



ETERNUS CS800 data protection appliance featuring deduplication to protect your unique data



Just for a moment imagine your daily business from a different perspective

We lift you up where you belong

Forget the constraints in handling your daily business: making computing power available, providing enough storage capacity, and ensuring the whole environment is protected against awkward daily and force majeure risks. Your IT environment needs a guardian angel to ensure smooth backup.

The invisible touch

Imagine not having any backup problems at all – having an innovative device that keeps all your data protected automatically. Additionally, this device transparently manages backup, saving time and reducing the effort of creating copies of data and moving them to a vault. Even when your data is growing quickly this device keeps pace with the required capacity requirements.

Less is more

The secret? This device efficiently recognizes and protects only your unique data. This is what deduplication is all about. Your backup now only consists of unique data elements and the architecture plan describing how they are related. The result: lower costs, reduced capacity and less bandwidth needs.

Wake up and now look at the facts

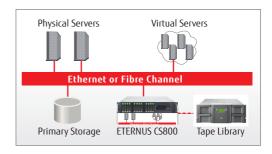
We make your dreams come true with our easy and affordable solution out of our Efficient Data Protection offering.

Efficient data protection featuring deduplication

For many IT departments, traditional backup has not kept up with the need for faster performance and trouble-free restore. Disk-to-disk systems which increase backup speed and reliability fill up too quickly, hold too few recovery points and do not offer a practical disaster recovery solution. Companies with distributed sites face extra challenges providing reliable backups for these locations.

Fujitsu offers therefore an outstanding building block in its comprehensive Efficient Data Protection portfolio for mid-range and large enterprise environments. This broad portfolio combines products, solutions and services with future-ready technologies to deliver the best and most efficient way of keeping data protected.

Fujitsu ETERNUS CS800 is a turnkey data protection appliance with deduplication. It provides a simple and affordable solution for customers who follow a disk backup strategy. Its disk-to-disk speed and deduplication technology runs over a NAS (Network Attached Storage) interface or a VTL (Virtual Tape Library) interface. This makes it easy to use with all leading backup applications and simple to share between different servers in any Ethernet or Fibre Channel environment. The advanced deduplication technology of ETERNUS CS800 reduces typical capacity requirements up to 95% to reduce costs. It also enables easy backups for VMware environments.



For disaster recovery, backup data is replicated between sites using global deduplication to reduce typical network bandwidth needs by a factor of 20 or more. For long-term data retention an additional Path-to-Tape option is available to write data directly from ETERNUS CS800 to tape. The overall result leads to an improved data protection that leverages customers' infrastructures for fast return on investment.

Solution description and benefits

Deduplication reduces disk capacities

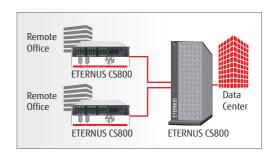
Conventional disk backup fills up rapidly, increasing costs and forcing users to migrate or expire data. The Fujitsu ETERNUS CS800 data protection appliance is designed specifically to provide a disk backup solution by making the most advanced deduplication technology both affordable and easy to use.

Fujitsu ETERNUS CS800 deduplication technology dramatically reduces disk capacity requirements by using small reference pointers to replace the redundant data blocks inside backup files. This technology makes disk backup more affordable and lengthens retention time through deduplicated data storage. Fujitsu offers right-sized units for all capacity requirements. These are seamlessly scalable across a wide range of capacities and simplify consolidation efforts.

Improved and automated disaster protection

Disaster protection for distributed sites is vital. Managing removable media across multiple remote sites is expensive, time consuming, and error-prone. Traditional disk-to-disk systems don't offer an effective solution since backup volumes are too large to allow replication for most users. The Fujitsu ETERNUS CS800 deduplication technology makes remote replication a practical and cost effective tool for disaster protection by dramatically reducing the bandwidth required to move backup data over networks. Offsite copies of backups are created automatically and copied to central data centers, letting users reduce or eliminate the need to manage removable media.

The Fujitsu ETERNUS CS800 makes replication an easy, lights-out background operation that automatically includes advanced features such as global deduplication and encryption of transmitted data. Its fully integrated Path-to-Tape support writes data directly from ETERNUS CS800 to tape as part of an application-aware process.



