

PIPER PA-44-180 Seminole Model Guide

The PIPER PA-44-180 Seminole is a piston twin-engine airplane. The registry family (PA-44-180 and PA-44-180T) shows up to 4 passengers, up to 157 kt cruise, up to 830 nm range, up to 1700 kg MTOW and up to 17000 ft service ceiling. Those are family maximums, not figures for this variant. Take exact limits from the POH for your serial number.

KEY TAKEAWAYS

- Family data lists up to 4 passengers and up to 830 nm range. Use the POH for this exact airplane's limits.
- Checklist single-engine speeds: Vmc 56 kt, Vyse 88 kt (blue line), Vxse 82 kt.
- Losing one engine costs about 50% of power and roughly 80% of climb performance. The T-tail gives a lesser pitch-down.
- Check the logs for ELT Service Bulletin 1020 and for the alternator replaced under Hartzell Service Letter 050.

HANDBOOK AND APPLICABILITY

The G1000 POH (Report VB-2636) covers serial numbers 4496395, 4496397 and up. It was issued November 3, 2016 and revised February 26, 2021. It is valid only for the airplane named on its title page and must be kept current. It does not cover non-Piper-approved STC installations, so inspect those separately.

ENGINE-OUT PERFORMANCE

The systems packet lists approximate single-engine climb penalties from the Seminole POH: flaps 25° -240 fpm, flaps 40° -275 fpm, windmilling prop -200 fpm, gear extended -250 fpm. Zero sideslip is a 2-3° bank into the operating engine with the ball half deflected. Ask any seller how the airplane flies on one engine.

MAINTENANCE RECORDS TO REVIEW

Service Bulletin 1020 (July 10, 1998) covers ARTEX 110-4 ELT battery packs that may vent acid. Compliance was due within 100 hours, with the ELT bracket checked for corrosion. Hartzell Service Letter 050 approves alternator ES-10024B-6 (24 volt, 100 amp) in place of Piper 651-756, for serial 4496331 and up.

PERFORMANCE

Rotation Speed Kts	75
Short Field Rotation Speed Kts	70
Cruise Climb Speed Kts	105
Normal Landing Speed Kts	80
Short Field Landing Speed Kts	75
Gear Extended Climb Loss Fpm	250
Windmilling Prop Climb Loss Fpm	200

V-SPEEDS

Vmc Kts	56
Vyse Kts	88
Vxse Kts	82
Vso Kts	55
Vs1 Kts	57
Vfe Kts	111
Vle Kts	140
Vne Kts	202

SAFETY NOTES

- After emergency landing gear extension, do not move any gear controls or reset circuit breakers until the airplane is on jacks.
- One checklist says to feather and secure a failed engine below 2000 ft AGL and troubleshoot above it. Confirm against the POH.
- The two checklists disagree on Vno (169 kt vs 129 kt), so confirm it in the POH.