	HUTCHINSON	Airstart	PIC	0.8		
8/13	GLS	CXO	HUTCHINSON	Airstart	PIC	0.8		
10/27	CXO	BFD	HUTCHINSON	Airstart	PIC	0.5		
10/29	BFD	BFD	TODD / 36396	Airstart	PIC	0.5		
10/30	BFD	CXO	HUTCHINSON	Airstart	PIC	1.0		
10/31	CXO	RBD	HUTCHINSON	Airstart	PIC	0.8		

MCRP EXEMPTIONS: 1=1.5 hr pilot 2 = 30 min maintenance 3 = HQ mission 4 = 35 hr post restoration 6 = member appreciation day  
 7 = TRARON tng 8 = 1.5 hr non-pilot sponsor

MONTH/YE

Date: April 15, 2016

A/C Total Time: 1,039.9

SERIAL NO.

REGISTRATION NO.

UNIT

PAGE NO.

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763

Hobbs Time: 40.6

A/C Serial Number: 1296E1-1R

NO

X

After a gear up landing the aircraft was dismantled for transportation to Pearland Texas. The engine, gearbox and drive shafts were shipped to J. D. Yancey Enterprises in California for teardown and inspection. The propeller was shipped to San Antonio Propeller shop for new blades and overhaul. See related paperwork.

Repaired and/or replaced various damaged airframe belly panels, landing gear doors, and flaps. Removed the main landing gear and inspected for damage. NDT'd the worm drive, main gear and gear housing for cracks. Reinstalled the main landing gear. Inspected and adjusted the landing gear linkage and torque tubes. Dismantled and inspected the landing gear main gear box and motor. Adjusted the landing gear limited switches to ensure correct operation of the landing gear in accordance with the P-63 erection manual. Performed numerous gear retractions tests.

Reinstalled the wings, horizontal and vertical stabilizers, elevators and rudder. Installed wing and empennage fillets and inspection panels. Ensured the correct operation of the elevators, rudder and ailerons and trim tabs in accordance with the P-63 erection manual.

Inspected the fuel system and adjusted the linkage between the fuel selector and the fuel valve. Tested the fuel systems accordance with the P-63 erection manual.

Installed 2 new radiators built by Pacific Oil Coolers, CA. Refer work order 113106/7 and FAA Forms 8130-3 dated April 1, 2016. Connected all hoses in accordance with the erection manual. Filled coolant system with 11 gallons of Prestone and 2 gallon of distilled water. Checked for leaks.

Sent cracked oil tank to Loree Air, Inc. in CA for repair. See related work order and FAA Form 8130-3 dated April 11, 2016. Reinstalled oil tank and connected all hoses and temperature probe.

Opened all panels, inspected and lubed cables, pulleys, bellcranks and hinge points. Checked navigation, beacon and landing lights. Installed new battery. Adjusted and serviced the brake system. Checked flaps, oil door and radiator doors for proper operation. Packed wheel bearing and greased all grease fittings. Replaced ELT batteries and checked ELT for operation in accordance with FAR 91.207(d). Checked all relevant AD's through March 2016.

I certify that this aircraft has been inspected on April 15, 2016 in accordance with the scope and detail of the Bell P-63 Inspection, Maintenance and Erection guidelines and found to be in a condition for safe operation.

CAF Form

AZP

JA

no.

Date: March 1, 2017

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763

MONT A/C Total Time: 1,091.7

Hobbs Time: 92.4

A/C Serial Number: 1296E1-1R

Removed all panels and opened all inspection plates. Cleaned and re-packed wheel bearings, installed new tires and checked tire pressure. Adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gear housing and performed landing gear retraction test. Filled landing gear gearbox with oil. Greased all zerts and lubricated all torque tubes and flight control bellcracks and hinge points. Inspected flight control systems. Ensured the correct operation of the elevators, rudder and ailerons and trim tabs. Inspected and tested the fuel system. Checked flaps, oil door and radiator doors for proper operation. Checked level of coolant. Checks navigation, beacon and landing lights. AD's checked through 04-17. I certify that this aircraft has been inspected on March 1, 2017 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.



AVIATION SERVICES

G & G Aviation Services

10200 Dorbandt Dr.. Hangar 23D  
Conroe, TX 77303

### Airframe Logbook Entry

ACTT# UKN Hobbs# 113.6

Registration: N6763

Make: Bell

Model: P-63F

Serial: 296E1-1R

1. Removed nose wheel assy, disassembled, cleaned, repacked wheel bearings.
2. Installed new Dunlop tire P/N# 22/725-1150-8-D and found tube in servicable condition.
3. Serviced tire to MFG spec's and reinstalled nose wheel assy.
4. Checked for security and overall condition of work performed this date, all satisfactory.

