

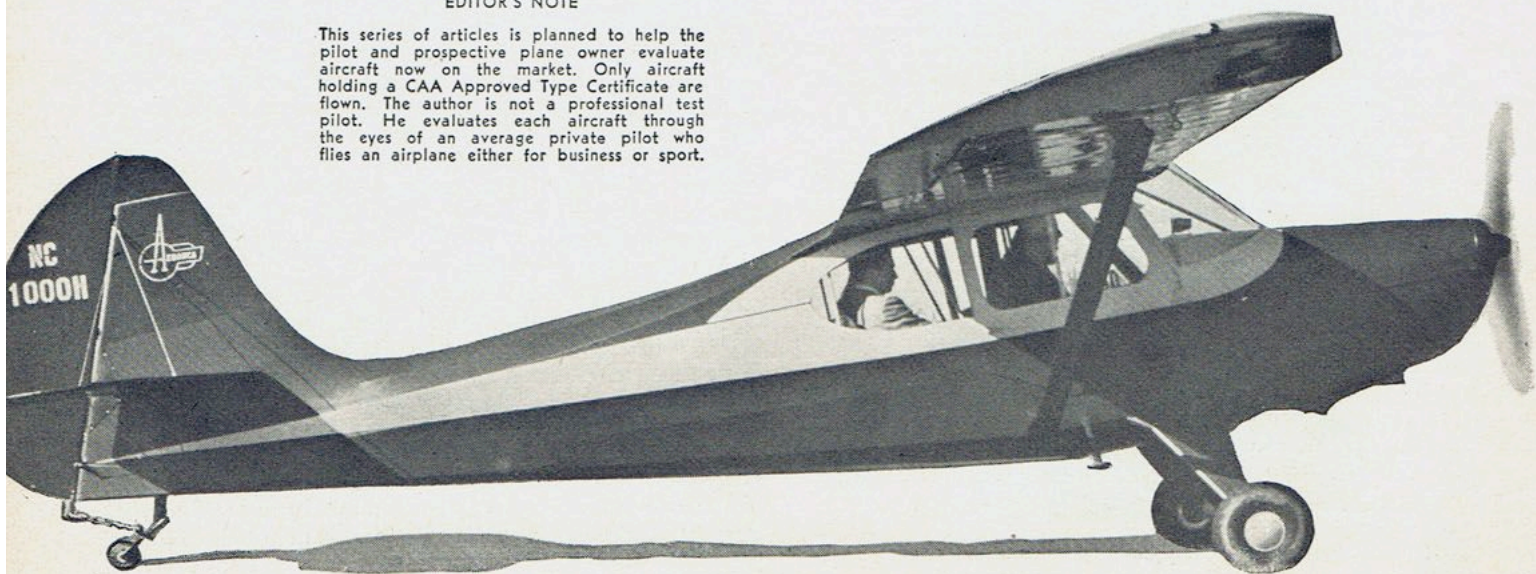
**Aeronca Sedan** is new four-place plane powered by 145-h.p. Continental engine. It has all-metal wings, conventional fabric-covered fuselage,



