



The first Cherokee in front of Piper's Vero Beach factory in early 1961. The man on the wing is not identified.

When
there was...

one

The Cherokee turns 50

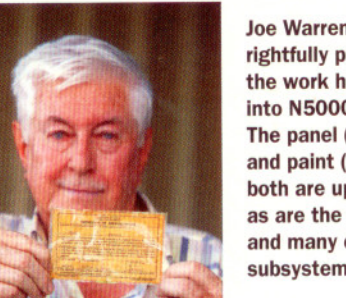
BY IAN J. TWOMBLY

"Replaced right-hand wing, replaced both landing gear assemblies, replaced right-hand flap assembly, replaced right-hand aileron, replaced right-hand fiberglass wing tip assembly." So begins logbook number one for Joseph Warren's 1961 Piper Cherokee.

Warren's logbook wouldn't be remarkable if it were just about that entry. No doubt many of the tens of thousands of Cherokees have had similar unfortunate meetings with the Earth. What makes Warren's Cherokee special is that the repair was signed off by Piper itself before the airplane was ever delivered to a customer. That, and the fact that his airplane is N5000W, the first-ever production Cherokee.



5000

A photograph of Joe Warren, an older man with white hair, wearing a blue and white plaid shirt. He is smiling and holding a small, rectangular yellow card with both hands in front of his chest. The card has some text and a small illustration on it.

Joe Warren is rightfully proud of the work he's put into N5000W (left). The panel (below) and paint (right) both are updated, as are the engine and many of the subsystems.

N5000W rolled out of Piper's then-new factory in Vero Beach, Florida, in February 1961—although *factory* is a term used loosely here. Piper's Vero Beach factory was technically not even finished yet, according to Piper Historian Roger Peperell. Rather, the airplane was made in a development building. Jim Tempel was one of the last people to work on N5000W. Tempel, then 20 years old, and his assembly partner took the cabin—which was on a dolly—and fitted the engine, wheels, wings, door, interior, and pretty much everything else at their station. "When we started, there were two of us at the position," he said. But when Tempel left Piper in 1962, the company was putting out so many airplanes he was only doing the nose cone, spinner, propeller, and cowling.

Under that cowling was a Lycoming O-320 producing 160 horsepower. And this is where things start to get confusing with the Cherokee line. Warren's airplane has a 160-horsepower engine, but the 150-horsepower version was also certificated in 1961. The popular 180-horsepower version was released the next year, and the 235-horsepower model came out the year after that. Finally, in 1964, the 140-horsepower Cherokee was released, initially with only two seats and geared exclusively toward the training market. It never stuck as a two-seater, although Piper's Tomahawk, introduced in 1978, did. "Piper was desperate to compete against the Cessna 150," said Peperell of the early Cherokee design. "They even tried a 115-horsepower engine."





SPECSHEET

Piper Cherokee

Base price: \$9,995

Price as tested: \$35,000

Specifications

Powerplant	Lycoming O320-B2B
Recommended TBO	2,000 hr
Propeller.....	Sensenich 72 inch
Length.....	23 ft 4 in
Height	7 ft 4 in
Wingspan	30 ft
Wing area.....	160 sq ft
Wing loading	13.75 lb/sq ft
Power loading.....	13.75 lb/hp
Seats	4
Empty weight	1,210 lb
Empty weight, as tested	1,237.5 lb
Max gross weight	2,200 lb
Useful load	990 lb
Useful load, as tested.....	962.5 lb
Payload w/full fuel.....	680 lb
Payload w/full fuel, as tested....	660 lb
Fuel capacity, std	50 gal (300 lb)
Oil capacity, ea engine.....	8 qt
Baggage capacity	100 lb

Performance

Takeoff distance, ground roll	700 ft
Takeoff distance over 50-ft obstacle	1,600 ft
Rate of climb, sea level	700 fpm
Cruise speed/endurance w/45-min rsv (fuel consumption, ea engine), 4,000 ft @ 75% power, best economy	112 kt/4.6 hr (54 pph/9 gph)
Service ceiling	15,000 ft
Absolute ceiling	17,500 ft
Landing distance over 50-ft obstacle	540 ft
Landing distance, ground roll	1,095 ft