I certify that all work was done in accordance with FAA regulations and approved maintenance manual. This Airframe was found to be in an airworthy condition, and is approved for return to service with respect to work performed this date.

END

Date: 10-5-2017

Authorized Signatory

Gary Barber  
A/P I/A

Date: May 18, 2018

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763

MONTH/YE A/C Total Time: 1,127.1

Hobbs Time: 127.8

A/C Serial Number: 1296E1-1R

Removed all panels and opened all inspection plates. Greased all zerts and lubricated all torque tubes, flight control bellcracks and hinge points. Repainted cockpit and installed new instrument panel. Cleaned and re-packed wheel bearings, and checked tire pressure. Repaired and changed right brake seal. Adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gearbox housings and performed landing gear retraction test. Checked landing gear gearbox oil level. Inspected flight controls. Ensured the correct operation of the flaps, elevators, rudder, ailerons and trim tabs. Inspected and tested the fuel system. Checked oil door and radiator doors for proper operation. Checks navigation, beacon and landing lights. AD's checked through 09-18. I certify that this aircraft has been inspected on May 18, 2018 in accordance with the scope and detail of Appendix D of FAR part 43, appendix D and the Bell P-63 Inspection, Maintenance and Erection guidelines and was found to be in a condition for safe operation.

AEP [redacted] IA

Date: April 24, 2019

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763

A/C Total Time: 1,157.8

Hobbs Time: 158.5

A/C Serial Number: 1296E1-1R

Removed all panels and opened all inspection plates. Greased all zerts and lubricated all torque tubes and flight control bellcracks and hinge points. Cleaned and re-packed wheel bearings and checked tire pressure. Adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gear housing and performed landing gear retraction test. Checked landing gear gearbox oil level. Inspected all flight controls. Inspected and tested the fuel system. Checked flaps, oil door and radiator doors for proper operation. Checked level of coolant. Checks navigation, beacon and landing lights. AD's checked through 04-19. I certify that this aircraft has been inspected on April 23, 2019 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

AEP [redacted] IA

IA no.

CAF Fo

MARCH 5, 2019 HOURMETER 155.1 N6763 AIRFRAME ENTRY.

AIRCRAFT FLIGHT CONTROLS REMOVED AND PANELS REMOVED. WHERE REQUIRED PAINT WAS STRIPPED. MAGNESIUM SURFACES WERE CONVERTED UTILIZING PRE-KOAT AND ALUMINUM SURFACES WERE CONVERTED USING ALDIDE. AIRCRAFT WAS PRIMED USING EPOXY PRIMER. AIRCRAFT WAS TOP COATED UTILIZING DELTRON 2000 (DBL MET) BRILLIANT SILVER. BRAND CODE 930417. THE TAIL SURFACES WERE STRIPPED OF FABRIC AND RECOVERED USING SUPERFLIGHT MATERIALS AND PROCESS. THE MS27645-4 BEARINGS WERE REPLACED ON THE FLIGHT CONTROLS AND THE CONTROLS REINSTALLED. AN NEW RIGHT AFT RUDDER CABLE WAS FABRICATED FROM PATTERN TO MIL-DTL-6117 STANDARDS BY MCFARLANE AVIATION ON JOB ORDER 55273 DATED 2-08-2019. THE RUDDER CABLES WERE TENSIONED AND THE TURNBUCKLES DOUBLE STRAND SAFETIED UTILIZING SS.041" LOCKWIRE. AIRCRAFT IS EXPERIMENTAL AND NO DATA EXIST FOR FLIGHT CONTROL BALANCING. ALL FINISHING WAS PERFORMED WITH TRAILING EDGES UP AND UTILIZING ONLY REQUIRED MATERIAL. THE CONTROLS WERE CHECKED AS PER THE P63 SIRM FIELD CHECK PROCEDURE, NONE EXCEEDED THE 1" FWD LIMIT. REPLACED THE BEARINGS IN THE RIGHT NOSE LANDING GEAR DOOR. THE RUDDER AND ELEVATOR TRIM SCREWS WERE CLEANED AND RE-PAULCED. THE AIRCRAFT WAS JACKED & A LANDING GEAR RETRACT & EXTEND WAS PERFORMED WITHOUT EVENT. WORK WAS PERFORMED BY, J. MOSLEY, D. MOSLEY, A. MCCAIN, K. HOLLOLM, G. BURNS, M. PERKINS, E. SLOAN, B. BEARST, D. ENTREKIN.

