

Compaq's New Storage Offering Aims for the 'Enterprise'

Josh Krischer, Robert E. Passmore

The new high-end Enterprise Virtual Array helps Compaq Computer retain leadership in modular system storage. New controller-based features will also help "Enterprise" compete against high-end storage subsystems.

NEWS ANALYSIS

Event

On 22 October 2001, Compaq Computer announced the availability of its Enterprise Virtual Array for the StorageWorks family.

Analysis

The Enterprise hardware architecture resembles earlier versions of StorageWorks or other modular subsystems. It features:

- 36- or 72-Gbyte Seagate "Cheetah" disk drives with dual Fibre Channel active/active ports
- Three single rack-bay models
- Maximum raw capacity of 12.3 Tbytes

Enterprise supports the Compaq, Microsoft and Sun Solaris platforms, and will likely provide additional platform support by 2Q02. The subsystem also supports standard features, such as redundant power supplies and dual controllers with mirrored write cache (battery protected). Data Replication Manager remote copy functions, however, will likely not be available until 3Q02 (0.8 probability).

Compaq's measurements show significant improvements in performance compared to the StorageWorks Enterprise Modular Array 12000. The improvements come from faster microprocessors, larger cache, faster drives, and faster host and drive interfaces. Each controller supports two 2-Gbps host attachments, which, in turn, support 1-Gbps connections.

But Enterprise contributes the bulk of its new functions through virtualization at the storage system level — a different approach to organizing, protecting and creating volumes. Enterprise eliminates the boundaries between redundant array of independent disk (RAID) sets and forms all the disks into one virtual pool. The virtualization improves the storage management; the storage manager sees only virtual disks, which it can allocate and expand dynamically. The virtualization allows Compaq to deploy innovative data replication techniques.

The nickname "Enterprise" — and other announcement information — suggests that Compaq intends for this product to compete head-on in storage area networks (SANs) with monolithic enterprise subsystems. Compaq will price the product 20 percent to 25 percent above previously released StorageWorks subsystems. In Gartner's view, Enterprise is on the leading edge of the modular subsystems, can win some market share from the monolithic subsystems but still cannot be classified as a full-function enterprise system.

Enterprise offers a number of new controller-based features, and will provide intense competition to the high-end subsystems, and — in particular — in the SAN market. Enterprises should remember that this product contains a considerable amount of new software, so they should use appropriate caution until its reliability is proved. Enterprises should seek investment protection guarantees to offset the uncertainties spawned by Compaq's proposed merger with Hewlett-Packard.

Analytical Sources: Josh Krischer and Robert Passmore, Storage Technologies, Operations & Resources

REGIONAL HEADQUARTERS

Corporate Headquarters
56 Top Gallant Road
Stamford, CT 06902-7700
U.S.A.
+1 203 964 0096

European Headquarters
Tamesis
The Glanty
Egham
Surrey, TW20 9AW
UNITED KINGDOM
+44 1784 431611

Asia/Pacific Headquarters
Level 7, 40 Miller Street
North Sydney
New South Wales 2060
AUSTRALIA
+61 2 9459 4600

Latin America Headquarters
Av. das Nações Unidas 12.551
9 andar—WTC
04578-903 São Paulo SP
BRAZIL
+55 11 3443 1509