Limiting and Recommended Airspeeds

V_x (best angle of climb)	64 KIAS
V_y (best rate of climb).....	74 KIAS
V_{FE} (max flap extended).....	100 KIAS
VS_1 (stall, clean)	56 KIAS
V_{SO} (stall, in landing configuration)	48 KIAS

All specifications are based on manufacturer's calculations. All performance figures are based on standard day, standard atmosphere, sea level, gross weight conditions unless otherwise noted.



If these radios are updated, it's hard to imagine what came from the factory. Warren's panel work is tasteful and reminds us of another era in avionics.

The large variety of engine choices was by design from the beginning. Piper had previous success taking a single airframe and bolting on various powerplants. When those options ran out, the company would stretch the airplane, shrink it, add another engine, and so on. By following that family tree, one could argue that Warren's Cherokee is the great-grandfather of more than 51,000 airplanes—and counting. That's so many of the venerable low-wings that they would stretch from New York City to Boston if you lined them up nose to tail.

Incidentally, not included in that number are the actual first Cherokees. The test airplanes, serial numbers 28-01 and 28-03, are now long gone. Peperell said he doesn't know the exact location of 28-01, but it likely ended up in the scrap heap after it had served its purpose. The history of 28-03 is somewhat better known; it was used in the test program for the PA-28-235, meaning it got a new engine and a bigger wing—although it, too, probably ended up as a refrigerator or a case of Coors cans.

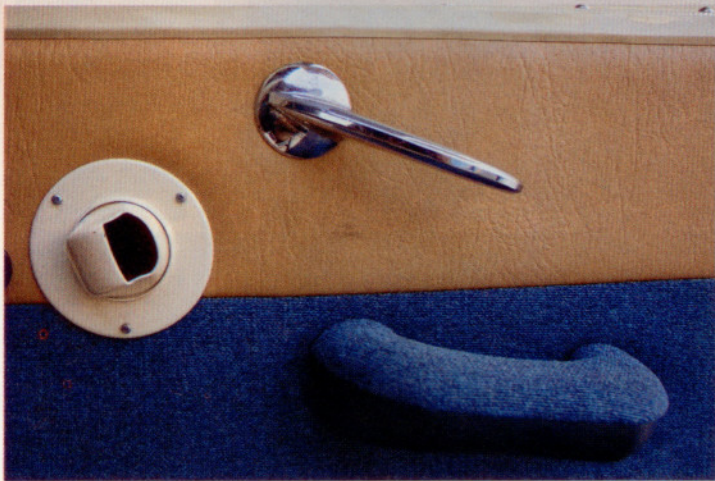
Longtime Georgia girl

Warren's Cherokee has had an unusual path to its current home at the Jimmy

Carter Regional Airport in Americus, Georgia. Even though it was built in February 1961, his PA-28 standard airworthiness certificate wasn't issued until June 1961, meaning this summer marks its golden anniversary. Piper then held on to the airplane, presumably for demonstrations, until February 1962, when it was sold to Parkaire Field Inc. in Marietta, Georgia. This transaction was clearly for a salesman because it was sold the next day to South Expressway Airport, which apparently used it in a flying club or aircraft rental business. Unfortunately, both airports are long gone.

Warren is the airplane's twentieth registered owner, although only 11 or so represent true changes of ownership (not salesmen or a change in partners). Miraculously, none has been outside of Georgia. It's been a humble journey for a humble airplane. And it's further fitting considering the airplane is named for the native inhabitants of the state.

Perhaps the most important owner is the one just prior to Warren, Robert Bynum. Bynum and his estate executors had let the airplane languish in a hangar for more than 15 years when Warren finally saw it. "Rats had gotten in it and eaten the interior," he said. He paid



Small clues in the interior tell of an early Cherokee. The door handle (far left) and low seatbacks (left) were kept for a number of model years later, but the unique latch (below left) and overhead trim crank (below) were dropped soon after.





