



TYPE CERTIFICATE DATA SHEET Nº EA-2020T01

Type Certificate Holder:

PILATUS AIRCRAFT LTD.

P.O. Box 992

6371 Stans

Switzerland

EA-2020T01-00
Sheet 01

PILATUS

PC-24

25 January 2020

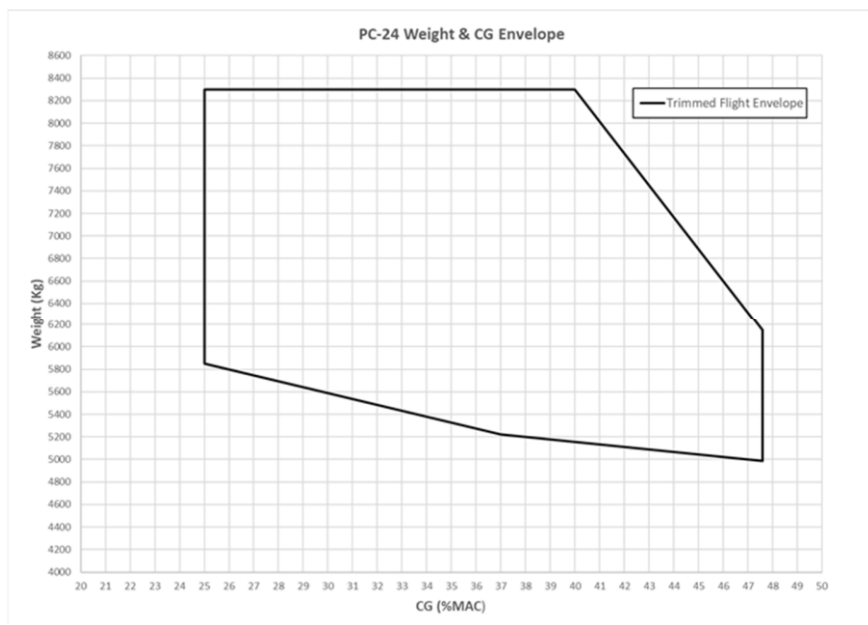
This data sheet, which is part of Type Certificate No. 2020T01, prescribes conditions and limitations under which the product, for which the Type Certificate was issued, meets the airworthiness requirements of the Brazilian Aeronautical Regulations.

I - Model PC-24 (Commuter Category), approved 25 January 2020.

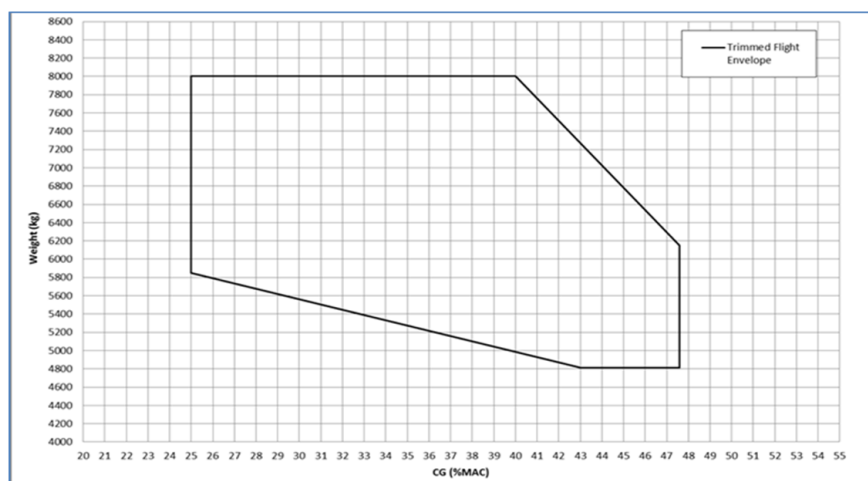
ENGINE	2 Williams International FJ44-4A-QPM
FUEL	Refer to the latest revision Williams International Engine Installation and Operating Instructions 110675-201 FJ-44-4A-QPM (73200-201) (including JET A, JET A-1, JP-8, TS-1).
ENGINE LIMITS	Refer to latest revision EM 9303 Williams International Engine FJ44-4A-QPM
OIL	Refer to the latest revision Williams International Engine Installation and Operating Instructions 110675-201 FJ-44-4A-QPM (73200-201) (including Mobil Jet II, Mobil 254)
AIRSPEED LIMITS (CAS)	Maximum operating (V_{MO}): 290 keas Maximum operating (M_{MO}): 0.74 Maximum Diving (VD) 360 keas Maximum Diving Mach Number (MD) 0.81 Maneuvering (V_A) at MTOW: 185 keas Design Cruising speed (VC) 290 keas Flaps extended (V_{FE}) - 33° (landing): 175 keas - 15° (takeoff and approach): 200 keas - 8° (takeoff): 200 keas L. G. operation - extend (V_{LO}): 250 keas L. G. operation - retract (V_{LO}): 200 keas L. G. extended (V_{LE}): 250 keas Stall speed, ISA, sea level, max landing weight, landing configuration (VSO) \leq 81 Kcas