DAVID C. ENTREKIN A&P [REDACTED]

**RIGHT AFT RODDER CABLE**

This cable assembly(s) meets all specifications and standards of MIL-DTL-6117 where applicable and has been pre-stretched and proof loaded in accordance with MIL-DTL-5688. Inspection and test reports are on file with McFarlane Aviation, Inc. under Job Order #55273

Authorized Inspector

Date

**MC52**

**02-08-2019**

Date: 1/21/2019

Customer

Job No.

Manufacturer

MERCEDES

Main Layer

Brand Code: 930417

OEM Code: 9744,744

Description: BRILLIANT SILVER

Mixing Scheme: DELTRON 2000 (DBC MET)

Variant: PRIME

Revision Date: 3/2/1999

Density: 7.85 lbs/gal(941 g/L)

VOC Reg.LWLE: 5.89 lbs/gal(706 g/L)

VOC Act.: 5.89 lbs/gal(706 g/L)

SDS (Color) DBC1

Makes: 1 gal

Price Code

Notes:

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I certify that the Transponder in this aircraft has been tested and Meets the requirements of FAR 91.413 and FAR 43- Appendix F.  
A/C N Number: N6763

Signed: \_\_\_\_\_

Date: 4-24-19

Work Order Number: 131959

VON'S AVIONICS INC.

CRS# 9VAR151C

17781 AIRFIELD LANE

PEARLAND TEXAS 77581

SKU	Description	Inc.(g)	Cum.(g)
DMD649	CLEAR	396.2	396.2
DMD1680	FINE ALUM.	1871.6	2267.9
DMD1681	MED. ALUM.	422.8	2690.7
DMD648	WEAK BLACK	94.9	2785.6
DX685	FLATTING	36.8	2822.3
DBX1689	CLEAR	740.0	3562.3

Comments Use undercoat G1 for best results

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MON

Date: March 10, 2020

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763

A/C Total Time: 1,187.5

Hobbs Time: 188.2

A/C Serial Number: 1296E1-1R

NO X

Removed all panels and opened all inspection plates. Greased all zerts and lubricated all torque tubes and flight control bellcracks and hinge points. Cleaned and re-packed wheel bearings and checked tire pressure. Adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gear housing and performed landing gear retraction test. Checked landing gear gearbox oil level. Inspected all flight controls. Inspected and tested the fuel system. Checked flaps, oil door and radiator doors for proper operation. Checked level of coolant. Checks navigation, beacon and landing lights. AD's checked through 03-20. I certify that this aircraft has been inspected on March 10, 2020 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

/NO.

[Redacted] AEP [Redacted] IA

Randy Wahlberg

IA no.

Date: May 3, 2021

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763

A/C Total Time: 1,201.7

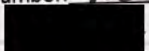
Hobbs Time: 202.4

A/C Serial Number: 1296E1-1R

Removed all panels and opened all inspection plates. Greased all zerts and lubricated all torque tubes and flight control bell cracks and hinge points. Cleaned and re-packed wheel bearings and checked tire pressure. Installed new brake O rings, adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gear housing and performed landing gear retraction test. Checked landing gear gearbox oil level. Inspected all flight controls. Inspected and tested the fuel system. Checked flaps, oil door and radiator doors for proper operation. Checked level of coolant. Checks navigation, beacon and landing lights. Replace roll up side windows with Lexan. AD's checked through 05-21. I certify that this aircraft has been inspected on May 5, 2021 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

[Redacted] AEP [Redacted] IA

MONTH/YEAR	MODEL	SERIAL NO.	REGISTRATION NO.	UNIT	PAGE NO.	
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NO	X		A/C TIME / ACTION TAKEN / DATE / SIGNATURE	SIGNATURE / NAME DATE / CERTIFICATE / TYPE / NO.
		I certify that the Transponder in this aircraft has been tested and Meets the requirements of FAR 91.413 and FAR 43- Appendix F. A/C N Number: <u>N6763</u>		
		Signed: 		
		Date: <u>3-5-21</u>		
		Work Order Number: <u>132711</u>		
		VON'S AVIONICS INC. CRS# 9VAR151C 17781 AIRFIELD LANE PEARLAND TEXAS 77581		

