



TYPE-CERTIFICATE DATA SHEET

No. P.024

for
V 410 series propellers

Type Certificate Holder
Avia Propeller Ltd.

Beranových 65/666
199 00 Praha 9 - Letňany
Czech Republic

For Models:

V 410
V 410A
V 410AT
V 410T
V 410F



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I. General

1. Type / Model

V 410 / V 410A / V 410AT / V 410T / V 410F

2. Manufacturer

Avia Propeller Ltd.
Beranových 65/666
199 00 Praha 9 - Letňany
Czech Republic

3. Date of Application

V 410	V 410A	V 410AT	V 410T	V 410F
22.5.1958	11.03.1960	11.03.1960	11.03.1960	25.9.1965

4. EASA Type Certification Date

V 410	V 410A	V 410AT	V 410T	V 410F
22.8.1958	17.11.1960	17.11.1960	17.11.1960	14.12.1965

Type certification of the V 410 series propeller model has been covered previously by Czech Republic Type certificate No.783/58, Amendment 1 incl. and partly by No.9 339/60 and No.65-03.

II. Certification Basis

1. State of Design Authority Certification Basis

Czech Republic

2. Reference Date for determining the applicable airworthiness requirements

22 May 1958 (for later updated amendments 11 March 1960 and 25 September 1965 were used).

3. EASA Certification Basis

3.1. Airworthiness Standards

Initially §9 of the Civil Aviation Law No.47/1956, dated 1 October 1956 (Czechoslovakia) and ICAO Standards.

Later compliance with British Civil Airworthiness Requirements (BCAR), Section C, Issue 4, dated 1st March, 1957 and Issue 5, dated 1st July, 1962.

Note:

Application was made to CAA - Czech Republic (former Czechoslovakia) before EASA was established. The applicable airworthiness standards were established in accordance with the rule in Czech Republic (former Czechoslovakia) at the time of application.



3.2. Special Conditions

None

3.3. Equivalent Safety Findings

None

3.4. Deviations

None

III. Technical Characteristics

1. Type Design Definition

The V 410 propeller model covers the following design configuration. Design configuration is defined by a main assembly drawing and an appropriate parts list.

V 410

Design Configuration "Manually actuated or Constant speed, Feather"

Drawing No. V410-0000 dated June 26, 2009 (*1)

Parts List No. R-V410-0000 dated June 26, 2009 (*1)

(*1) effective is the declared issue or a later approved revision.

2. Description

2-blade variable pitch propeller with an electrically operated blade pitch change mechanism providing the operation modes "Manually actuated or Constant speed, Feather". The hub is milled out of steel and blades are milled out of aluminum alloy.

Optionally the propeller may have installed a spinner and ice protection equipment.

3. Equipment

Spinner: according to Avia Propeller Service Bulletin No. 2

Governor: according to Avia Propeller Service Bulletin No. 3

Ice Protection: according to Avia Propeller Service Bulletin No. 4

4. Dimensions

Propeller diameter: max. 195 cm

5. Weight

Propeller-Design Configuration

"Manually actuated or Constant speed, Feather": approx. 26 kg



6. Hub / Blade-Combinations

Hub	Blade-Type
V 410()	-1800, -1850, -1900, -1950

7. Control System

Propeller governors and electrically operating control units as listed in Avia Propeller Service Bulletin No. 3.

8. Adaptation to Engine

V 410, V 410A, V 410AT, V 410T - special cone on the engine shaft
V 410F - flange, AS-127, No.3

9. Direction of Rotation

V 410, V 410A, V 410AT, V 410T - left-hand tractor (viewed in flight direction)
V 410F - right-hand tractor (viewed in flight direction)

IV. Operating Limitations

1. Maximum Take Off Power and Speed

164 kW at 2700 min⁻¹ - for V 410 propeller
164 kW at 2800 min⁻¹ - for V 410A, V 410AT, V 410T propellers
134 kW at 2800 min⁻¹ - for V 410F propeller

2. Maximum Continuous Power and Speed

164 kW at 2700 min⁻¹ - for V 410 propeller
164 kW at 2800 min⁻¹ - for V 410A, V 410AT, V 410T propellers
134 kW at 2800 min⁻¹ - for V 410F propeller

3. Propeller Pitch Angle

V410, V410A, V 410AT, V 410T - from +12° to +90° measured at reference station
V410F - from +12° to +30° measured at reference station



V. Operating and Service Instructions

Operation and Installation Manual	P/N E-1652 Date of Latest Issue/Revision Issue 1, June 26, 2009 (*)
Overhaul Manual	P/N E-1653 Date of Latest Issue/Revision Issue 1, June 26, 2009 (*)
Overhaul Manual for Metal Blades	P/N EN-1370 Date of Latest Issue/Revision Issue 2, March 17, 2009 (*)
Service Bulletins	as noted in the current List of Service Bulletins

(*) effective is the declared issue or a later approved revision

VI. Notes

1. The suitability of the propeller for a given aircraft/engine-combination must be demonstrated within the scope of the type certification of the aircraft.

2. The overhaul intervals recommended by the manufacturer are listed in Avia Propeller Service Bulletin No. 1.

The EASA approved Airworthiness Limitations Section of the Instructions for Continued Airworthiness is published in the applicable "Propeller Operation and Installation Manual" document, chapter "Airworthiness Limitations".

3. EASA Type Certificate and Type Certificate Data Sheet No.P.024 replace CAA - Czech Republic Type Certificate and Type Certificate Data Sheet No.783/58, Amendment 1 incl., No.9 339/60 and No.65-03.



SECTION: ADMINISTRATIVE

I. Acronyms and Abbreviations

n/a

II. Type Certificate Holder Record

n/a

III. Change Record

TCDS Issue	Date	Changes	TC issue
Issue 01	14 July 2009	Initial Issue	Initial Issue, 14 July 2009
Issue 02	15 December 2022	Addition of a sentence to Note 2 in Chapter VI. Notes: The EASA approved Airworthiness Limitations Section of the Instructions for Continued Airworthiness is published in the applicable „Propeller Operation and Installation Manual“document, chapter Airworthiness Limitations. (Major Change approval 10080691)	

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