CG RANGE

For aircraft 101-130 Post SB 42-002, and 131 and up



For aircraft 101 – 130 pre SB 42-002



DATUM

The Datum is 146.1 in (3,711 mm) forward of forward jacking point.

LEVELING MEANS

Levelling datum which is the seat rail behind the cargo door

MEAN AERODYNAMIC CHORD

1.997 m (6 ft 6")

MAXIMUM WEIGHT

For aircraft 101 – 130 pre SB 42-002

- Takeoff: 8 005 kg (17 650 lb)
- Landing: 7 370 kg (16 250 lb)
- Zero Fuel: 6 100 kg (13 450 lb)
- Ramp: 8 050 kg (17 750 lb)

For aircraft 101-130 Post SB 42-002, and 131 and up

- Takeoff: 8 300 kg (18 300 lb)
- Landing: 7 665 kg (16 900 lb)
- Zero Fuel: 6 450 kg (14 220 lb)
- Ramp: 8 345 kg (18 400 lb)

MINIMUM CREW	1 pilot		
MAXIMUM PASSENGERS	8 Pax excluding pilot seats. (see NOTE 10). Refer to the Airplane Flight Manual (02371) section 6 "Weight & Balance" for seat locations and moment arms.		
MAXIMUM BAGGAGE	Refer to the PC-24 Airplane Flight Manual, Section 6		
FUEL CAPACITY	Total:	3 389 lt (894 US Gal)	2 721 kg (6 000 lb)
	Usable:	3 369 lt (890 US Gal)	2 705 kg (5 964 lb)
	Unusable:	20 lt (5.3 US Gal)	16 kg (35 lb)
OIL CAPACITY	Total:	5.5 lt (5.85 qts)	
	Usable quantity:	4.3 lt (4.63 qts)	
MAXIMUM OPERATING ALTITUDE	13 716 m (45 000 ft) (see NOTE 5)		
CONTROL SURFACE MOVEMENTS	Elevator:	Up 25° +1°, -0°	Down 15° +1°, -0°
	Rudder:	Right 28 ± 0.5°	Left 28 ± 0.5°
	Aileron:	Up 25° ± 0.5°	Down 15° ± 0.5°
	Wing flaps:	Down 0 to xx° ± x°	
	Stabilizer:	A/C nose up direction	-10°
		Neutral	0°
		A/C nose up direction	+0.5°
SERIAL NUMBER ELIGIBLE	S/N P03, 101 and up		
IMPORT ELIGIBILITY	<p>A Brazilian Certificate of Airworthiness may be issued on the basis of on an EASA Export Certificate on Airworthiness (or a third country Export Certificate on Airworthiness, in case of used aircraft imported from such country), including the following statement:</p> <p>"The aircraft covered by this certificate has been inspected, tested and found to be in conformity with the Brazilian approved type design as defined by the Brazilian Type Certificate no. 2020T01 and in condition of safe operation".</p>		
CERTIFICATION BASIS	<p>Brazilian Type Certificate No. 2020T01 was amended based on RBAC 21.29, including the following requirements:</p> <p>RBAC 23 (Requisitos de Aeronavegabilidade: Aviões categoria normal, utilidade, acrobática e transporte regional) as amendment 23-62, which endorses the 14 CFR Part 23, effective 1 February, 1965, as amended by 23-1 through 23-62, effective January 31, 2012.</p> <p>The compliance was verified through equivalency finding to EASA Certification Specification 23, Amendment 3 – Normal, Utility, Aerobatic and Commuter Category Aeroplanes including EASA issued Special Conditions, Equivalent Level of Safety accepted by ANAC and additional ANAC issued Equivalent Level of Safety, Special Conditions and Exemptions as noted:</p> <p>Special Conditions:</p> <p>CRI B-01 Handling and Performance</p> <p>CRI B-02 High Speed Characteristics</p>		