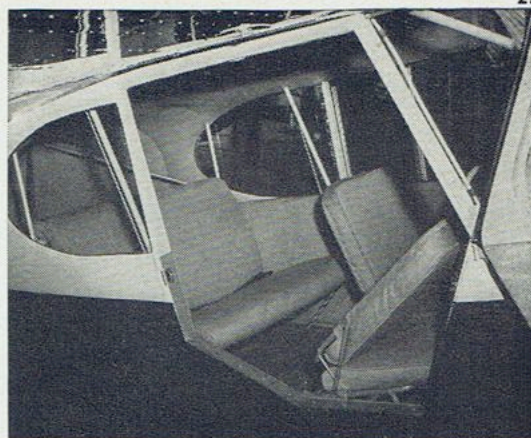
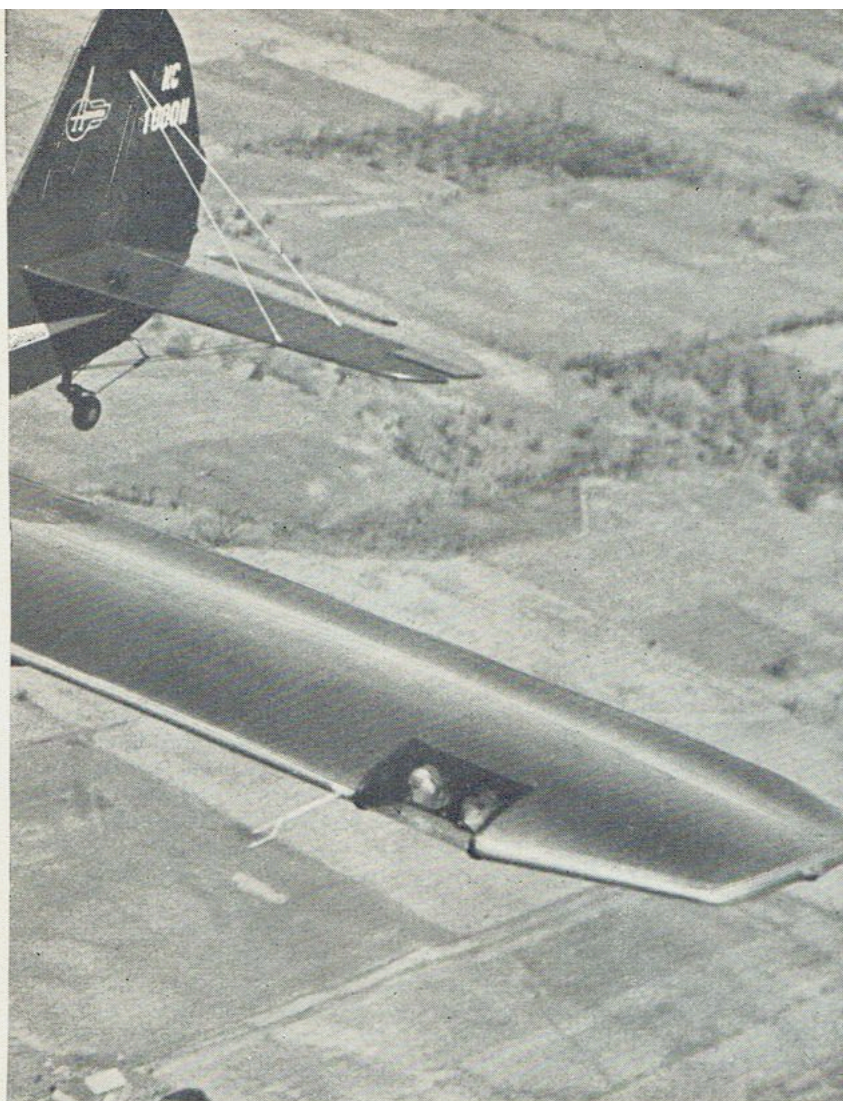
#### EDITOR'S NOTE

This series of articles is planned to help the pilot and prospective plane owner evaluate aircraft now on the market. Only aircraft holding a CAA Approved Type Certificate are flown. The author is not a professional test pilot. He evaluates each aircraft through the eyes of an average private pilot who flies an airplane either for business or sport.

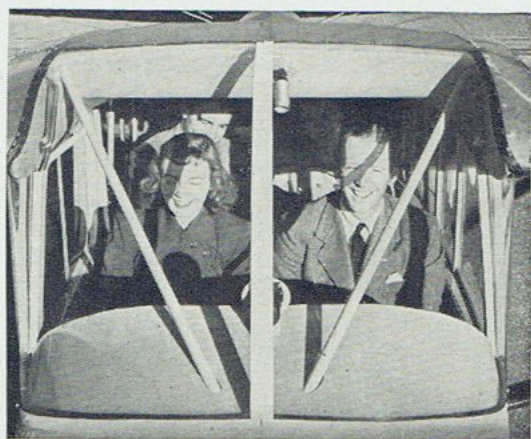
**Single strut** braces the Sedan's high wing. Entrance into cabin is from in front of the strut. The Sedan has a steerable, full-swiveling tail wheel.