Date: March 23, 2022

A/C Make: Bell P-63F Kingcobra

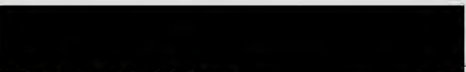
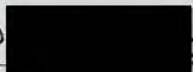
A/C Registration: N6763

A/C Total Time: 1,211.6

Hobbs Time: 212.3

A/C Serial Number: 1296E1-1R

Removed all panels and opened all inspection plates. Greased all zerts and lubricated all torque tubes and flight control bell cracks and hinge points. Cleaned and re-packed wheel bearings and checked tire pressure. Adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gear housing and performed landing gear retraction test. Checked landing gear gearbox oil level. Inspected all flight controls. Repaired leaking fuel selector valve, inspected and tested the fuel system. Checked flaps, oil door and radiator doors for proper operation. Checked level of coolant. Checks navigation, beacon and landing lights. Replace roll up left side window with Lexan. Replaced battery. AD's checked through 03-22. I certify that this aircraft has been inspected on March 23, 2022 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

 AEP  FA  
Randy Wahlberg I.A. No.

Date: March 23, 2022  
A/C Total Time: 1,211.6

A/C Make: Bell P-63F Kingcobra  
Hobbs Time: 212.3

A/C Registration: N6763  
A/C Serial Number: 1296E1-1R

Removed all panels and opened all inspection plates. Greased all zerts and lubricated all torque tubes and flight control bell cracks and hinge points. Cleaned and re-packed wheel bearings and checked tire pressure. Adjusted and serviced the brake system. Inspected landing gear system, torque tubes, worm drives and gear housing and performed landing gear retraction test. Checked landing gear gearbox oil level. Inspected all flight controls. Repaired leaking fuel selector valve, inspected and tested the fuel system. Checked flaps, oil door and radiator door for proper operation. Checked level of coolant. Checks navigation, beacon and landing lights. Replace roll up left side window with Lexan. Replaced battery. AD's checked through 03-22. I certify that this aircraft has been inspected on March 23, 2022 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell 63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

[Redacted] AEP [Redacted] IA  
Randy Wahlberg IA no.

Date: March 23, 2022  
Engine Type: Allison V1710-135  
Hobbs Time: 212.3

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763  
Engine Serial Number: O-055504  
Engine Time: 217.3

Inspected general condition of engine. Removed, cleaned and tested all spark plugs. Changed oil and cleaned oil filter. Engine serviced with 10 gallons of Aeroshell W120. Checked level of gearbox oil (Royco 586M - Mil 6086M). Engine compressions: Left Bank - 1) 71, 2) 65, 3) 72, 4) 74, 5) 61, 6) 79, Right Bank - 1) 65, 2) 75, 3) 64, 4) 72, 5) 69, 6) 68. AD's checked through 03-22. Ran engine to ensure within required tolerances. I certify that engine has been inspected on March 23, 2022 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

[Redacted] AEP [Redacted] IA  
Randy Wahlberg IA no.

Date: March 23, 2022  
Propeller Type: Aero Products (DWG:A6425-E1)  
Hobbs Time: 212.3

A/C Make: Bell P-63F Kingcobra

A/C Registration: N6763  
Serial Number: 24672  
Propeller Time: 171.7

Lubricated and inspected propeller. Propeller regulator serviced/filled with hydraulic fluid 5606. AD's checked through 03-22. I certify that this propeller has been inspected on March 23, 2022 in accordance with the scope and detail of 14 CFR part 43 Appendix D and the Bell P-63 Inspection and Maintenance guidelines and was found to be in a condition for safe operation.

[Redacted] AEP [Redacted] IA  
Randy Wahlberg IA no.



U.S. Department  
of Transportation  
**Federal Aviation  
Administration**

Houston Flight Standards District Office  
12650 N. Featherwood Drive, Suite 230  
Houston, Texas 77034-4411  
281-929-7000, Fax: 281-929-7059

**EXPERIMENTAL OPERATING LIMITATIONS  
EXHIBITION & AIR RACING  
Piston Powered: Warbird, Vintage, Replica, and Unique Aircraft  
Phase 2**

*(These limitations are derived from the national standards contained in FAA Order 8130.2H)*

REG. NO.	MAKE:	MODEL:	SERIAL NO:
N6763	Bell	P-63F	296E1-1R

1. This aircraft does not meet the airworthiness requirements specified in Annex 8 to the Convention on International Civil Aviation. Operations in civil airspace outside of the United States will require the written permission of the applicable Civil Aviation Authorities (CAA). That written permission must be carried aboard the aircraft together with the U.S. airworthiness certificate and, upon request, be made available to an FAA inspector or the CAA in the country of operation. Operations may be further restricted by the foreign CAA. This may include not allowing use of an airport, requiring specific routing, and restricting flight over specific areas. The operator must comply with any additional limitation prescribed by the CAA when operating in its airspace. (1)