CRI B-03 Stall Speed Determination
CRI B-04 Contaminated Runways
CRI B-05 Stick Pusher
CRI B-152 Human Factors
CRI C-01 Sonic Fatigue
CRI C-02 Pressurization into Non-Pressurized Areas
CRI C-05 Dynamic Response
CRI C-06 Out of Trim Conditions (Structures)
CRI C-07 Round-the-clock Gust
CRI D-01 Take-Off Warning System
CRI D-02 Extension and Retraction Systems
CRI D-03 Wheels
CRI D-04 Brakes and Braking Systems
CRI D-05 Doors
CRI D-06 Bird Strike
CRI D-09 Operation above 41.000 ft (see note 5)
CRI E-01 Fuel Tank Crashworthiness
CRI E-04 Lines, Fittings and Components
CRI E-06 Powerplant Fire Extinguishing Systems
CRI E-10 Fuel Tank Ignition Prevention
CRI E-11 Induction System Ice Protection - Cold Soaked Fuel
CRI E-59 Engine Installation (Rain Conditions)
CRI E-102 Single Point Defueling
CRI F-01 Battery Endurance Requirement
CRI F-03 Interaction of Systems and Structures
CRI F-15 Airworthiness Information Security
CRI F-52 Protection from effect of HIRF
CRI F-54 Protection from the effects to lightning strike, indirect effects
CRI F-62 Flight Instrument External Probes – Qualification in extended Icing conditions
CRI F-110 Auto-throttle
CRI G-02 Approval process of digital AFM
CRI O-04 Towbarless towing loads

Equivalent levels of safety findings:

CRI E-56 Powerplant System Indications.
CRI F-05 IMA Individual Circuit Protection.
CRI F-90 ASI Flaps Markings on PFD.
CRI F-108 ESIS 3rd ATT Indicator (ESIS) Compliance to CS 23.1303
CRI F-111 Mechanical Magnetic Compass - Flight Deck without Whisky Compass
CRI F-112 Pressurization and Pneumatic systems – bleed air level compliance

Exemptions: None

ANAC Special Conditions:

Resolution N° 535, dated 04 December 2019, establish a Special Condition to Electronic Engine Control (EEC) – FCAR SE-01 PC 24

ANAC Equivalent Level of Safety findings:

ANAC Ordinance 560 dated 27/02/2020 to RBAC 23 §§23.1353(h) Storage Battery Design and Installation – FCAR SE-02 PC 24.

Noise requirements:

Chapter 1 of ICAO Annex 16, Volume I, amendment 9, Part II to the Chicago Convention and as implemented in Decision No. 003/4/RM amended by Decision 2009/012/R of The Executive Director of the Agency, on certification specifications providing for acceptable means of compliance for aircraft noise (CS-36, Amendment 2).