**Interior of Sedan** has comfortable, wide seats. Plane uses same door as the Aeronca Champion.



**Good visibility** features the Sedan, though it is impaired somewhat by the two diagonal struts.

# Aeronca Sedan

By **MAX KARANT**

Assistant general manager and editorial director,  
Aircraft Owners and Pilots Association

**H**ERE IS ANOTHER new four-placer aimed at the lower-price brackets. For \$4,795 (at the factory) you get a four-place airplane with a 145-h.p. engine, fair performance for the horsepower, battery, navigation and landing lights, and an all-metal wing.

The Aeronca *Sedan* is a price-tag product. There's nothing fancy about it. Aeronca planned it that way to meet the demand for a low-priced four-placer.

Everything is kept at as bare a minimum as is possible. The fuel gauges for each of the two wing tanks are nothing more than small plastic transparent tubes running into the cockpit at the forward edge of the wing roots, above and to one side of the two front seats. The aileron control cables are out in the open, beside the back seat. The baggage compartment is just a wide spot in the fuselage behind the back seat, but it's designed to carry as much as 120 pounds (though the airplane won't carry anywhere near that amount of baggage with four people and full tanks). Still another economy is the double seat-belt for the back seat, a saving

frowned upon by safety engineers and Crash Injury Research.

Generally speaking, the *Sedan* is comfortable, even for big people. Both front seats are ample, though the pilot's seat is the only one that can be adjusted for size. But the back seat is a bit crowded. It has ample width but the top of the fuselage slopes sharply toward the tail, making the cabin roof slant too. Result is that, while I could sit in the back seat, I had to slouch forward to keep from riding with my head against the ceiling.

Being an "economy" model, the *Sedan* has fairly simple instruments and controls. The standard flight instruments are there. There are toe brakes but on the pilot's side only. Instrument lights are standard. There is a map light under the instrument panel. There also is a glove compartment and ash trays. The *Sedan* also has a starter and 12-volt engine-driven generator.

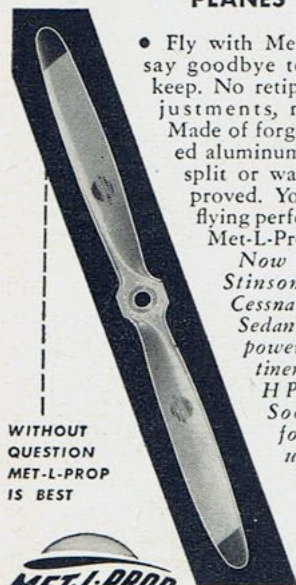
Aeronca held down costs on the *Sedan* in one way by using as many parts from other Aeronca products as possible. The large single door on the right side of the cabin is from the *Champion*. So are the front seats and windows. The brakes, instrument panel, control wheels, glove compartment and ash trays all are from the *Chief*. The company figures it saved \$110,000 on tooling by such interchange. (Continued on page 66)





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## Check Pilot

(Continued from page 27)

From the pilot's seat you have good forward visibility. The plastic windshield bulges up above the top of the fuselage, which helps quite a bit. But there are two large struts running across the windshield area and there's a wide center strip in the middle of the windshield, all of which cut down visibility a bit.

The *Sedan* is easy to taxi and is quite stable on the ground. You can see over the nose quite well; the pilot can adjust his height by adding or subtracting one of the two seat cushions. The brakes on the *Sedan* I flew (NC-1006H) were in good condition, so I had little difficulty with the airplane on the ground, despite an above-average surface wind.

My first tendency on take-off was to get the tail up by pushing forward on the wheel. It worked, all right, but seemed rather slow. After a couple of take-offs I found that the best way to take off with this airplane is to let it run in the tail-down position, get flying speed, then fly off. Actually, the tail is not down as much as it is on other conventional aircraft. The long tail-wheel strut props the tail up in a high position.

