

# 747-200/-300 values & aftermarket activity

Values of most 747-200s/-300s are less than \$10 million. Low-time aircraft can provide airlines with low-cost high capacity for up to 10 years. ¶

Values of most 747-200s have now fallen to scrap level. That is, the intrinsic value of an aircraft is directly related the market value of its engines and any salvage value that can be derived from its rotables. The aircraft that have values better than scrap are the youngest -200Fs built in the late 1980s, 1990 and 1991 that are powered by the JT9D-7R4G2 and CF6-50E2, as well as -300s with the same engines that have accumulated less 80,000 flight hours (FH) and 15,000 flight cycles (FC).

The poor value of the majority of aircraft is explained by several reasons. The first is that the age of the youngest aircraft is 18 years, while some are up to 30 years old. The implications of this are that aircraft fall into two categories. The first are those that have completed their Section 41 modifications, but have also surpassed their D4 or D5 check. The implications of this are that these aircraft are most likely to be retired when they reach their next D check, because of escalating maintenance costs.

The second group is aircraft that have not completed their Section 41 modifications. While these will be

relatively young, the \$1.5 million cost of completing the Section 41 modification will present a high cost barrier when the 20,000FC threshold is reached. Most aircraft that fall into this category are 15-20 years old and have accumulated 12,000-17,500FC. They will thus reach the threshold for Section 41 modification termination in the next three to 10 years. The timing of this threshold will coincide with a D check for some aircraft, and the two can total up to \$7.5 million. During this same period less maintenance-intensive 747-400s will come onto the market and so operators will favour younger aircraft.

No more of the remaining passenger-configured or Combi 747-200s and -300s are being converted to freighter. This is because of high on-going maintenance costs, the cost of conversion being up to \$16 million, the likelihood that to continue in operation aircraft will probably require more avionic upgrades, and the useful remaining life of most aircraft being less than 10 years.

There is thus little or no market demand for used 747-200s/-300s, resulting in a collapse in values.

The demand for good quality 747-

200SFs remains strong, however. All good quality aircraft are flying. This is a result of a rebound in freight traffic, with volumes back at pre-9/11 levels.

This has pushed lease rates for 747-200Fs/-200SFs back up to about \$350,000 per month. The aircraft, however, have high maintenance costs in the region of \$2,800-2,900 per FH. This compares to total maintenance costs in the region of \$1,600 per FH for the 747-400. The 747-400SF also has a payload capacity of about 253,000lbs, which compares to 190,000-230,000lbs for the 747-200SF. Operators of 747-200SFs are thus using the aircraft as a stop gap until 747-400s get converted in large enough numbers to provide replacements.

The 747-200SF provides low-risk capacity for start-up freight operators. Cargo 360 based in Seattle, Washington and Focus Air Cargo, based in Miami Florida are both commencing operations with 747-200SFs.

A few 747-200s and -300s have been acquired by passenger carriers. Aircraft that can operate for another five to eight or nine years before requiring heavy maintenance provide cheap lift for the large payload they provide. Better quality and younger -200s and -300s have a market value in the region of \$8-12 million. Although a large range of recent avionics modifications are only mandatory in Europe and North America, most aircraft around the world will have had these incorporated because of the long-distance nature of their operations. Most large one-off maintenance or upgrade costs can thus be avoided with these aircraft. These -200s and -300s can provide capacity at a low total cost until used 747-400s start coming onto the market. [AC](#)

*There are few low-time, high specification aircraft available, but if operators can acquire them these aircraft will provide low cost capacity for up to another 10 years. Despite high maintenance costs, low capital costs and lease rates mean total operating costs are low.*