Emission requirements:

Chapter 2 of ICAO Annex 16 Volume II, amendment 6, Part II to the Chicago Convention for the prevention of intentional fuel venting and as implemented in Decision No. 2003/3/RM of The Executive Director of the Agency dated 17 October 2003, on certification specifications providing for acceptable means of compliance for aircraft engine emissions and fuel venting (CS-34).

REQUIRED EQUIPMENT

The basic required equipment, as prescribed in the applicable airworthiness regulations (see Certification Basis) must be installed in the airplane.

DATA PERTINENT TO ALL MODELS:**NOTES:****NOTE 1** Weight and balance.

A current weight and balance report, including a list of equipment included in the certificated empty weight, and loading instructions when necessary, must be provided for each airplane at the time of original certification. The Manufacturers Empty Weight (MEW) is the weighed weight of the aircraft without any fuel or oil. Unusable fuel quantity and unusable oil quantity shall be added to the certified empty a/c weight.

NOTE 2 Markings and placards: Airplane operation must be in accordance with the Brazilian Approved Airplane Flight Manual and Brazilian Airplane Flight Manual Supplement P/N 02452.

All placards required by the Flight Manual, the applicable operating rules and the Certification Bases must be installed in the airplane.

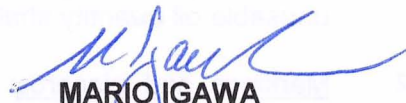
NOTE 3 Continuing Airworthiness: Mandatory retirement lives, required inspections, and inspection intervals of components are listed in the Airworthiness Limitations Section, Chapter 4, of the Airplane Maintenance Manual, document 02378, Issue 003 Revision 00 dated 24 January 2018 or later approved revisions. The Airworthiness Limitations Section was approved by EASA.**NOTE 4** The differences of the Brazilian airplanes in relation to the basic FAA type design are summarized below:

1. The Brazilian Airplane Flight Manual Supplement P/N 02452
2. Markings and placards.

NOTE 5 High altitude operations

PC-24 airplanes have been approved for high altitude operations (altitudes above 12 497 m (41 000 feet)), by Special Conditions. Any modifications to the pressure vessel must be approved in accordance with the requirements as shown in the certification basis. This includes modifications which could result in a pressure vessel opening, either through crack growth or antenna loss, greater than 17.1 cm² (2.65 sq.in).

-
- NOTE 6** For Thermal/acoustic insulation materials the standards of RBAC / 14 CFR Part 23 Amdt. 1 thru 62, §23.856 [23-62] are met. For Ice protection beside the CS23.1419 and Special Condition F-62 requirements the standards of RBAC / 14 CFR Part 23 Amdt. 1 thru 62, 23.1419 [23-43] are met.
- NOTE 7** The PC-24 is approved for flight into known or forecasted icing. Compliance has been shown iaw. CS-23.1419 and SC F-62.
- NOTE 8** The PC-24 S/N P03, 101 and subsequent equipped with Honeywell APEX system are RVSM capable. Each aircraft must receive individual operational approval.
- NOTE 9** Approval for operation with a minimum crew of one pilot is based upon the cockpit equipment installation and arrangement evaluated during certification testing. No significant changes may be made to the installed cockpit equipment or arrangement (EFIS, autopilot, avionics, etc.), except as permitted by the approved MMEL, without prior approval.
- NOTE 10** All replacement seats (crew and passenger), although they may comply with TSO C127, must also be demonstrated to comply with RBAC 23.321, 23.395, 23.561, 23.562, and 23.785.
- NOTE 11** The foam cushion buildup of all seats (crew and passenger) may not be altered. Any deviations in the foam construction or stiffness must be demonstrated by test to comply with the listed RBAC 23 paragraphs
- NOTE 12** Maximum number is 8 PAX in the cabin. An optional fit allows two additional infants to be carried at the first seating row on the left and right sides. During single pilot operation, the pilot occupies the left-hand cockpit seat and an additional passenger may occupy the right- hand cockpit seat.

**MARIO IGAWA**

**Gerente-Geral de Certificação de Produto Aeronáutico
(Manager, Aeronautical Product Certification)**