2. No person may operate this aircraft for any other purpose specified on the face of the FAA Form 8130-7. These operating limitations do not provide any relief from any applicable law or regulation. This aircraft must be operated in accordance with applicable regulations and the additional limitations prescribed herein. Note that a clearance from air traffic control (ATC) is not authorization for a pilot to deviate from any rule, regulation, operating limitation, or minimum altitude, or to conduct unsafe operation of the aircraft. If ATC issues a clearance that would cause a pilot to deviate from a rule, regulation, or operating limitation, or in the pilot's opinion, would place the aircraft in jeopardy, it is the pilot's responsibility to request an amended clearance. These operating limitations are a part of FAA Form 8130-7 and are to be carried in the aircraft at all times and to be available to the pilot in command of the aircraft. (2)

3. This special airworthiness certificate and attached operating limitations are not in effect during public aircraft operations (PAO). Concurrent public/civil operations are not permitted; the aircraft cannot be operated as a civil aircraft and as a public aircraft at the same time. This airworthiness certificate is not in effect during flights related to providing military services (that is, air combat maneuvering, air-to-air gunnery, target towing, electronic countermeasures simulation, cruise missile simulation, and air refueling). These activities are inherent military training activities, not civil activities. The FAA makes the distinction between the authorized flights for experimental purposes, as described in the program letter, and PAO. Before operating this aircraft under this special airworthiness certificate following a PAO, the aircraft must be

returned via an approved method to the condition and configuration at the time of airworthiness certification. This action must be documented in the aircraft records. The aircraft records and entries must clearly differentiate between a civil experimental flight per this certificate and any other flights. (3)

4. Application to amend these operating limitations must be made to the local Flight Standards District Office (FSDO) or Manufacturing Inspection District Office (MIDO). (6)

5. The pilot in command of this aircraft must hold Airplane category and Single-engine land class certificate or privilege. The pilot in command must hold all required ratings or authorizations, and endorsements required by 14 CFR part 61. (7)

6. The pilot in command must hold:

(a) An appropriate type rating (if one has been established); or

(b) An experimental aircraft authorization, by make and model, on their pilot certificate;

or

(c) A temporary LOA issued by an FAA Flight Standards Operations Inspector.

For single seat or single control aircraft, a qualified instructor may make a logbook endorsement, to allow the airman to be PIC, for the purpose of completing a practical test for the issuance of an experimental aircraft authorization. The endorsement may allow solo operation of the aircraft. The endorsement may be valid for a period up to 30 days. The endorsement must specify the flight conditions authorized (e.g. day, night, IMC) and flying area. The flying area may not exceed 3/8 the fuel range of the aircraft. (8)

7. When filing a flight plan, the experimental nature of this aircraft must be listed in the remarks section. (10)

8. This aircraft must not be used for towing, including, but not limited to glider towing, banner towing, target towing or towing electronic receivers or emitters. This aircraft must not be used for intentional parachute jumping. (12)

9. If aircraft, engine, or propeller operating limitations are exceeded outside of planned test conditions, an appropriate entry will be made in the aircraft records. (13)

10. No person may operate this aircraft unless within the preceding 12 calendar months it has had a condition inspection performed in accordance with the scope and detail of 14 CFR part 43, appendix D, manufacturer or other FAA-approved programs, and was found to be in a condition for safe operation. The inspections must be recorded in the aircraft maintenance records showing the following, or a similarly worded, statement: "I certify that this aircraft has been inspected on [insert date] in accordance with the [insert either: scope and detail of 14 CFR part 43, appendix D; manufacturer's inspection procedures] and was found to be in a condition for safe operation." The entry will include the aircraft's total time-in-service (cycles if appropriate), and the name, signature, certificate number, and type of certificate held by the person performing the inspection. (14)

11. This aircraft must not be operated unless it is operated, inspected, and maintained in accordance with appropriate military technical publications and/or manufacturer's recommendations. (15)

12. Only FAA-certificated repair stations, FAA-certificated mechanics with appropriate ratings, or a manufacturer as authorized by § 43.3 may perform inspections required by these operating limitations. (18)

13. The aircraft may not be operated unless the replacement for life-limited articles specified in the applicable technical publications pertaining to the aircraft and its articles are complied with in one of the following manners:

(a) Type-Certificated Products: Replacement of life-limited parts required by § 91.409(e) applies to experimental aircraft when the required replacement times are specified in the U.S. aircraft specifications, or type certificate data sheets.

