

# ASK-13



## — MERCEDES OF THE TWO SEATERS

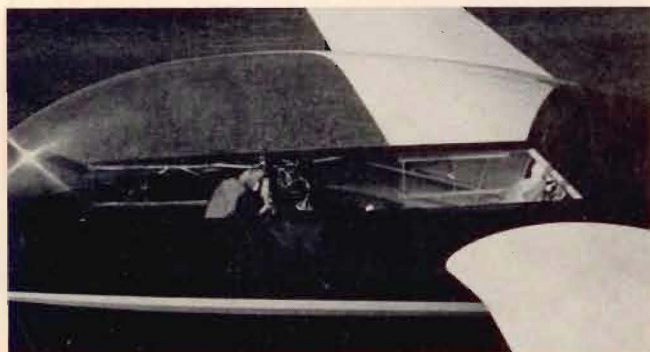
Rudy Mozer

Recent progress in the forming of large, optically flawless canopies has resulted in the decision by the Schleicher Sailplane Co. to develop a new two-place sailplane. The new design, which was started in 1963, is based on the well-known K-7, which for years has been the mainstay of numerous clubs throughout the country and which also holds the two-place world speed record of 52.0 m.p.h. for the 500-km. triangle.

The objective of designer Rudolf Kaiser's latest endeavors has been to achieve unrestricted visibility in all quarters and maximum pilot comfort in both seats. For this reason a mid-wing arrangement was chosen, permitting the use of a very large, one-piece canopy.

While the span and aspect ratio of the new ASK-13 are the same as the K-7, the performance has been increased by two points on the glide ratio and with a corresponding improvement in the sinking speed. These gains are due to the improved aerodynamics of the fuselage and a careful redesign of the wing.

The fuselage has a steel-tube frame with wood stringers and fabric covering except for plywood behind the cockpit. The nose is of fiberglass. The wing spar is of Polish pine and the Shempp-Hirth air brakes of metal. The fixed tail surfaces are plywood covered, the moveable surface covered with fabric.



ASK-13 canopy, showing excellent optical qualities.

During a recent trip to Europe I had a chance to test fly the new ship. Since the demand for the ASK-13 is such that Schleicher was once again without a demonstrator, I had to travel to Oerlinghausen, the beautifully located gliding center in Westphalia, where one of the new aircraft is currently in service.

I asked the chief instructor at Oerlinghausen, Herr Burtzlauer, for a chance to fly the ship from the rear

seat. One immediately gets the impression that there is a lot more room in the rear seat of the 13 than in the K-7. This feeling is no doubt caused in part by the truly panoramic view: The optics of the canopy were perfect and it took Herr Burtzlauer's presence in the front seat to reassure me that I wasn't sitting out in the open like back in the old days of the SG-38 primary. The canopy of this particular aircraft was very well sealed and made the cockpit about as quite as that of my K-6E. This resulted in a most pleasant conversation with our man up front — with a hitherto unaccustomed absence of noise and shouting.

As far as the harmony of the controls was concerned the ship gave me the impression of a king-size K-6E. It's bigger, to be sure, but just as balanced. We worked thermals flying at 40 m.p.h. and using about 30 degrees of bank! A comparison speed run with one of the K-7's in the air at the time showed the ASK-13 to be clearly superior. (The maximum flying speed, incidentally, has been raised from 170 to 200 km./hr.)

The landing wheel is equipped with rubber cone springs, a fact which contributed to a very soft landing. During the landing sequence there was little difference in feeling from a single seater — if one is used to landing with powerful dive brakes.

It is not surprising that the Germans have already dubbed this new glider the Mercedes of the Two-seaters. I think the name is very fitting, even for the USA, since the name of its American counterpart, the Cadillac of Two-seaters, quite justly belongs to a very fine American sailplane already flying through our skies.

The current price of the ASK-13, FOB German port, and less U.S. import duty, is \$4,710. The price FOB Detroit, duty paid but excluding state sales tax, is \$5,687, and to San Francisco (same conditions) \$5,827. The first two ASK-13's will be delivered to San Francisco and to Adrian, Michigan, by January of 1967. Additional 1967 deliveries are available.

Wing span.....	56 ft.
Wing area.....	188.3 sq. ft.
Airfoil section.....	mod Go. 535/549
Overall length.....	26.5 ft.
Empty weight.....	638 lbs.
Maximum flying weight.....	1,078 lbs.
Maximum wing loading.....	5.2 lbs./sq. ft.
Maximum L/D.....	28 @ 50 m.p.h.
Minimum sink (single-place).....	2.32 f.p.s.
(two-place).....	2.65 f.p.s.
Two-meter sink speed.....	84 m.p.h.