

# OUTMODED AVIATION PRACTICES

BY

ALAN MALONE

The pilot ran down the items on the prestart check list. When everything was set, he opened the window of the Cessna 150 and hollered, CLEAR!

Why did he do that?

He then taxied out to the runup area, about a quarter of a mile from the parking pad. After he got clear of the other parked planes, he, moved down a clear taxiway that was lined with flat, solid sod. His instructor had told him to taxi at the pace of a “brisk walk.”

Why had his instructor told him to do that?

Then he maneuvered the aircraft so that it faced into the seven knot wind, in preparation for the “before takeoff” checklist.

Why did he turn the airplane into the wind?

He taxied onto the runway and took off. He then climbed toward the north, flying out over a lake that extended beyond the end of the runway. He maintained runway heading until he reached four hundred feet. By that time, he was way out of gliding distance of land, and would have been committed to a major swim back to the shore, if the rubber band had busted.

Why did he extend his upwind leg so far out over the lake?

Before this flight has really gotten up and running, the pilot has already performed several common rituals, none of which make any sense. His instructor taught him to do these things, and if this pilot ever becomes an instructor, he'll probably tell his students to do the same things. We teach as we were taught. That is an educational truism that applies to all areas of teaching and learning.

I first made sense of the practice of hollering "CLEAR!" the first time I flew an airplane that had a big round engine in front. It sat with its nose way up in the air, and about the only thing I could see from the pilot's seat was a little triangle of land and sky, next to the left edge of the engine cowling. If anyone had been hanging around my propeller, I wouldn't have been able to see them. I might very well have engaged the starter with somebody standing or sitting dangerously close to the prop.

So back in the days of big round-engine airplanes that sat up in three-point attitudes on the ground, it made sense to holler prior to starting the engine. I guess nobody noticed that we now fly planes with little flat engines that sit upright on nosewheels, giving us a clear view of the area we are about to chop to pieces when we start the engine.

In the days of big round engines and blind taxi views, it made sense to "s-turn" while taxiing, in order to keep the path of the airplane in sight. But if anyone ever taxied at a "brisk walk," they'd spend an inordinate amount of time on the taxiway. I mean, how long does it take to walk a quarter of a mile at that pace? About seven or eight minutes, I'd say. When's the last time you spent seven or eight minutes taxiing from the parking area to the runup pad?

My GPS indicates that I usually taxi about 15 miles per hour when I'm out away from obstructions and other aircraft. It would take a pretty good runner even to move at that speed, much less sustain it for fifteen hundred feet or so! So let's get rid of the phrase "brisk walking pace" when we are teaching students to taxi.

Facing into the wind for runup also made sense when you were flying behind one of those big round engines that sometimes had trouble staying cool on the ground. On a hot summer day, I remember having to pull onto the grass and shut down for a few minutes to let the mill on a Cessna 195 I was preparing to fly, cool below redline temperature.

Has anyone noticed? We now fly flat engines that have cowls that have been ingeniously designed to promote air flow on the ground. There's no longer any need to position the airplane facing into the wind to keep the thing cool enough to complete the pre-takeoff checks. It's much more important to position the airplane so that the prop blast is directed away from parked airplanes or others taxiing around us while we're performing our pre-takeoff checks. It's also desirable to pull off to the side so that other airplanes can get around us if they're ready to go. There's no longer any need to face into the wind, and we should discontinue teaching that practice.

The last of these rituals that drive me up the wall is the climb to a certain altitude before turning crosswind. Once again, this one comes from the old days when we were flying 2-seat trainers powered by 65 and 85 horsepower engines. These little birds did not climb very fast on hot summer days, and you had to extend the pattern upwind if you wanted to get to pattern

altitude by the time you reached the high key position, opposite your touchdown point, on the downwind leg. Nowadays we have these mighty 100+ horsepower powerplants that can get us promptly to pattern altitude without breathing very hard. Extending upwind out over open water prolongs the mandatory ditching time, if engine trouble should develop. It also extends the pattern out from the airport, enlarging the noise footprint of airplanes practicing takeoffs and landings, making it more likely that the neighbors might someday vote to make a nice quiet city park where the airport used to be.

Turning crosswind just after clearing the field boundary lessens the time we are committed to a forced landing off the airport, in the event of engine trouble. It also makes us better neighbors to the beleaguered residents of the houses in the vicinity of the airport.

Next time you undertake the training of a new student, take a moment or two to think about the meaning of what you're teaching him to do. And make an effort to eliminate from the curriculum some of the counterproductive practices left over from the old days.