

Learjet 35/36

Enduring classics

BY ROBERT A. SEARLES

THE LEARJET 35 AND 36 are stretched, turbofan-powered successors to the largest of the original turbojet-powered Learjets, the Model 25. The Garrett AiResearch TFE731-powered aircraft, which were introduced in the mid-1970s, are among the most popular light business jets ever built, and hundreds remain in service today.

Originally, Learjet simply planned to add the quieter and more fuel-efficient TFE731 turbofans to the Learjet 25 to create the Learjet 26. However, the engine change made it necessary to alter the airframe, so a 13-inch plug was inserted in the forward fuselage, and the wings were extended two feet on each side. The prototype Learjet 35 made its inaugural flight in August 1973, and the eight-passenger transcontinental jet won FAA certification in July 1974. Deliveries began later that year. The Learjet 36, which had the same gross weight as the Model 35, offered transatlantic range but could carry only six passengers.

Numerous improvements were made to the aircraft during its long production run. The first major change was the introduction in 1976 of the Learjet 35A and 36A, which featured upgraded TFE731-2B engines, increased fuel capacity, and extended range. Also, the Century III wing modification package improved low-speed handling, reduced stall speeds, and shortened runway requirements. Almost all earlier models were retrofitted with the Century III mod.

In 1979, Learjet developed the SoftFlite wing modification that further improved handling characteristics. In addition, a mod to increase gross weight to 18,300 pounds and landing weight to 15,300 pounds was offered. These improvements also were available for retrofit.

Third parties have developed numerous performance-enhancing modifications for the Learjet 35/36. Among the most popular is Raisbeck Engineering's ZR Lite conversion, a package of aerodynamic enhancements that improves airport performance, as well as takeoff, cruise, and descent capabilities. Raisbeck also offers an aft fuselage locker that enhances aerodynamics and provides a baggage compartment that can be accessed externally. Two other popular mods—delta fins to improve handling and tip tanks to extend range—are provided by Avcon Industries. Also, Honeywell's -2C engine upgrade kit improves powerplant reliability and durability.

Numerous service providers have developed retrofits that enable the Learjet 35A/36A to comply with reduced vertical separation minimum and terrain awareness and warning system mandates. Third parties also have installed new avionics, such as the Universal EFI-890R or Garmin GTN 750 systems.

Special-mission Learjet 35s and 36s have performed reconnaissance, maritime patrol, and electronic warfare duties, but the most notable

SPEC SHEET

Learjet 35A

Engines | **Two Garrett/AlliedSignal/Honeywell TFE731-2B turbofans, 3,500 lbst**

Seats | **up to 10**

Max takeoff weight | **18,300 lbs**

Cruise speed | **440 kts**

Balanced field length | **4,224 ft**

Range (with IFR reserves) | **2,196 nm**

Wingspan | **39 ft, 6 in**

Length | **48 ft, 6 in**

Height | **12 ft, 3 in**



LEARJET 35

military application was as a utility transport for the U.S. Air Force. In 1984 and 1985 the service took delivery of 84 Learjet 35As (designated C-21A).

According to *Vref*, a total of 737 Learjet 35/36s were built between 1973 and 1994, and 381 remain on the U.S. registry. An early model (1974) Learjet 35 can cost as little as \$400,000, while the asking price for a late-model (1993) Model 35A is approximately \$1.6 million. Prices for Learjet 36s are slightly lower than Learjet 35s in the same model years. **AOPA**

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