\$6,500 for it in 1994. That stint in the hangar, as well as Warren's six years of restoration work, means that N5000W is not only the oldest Cherokee you'll ever find, it also likely competes as one with the lowest flight time per year. There are 2,133 hours on the airframe, or only about 42 a year—which says something,

because the airplane passed 1,000 hours in November 1967. That's an average of about 25 hours per year since.

It has spent some time in the shop along the way. In July 1971, the engine mounts and both underside wing skins were replaced, and in 1980 there was extensive wind damage, which prompted

even more repairs. And then there was that initial damage. It remains a mystery. Neither Peperell nor Tempel recall the airplane being damaged. The entry speaks to a landing accident, probably on a demonstration flight. When Piper designed the airplane it set out to build it with fewer parts than other models, which made it easy to work on.

That ease also helped Warren when he was restoring it. The engine overhaul is the most recent major work order. He did much of the work himself under the supervision of his mechanic. Then there was the paint, which he also did. The airplane came apart piece by piece, was taken to his home, painted, and then brought back and bolted on. He redid the interior. He added the outside step and toe brakes (original Cherokees had hand brakes only), and he replaced the side glass, all the hardware, and the control cables. The panel is redone, although not with new and fancy equipment. That's a good thing. If you didn't know any better, you'd think much of it is original. The vertical card compass is a clue, as is the newer radio. The airplane shipped with only a Narco VHT-3 and a Piper PRC-3 ADF. There's now a standard T configuration. All the instruments are

tastefully redone, many of them finds from places such as the Sun 'n Fun Fly-in.

The panel has fun quirks that identify it as an early model. The start is push-button. The trim is the overhead crank variety, which some people hate and others simply love. The door latches via a small lever on the top right, instead of the large, centered clasp. The yokes are the original half-moon style, which are hard to manipulate if you aren't used to them. Warren never installed an intercom, so communication is done without headsets through a handheld microphone and a speaker. The switches are the big, chromed flip-type that make a nice, solid thud when selected. And finally, the throttle and mixture controls are vernier, which is of course quite unlike the more familiar center subpanel console.

There are other minor upgrades from the factory that further solidify the theory that this was a demonstrator. There's a separate baggage door, which Warren says wasn't common in the early airplanes. The fuel tanks are long-range at 50 gallons, compared to 36 gallons for the standard.

Although Warren rebuilt the airplane and now has \$30,000 to \$35,000 in it, he

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wasn't looking for a project. "I wanted a family airplane that was reasonable," he said. And that's exactly what he got. The Cherokee might not be the fastest airplane in the world, and it certainly can't carry the most stuff. But it does exactly what Warren, and thousands of other Cherokee owners, ask. It's reliable, easy to fly, and inexpensive. "I'll have this airplane 'till I die," he said.

"The first year of that Cherokee was quite a hard time for Piper. They had stopped producing the Tri-Pacer in favor of the Cherokee, and it was quite worrying for them," Peperell said. The company was desperate to make a winner and compete with Cessna. There's no doubt Piper engineered a winner. It was an airplane that spawned a massive family that continues today.

It is hard to overstate the impact that the Cherokee has had on aviation. Piper produced more Cherokees that first year than all of its models combined in 2009. And in 1963, when production really

started to ramp up, it produced 770 aircraft—or three-quarters as many piston aircraft as were made worldwide in 2009. Perhaps the biggest measure of its success is with the nonflying public. Along with the Cessna 172 and Piper Cub, the Cherokee is what people imagine when they think of "small" airplanes.

Pilots love Cherokees, and for good reason. They are understated, and honest. Often they are our initial connection to aviation, and our first airplane. They are even the representative low-wing in the perpetual low-wing versus high-wing battle. And they have survived 50 years and counting. Piper's current 180-horsepower Archer—or Cherokee, if you prefer—even comes with training for a pilot certificate if you buy one today. Looks like people will be flying Cherokees for many years to come.

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