Once you figure out the take-off technique, the *Sedan* gets off the ground in about 10 seconds from a standing start, with a load. Best rate of climb at sea level, I found, is about 480 f.p.m. I made a couple of climbs to 1,000 feet from take-off, and that turned out to be the average rate.

In level flight, the *Sedan* is quite stable and easy to fly. Visibility is excellent, particularly forward. Maneuverability also is good, and the airplane has good stall characteristics, with plenty of warning. The plane I flew stalled at an indicated air speed of 53 m.p.h., both with power on and off. The air speed indicator, incidentally, is red-lined at 132 m.p.h.

My cruising speed over a triangular course was just barely over 100 m.p.h. at the normal cruising horsepower of 2,350 r.p.m. The 145-h.p. Continental apparently is an economical engine. One Aeronca pilot flew a *Sedan* for 4 hr. 55 min. before using all the plane's 36 gallons. That's an average rate of 7.3 gallons per hour, which isn't bad for a plane that size.

But the *Sedan* wasn't designed especially for speed. It is intended to get into and out of small, rough fields—and it should be able to do that with little trouble. My take-offs seemed satisfactory and the airplane is fun to land short. It mushes in nicely and, once the wheels touch, you can slam on full brakes until the wheels skid. For farmers and similar users who don't particularly care for high cruising speeds, the *Sedan* should be a good work horse.

Greatest innovation about this airplane is the all-metal wing; the rest of the ship still is fabric-covered tubing. It is the Aeronca officials' belief that the wing requires the least amount of maintenance, therefore can be metal. But the tail and fuselage, where little rips and tears are always turning up, are more easily and economically repaired when they are made of tubing and fabric. Another Aeronca in-

### AERONCA SEDAN

Type Certificate No. A802

One 145-h.p. air-cooled Continental engine	
Wing span	37 ft. 6 in.
Length	27 ft. 3 in.
Height	10 ft. 5 in.
Gross weight	2,050 pounds
Empty weight	1,150 pounds
Maximum speed	112 m.p.h.
Cruising speed (At sea level on 75 per cent h.p.)	105 m.p.h.
Stalling speed	53 m.p.h.
Maximum normal range	445 m.p.h.
Service ceiling	12,400 feet
Rate of climb (sea level)	600 f.p.m.

Source: Aeronca Aircraft Corporation

novation planned for a future model of the *Sedan* is a folding wing.

The *Sedan's* wing is of conventional metal construction. It is braced by a single strut (you enter the plane ahead of that strut instead of behind, as is customary with other similar aircraft). The twin landing lights are in the outboard leading edge of the left wing; both these lights deliver a total of 400,000 candlepower. While the ailerons do not have movable trim tabs there are novel metal strips along the rear of each wing tip and each strip can be bent by hand to correct wing-heaviness. Both the elevator and rudder are dynamically balanced.

Refueling of the *Sedan* presents a potential danger. You fill one tank as full as you can get it, then fill the other. By the time the second is filled, you should go back to the first, for it will take some more. Apparently a modification of the system is called for; it would be easy to think you had your full 36 gallons only to find something wrong when you tried to stretch your flight.

Another thing: you apparently can't carry much baggage, full gas and four people. It actually works out to where, if you do carry four normal people and full gas, you can only carry about four pounds of baggage. Licensed useful load is 900 pounds.

The *Sedan* should be a good competitive product in today's very active four-place market. Because of its price, and what it gives you for the money, it should hold its own. Prospective purchasers of this particular type of four-place airplane should by all means give this airplane careful consideration.

END

AND THERE I WAS . . .

## TARGET!

**T**YRO gunners were taking their first crack at air-to-air firing at an AF training base. The tow-plane hauled a yellow canvas sleeve, and gunners were marking up excellent scores.

An instructor walked up to a group of students who had just landed:

"How'd the shooting go, men?" he asked. "Swell," answered one of the gunners. "But why was the airplane we were shooting at towing that yellow thing?"

ERIC H. COCKS