



TAPE BACKUP DEVICE

EXCLUSIVE

Sony StorStation AITi520S

PRICE £2,044 exc VAT

BASIC WARRANTY 3yrs NBD swap

INTERNET www.sonyisstorage.com

SUPPLIER Sony 01932 816000

VERDICT **DDS beware, as the fourth generation of AIT delivers on all counts with excellent performance, a high storage capacity, good value and still two more generations to go.**

Sony's AIT format has been around longer than virtually all other backup tape formats. But it's also unique in that not only have six generations always been on the drawing board, but each has so far been delivered on time. The latest StorStation continues this admirable tradition as the AIT-4 format comes in on schedule and raises the bar by also giving Sony a foothold in the mid-range backup market. A native storage capacity of 200GB puts it on a level pegging with HP's Ultrium LTO-2, while a quoted native performance of 24MB/sec makes it 50 per cent faster than Quantum's SDLT320.

Along with these impressive performance figures, AIT uses ADLC (adaptive lossless data compression), which gives a higher compression ratio of 2.6:1, allowing AIT-4 to offer a maximum compressed capacity of 520GB. Unlike Quantum's ValueSmart format, backward compatibility hasn't been forgotten either, as AIT-4 drives can read and write to AIT-3 cartridges and read both AIT-2 and AIT-1. Helical scanning is still the preferred recording technology, and the StorStation uses compact 8mm AME (advanced metal evaporated) tapes. Capacity has been boosted over AIT-3 by increasing the recording bit density and lengthening the tape, while speed improvements have come about mainly due to an increased drum rotation of 8,506rpm – about 40 per cent faster than AIT-3.

The AIT cartridge uses a feature called MIC (Memory-In-Cassette), which consists of an internal 8KB flash memory chip. The main function of MIC is to reduce the time spent searching for data, as it stores information that's normally found on the first segments of the tape. It now finds a new role as Sony will be offering WORM (write once, read many) versions of its AIT-4 media, which aims to provide a more cost-effective alternative to optical solutions for data archiving. MIC will be used to prevent cartridges being formatted or overwritten and data from being deleted, but will also allow new data to be appended to any unused parts of the tape.

Naturally, along with the internal SCSI model on review Sony will be offering an external version. But it will make an internal ATAPI version available as well. Build quality of these compact 5.25in form-factor drives is good, and the AITi520S has a small heatsink at the rear coupled with an external fan. Dust protection is provided at the front, although this comprises nothing more than a simple spring-loaded cover.



The HP Ultrium LTO460 gets its marching orders from our A List thanks to Sony's fast, high-capacity AITi520S.

Sony clearly delivers on its performance promises too. The AITi520S returned excellent results in tests carried out on a dual 1.7GHz Xeon server equipped with 1GB of RAM, an Ultra320 hard disk subsystem and running Windows Server 2003. Using Computer Associates ARCserve for Windows 11 and 8.5GB of test data it returned 1,435MB/min and

1,439MB/min respectively for backup and verification tasks.

A full restoration of the test data delivered an even more impressive 1,368MB/min – a better read performance than even the previously A-Listed HP Ultrium LTO460.

Sony has been promoting AIT as the ideal alternative for DDS, and the

StorStation AITi520S strengthens its case even more as the format now covers the entire spectrum of SME-level backup. This latest generation delivers on all the performance and capacity promises, and Sony still has two more generations to go, which should take AIT to the end of this decade.

DAVE MITCHELL

PC PRO RATINGS

PERFORMANCE	★★★★★
FEATURES & DESIGN	★★★★★
VALUE FOR MONEY	★★★★★
OVERALL	★★★★★

SPECIFICATIONS Internal AIT-4 tape drive; native capacity 200GB; quoted native transfer rate 24MB/sec; Ultra160 Wide SCSI LVD/SE interface; 96MB buffer; AIT-4 cartridges, £42 each.