



AGÊNCIA NACIONAL DE AVIAÇÃO CIVIL - BRASIL

TYPE CERTIFICATE DATA SHEET Nº 2009T01

Type Certificate Holder:

Alexander Schleicher GmbH & Co. Segelflugzeugbau

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Germany

EP-2009T01

Sheet 01

SCHLEICHER

ASK 21

13 February 2009

This data sheet, which is part of Type Certificate No. 2009T01, 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 ASK 21 (Utility and Acrobatic Category), approved 13 January 2009.

AIRSPPEED LIMITS	Never exceed speed (VNE):	280 km/h
	Maneuvering (VA):	180 km/h
	Rough air speed	200 km/h
	Max. Speed aero tow	180 km/h
	Max. speed winch tow	150 km/h
DIMENSIONS	Span	17.0 m
	Wing Area	17.95 m ²
	Length	8.35 m
CG RANGE	234 mm to 469 mm (aft of datum)	
DATUM	Wing leading edge at root rip.	
LEVELING MEANS	Topside of wedge 1000: 52 is horizontal, when placed on rear top of fuselage tail boom.	
MAXIMUM WEIGHT	Takeoff:	600 kg
MINIMUM CREW	One Pilot (front seat)	
No OF SEATS	Two	
WEAK LINKS	Max. 1000 ± 100 daN for winch tow Max. 600 ± 60 daN for aerotow	
REQUIRED EQUIPMENT	The basic required equipment, as prescribed in the applicable airworthiness regulations (see Certification Basis) must be installed in the airplane.	

**REQUIRED EQUIPMENT
(Cont.)**

a. Min. equipment

1. Airspeed indicator up to 300 km/h
2. Altimeter
3. Variometer
4. Magnetic direction indicator (compensated)
5. Side-slip indicator
6. Four-piece safety harness for front and rear seat
7. Seat cushions, at least 10cm thick when loaded, or parachutes (automatic or manual)
8. Weight and balance data placard (front and rear seat)
9. Data placard
10. Flight Manual

b. Equipment for aerobatics

For aerobatics the above min. equipment must be supplemented as follows:

1. Additional bottom strap for the safety harness
2. G-meter for front seat
3. Foot loops on rudder pedals
4. Parachute (automatic or manual)

c. Equipment for cloud flying

For cloud flying the above min. equipment must be supplemented as follows:

1. Turn and bank indicator
2. VHF transceiver radio

LAUNCHING HOOKS

1. Nose tow hook "E 72", LBA Datasheet No. 60.230/1
1. Nose tow hook "E 75", LBA Datasheet No. 60.230/1
1. Nose tow hook "E 85", LBA Datasheet No. 60.230/1
2. Safety hook "Europa G 72", LBA Datasheet No. 60.230/2
2. Safety hook "Europa G 73", LBA Datasheet No. 60.230/2
2. Safety hook "Europa G 88", LBA Datasheet No. 60.230/2

OPERATIONAL CAPABILITY

Approved for VFR-flying in daytime.
Cloud flying according to the specifications in the Flight Manual
Aerobatic maneuvers according to the Flight Manual.

LIFETIME LIMITATIONS

Refer to Maintenance Manual.

**DEFLECTION OF CONTROL
SURFACES**

Refer to Maintenance Manual.

SERIAL NUMBER ELIGIBLE

A Certificate of Airworthiness for Export endorsed as noted under "Import Requirements" must be submitted for each individual aircraft for which application for a Brazilian Certificate of Airworthiness is made.

IMPORT ELIGIBILITY

A Brazilian Certificate of Airworthiness may be issued on the basis of on an LBA 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:

“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. 2009T11 and in condition of safe operation”.

The ANAC Report H.10-0296-0, dated 13 January 2009 or further revisions, contains the Brazilian requirements for the acceptance of these airplanes. (See note 4)

CERTIFICATION BASIS

Brazilian Type Certificate No. 2009T01 issued on 13 February 2009 based on the RBHA 21.29, as amended by 21-1 through 21-05, including the following requirements.

- a) RBHA 22 Brazilian Requirements for Aeronautical Certification, which endorses the JAR 22 effective 1 April 1981, as amended by 22-1 and include the Brazilian special requirements regarding flutter (Section 22.629) and flight navigation instruments (Section 22.1303).
- b) That defined by LBA in the letters I 311-339/78, dated 15.8.1978 and I 311-339/79, dated 9.1.1979;
- c) Airworthiness Requirements for Sailplanes and Powered Sailplanes – (LFSM), issue 23 Oct.1975;
- d) Standards for the Substantiation of the stress analysis of sailplane components made from fiberglass-reinforced plastics, issue March 1965 (Requirements elected to comply).

NOTES:**NOTE 1****Weight and balance.**

Current weight and balance report including list of equipment in certificated empty weight, and loading instructions, when necessary, must be provided for each glider at the time of original certification.

NOTE 2**Markings and placards.**

The placards listed in pages 53, 54 and 56a of the ASK 21 Maintenance Manual must be installed in the appropriate location. The Flight Manual airworthiness limitation may not be changed without ANAC approval.

NOTE 3**Continuing Airworthiness.**

The inspections, maintenance, repairs and painting shall be performed in accordance with the ASK 21 Maintenance and Repair Manuals instructions. Major repairs may only be performed following the manufacturer instructions approved by ANAC.

NOTE 4

The differences of the Brazilian airplanes in relation to the basic EASA type design are summarized below:

1. The Brazilian Airplane Flight Manual must be included.
2. Markings and placards must be in Portuguese (or English and Portuguese).
3. The following additional equipments are required for the Brazilian registered gliders:
 - Variometer.
 - Side slip indicator.
 - Magnetic compass

- NOTE 5** All external surfaces of the sailplane which are exposed to sunlight must be painted white, with the exception of the areas for registration and for the orange-red anti-collision paint-work on fuselage nose, wing tips and rudder.
- NOTE 6** Major structural repairs must be accomplished at ANAC certificated repair stations rated for composite aircraft structure work, in accordance with Alexander Schleicher repair methods approved by the ANAC.


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