(b) Non-Type-Certificated Products: All articles installed in non-type-certificated products operated under an airworthiness certificate issued for an experimental purpose, in which the manufacturer has specified limits, must include in their program an equivalent level of safety for those articles. These limits must be evaluated for their current operating environment and addressed in the approved inspection program. All articles installed in non-type-certificated products in which the manufacturer has specified limits, must include in their program an equivalent level of safety for those articles. The article must be inspected to ensure that the equivalent level of safety still renders the product in a serviceable condition for safe operation. (19)

14. For aircraft originally incorporating fatigue life recording systems, the owner/operator must maintain and use the system as prescribed by the aircraft manufacturer and comply with the manufacturer's fatigue life limits. (20)

15. The geographically responsible FSDO where the aircraft is based must be notified, and its response received in writing, before flying this aircraft after incorporation of a major change as defined by § 21.93. The FSDO may require demonstrated compliance with § 91.319(b). (21)

16. No weapons or special military mission systems may be added to the aircraft. (23)

17. The owner/operator must submit an annual program letter to the geographically responsible FSDO where the aircraft is based. A copy of the current program letter and any amendments must be carried on board the aircraft any time that the aircraft is being operated. The program letter must include the following information:

- (a) The aircraft's home base,
- (b) The name of the person responsible for the operation and maintenance of the aircraft,
- (c) A list of events at which the aircraft will be [exhibited/raced] (the list may be amended as necessary),
- (d) The estimated time or number of flights, and
- (e) The areas over which the aircraft will be flown. (27)

18. When an aircraft's home base is changed or there is a transfer of ownership, the owner/operator will within 30 days—

- (a) Submit a new program letter to the geographically responsible FSDO.
- (b) If an accepted or approved inspection program is specified in these operating limitations, submit a copy to the geographically responsible FSDO. (29)

19. Operation is restricted to airports that are within airspace classes C, D, E, or G, except in the case of a declared emergency or authorized operations under an airshow waiver. (32)

20. Day VFR flight operations are authorized.

Night flight operations are authorized if the instruments specified in § 91.205(c) are installed, operational, and maintained in accordance with the applicable requirements of part 91. Instrument flight operations are authorized if the instruments specified in § 91.205(d) are installed, operational, and maintained in accordance with the applicable requirements of part 91.

The pilot in command must have a method to comply with the § 91.319(c) prohibition from operating over densely populated areas or in congested airways. All maintenance or inspection of this equipment must be recorded in the aircraft maintenance records and include the following items: date, work performed, and name and certificate number of person returning aircraft to service. (41)

21. The pilot in command must not perform any maneuvers that have not been flight tested or operate the aircraft outside the weight, airspeeds, and center of gravity limits tested. (42)

22. The carriage of passengers is prohibited. (43)

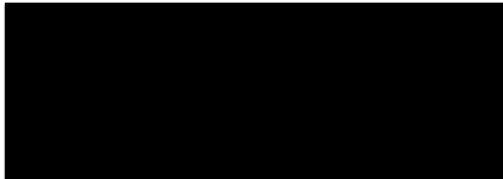
23. Flight over a densely populated area or in a congested airway is authorized in accordance with § 91.319(c) only for the purpose of takeoff and landing.

The area on the surface described by the term "only for the purpose of takeoff and landing" is the traffic pattern.

For the purpose of this limitation, the term "only for the purpose of takeoff and landing" does not allow multiple traffic patterns for operations such as training or maintenance checks. This DOES NOT restrict a go-around/rejected landing for safety reasons.

When avoiding populated areas, aircraft speed and weight must be considered. The information in FAA Order 8900.1, Flight Standards Information Management System (FSIMS), regarding set-back distances from spectator areas for aviation events such as air shows or air races may assist in determining a suitable space to fly the aircraft. (46)

24. This aircraft is prohibited from flight with any externally mounted equipment unless the equipment is mounted in a manner that will prevent in-flight jettison. Installation of external stores (pylon and equipment) or external fuel tanks not approved by the manufacturer or the original military operator is prohibited. No change in external loading for the aircraft (e.g., a change in a pylon, rack, or external store) from configurations approved by the manufacturer or original military operator is allowed, except to prevent jettison. (51)



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