Reduce disk needs for backup of virtual environments

Virtual environments create unique data protection problems since the fact that backup volumes are increased because redundant operating system and application data is spread across many virtual servers.

The deduplication with Fujitsu ETERNUS CS800 dramatically reduces disk use in virtual environments – typical data reduction results up to 95% – and its replication capability provides automated disaster protection.

Path-to-Tape for long-term tetention

For environments that need an optimal combination of short-term backup/restore performance and economical long-term data retention, Fujitsu ETERNUS CS800 offers the Path-to-Tape option. This integrated functionality writes backup data directly from ETERNUS CS800 to an attached tape library, without additional data transfers through the backup server.

Support for Symantec OpenStorage

The ETERNUS CS800 support for Symantec and its OpenStorage API (OST) allows customers to set policies in NetBackup and Backup Exec that initiate copying data between different sites. The actual data movement, however, instead of going through the media servers, is sent directly from one ETERNUS CS800 system to another. In the case of NetBackup, creating physical tape directly from the ETERNUS CS800 to a tape library is also supported. With OST users have all the advantages of the deduplication, replication, and direct tape links, but they control the entire process simply and automatically from their backup application which also provides a central catalog for all the data.

FUIITSU ETERNUS CS800 lowers costs

Deduplication typically reduces the disk needed to store backup data by up to 95% also reduces typical network bandwidth needs by a factor of 20 or more for replication. The ETERNUS CS800 allows IT departments to cost effectively retain backups on disk for extended periods. This provides faster restores and increased recovery points, giving return on user investment for the widest variety of data on both physical and virtual servers. The high rates of savings is accomplished through reduced offsite vaulting costs, lower media purchase expenses and less time and effort in managing backup.

Deduplication featuring dynamism

A business which has to respond flexibly to fast-changing conditions needs dynamic infrastructures. They enable customers to assign system resources dynamically to applications and services as required. Within Fujitsu's Dynamic Infrastructures portfolio we deliver a comprehensive offering of products, solutions and services which enables customers to retain agility and business advantage.

Fujitsu ETERNUS CS800 is designed to smoothly integrate into dynamic infrastructures and is certified with all leading backup software, allowing users to solve their backup problems easily and economically without changing their existing architectures or procedures.

The following scenarios are ideal for the FUJITSU ETERNUS CS800 data protection appliance:

- Fujitsu ETERNUS CS800 as a stand-alone appliance with the Path-to-Tape feature
- Two Fujitsu ETERNUS CS800 with active-active replication against loss of data
- Fujitsu ETERNUS CS800 in branch offices in combination with a central located ETERNUS CS800 to consolidate disaster recovery requirements
- Fujitsu ETERNUS CS800 as replication target for the Fujitsu ETERNUS CS High End deduplication option.

For large data center requirements Fujitsu offers deduplication capabilities also for the ETERNUS CS High End data protection appliance. The proven enterprise-class Fujitsu ETERNUS CS High End for intelligent data protection is the most successful infrastructure solution from Fujitsu and already protects many of the largest data centers worldwide. The data deduplication option is also available for already installed ETERNUS CS High End systems.

Advantages at a glance

Data protection issues	ETERNUS CS800 solution
Challenging backup and recovery windows	Disk performance and reliability
Capacity limitations	Typically, deduplication reduces disk need by up to 95%
Rapid data growth	Easy on-site scalability
Offsite security and disaster recovery	Encrypted replication, reduced removable media
Backup for distributed sites	Multi-site backup, replication to central data centre
Backup for virtual servers	Perfect for VMware environments
Backup policies management	Support for Symantec OpenStorage API (OST)
High backup costs	Reduced capacity needs and reduced media use
Deploy and operate	Suitable in Dynamic Infrastructures



Efficient Data Protection

▶ ts.fujitsu.com/data_protection

ETERNUS CS

► ts.fujitsu.com/eternus_cs

Published by

Fujitsu Technology Solutions GmbH

Mies-van-der-Rohe-Str. 8, D-80807 München Copyright: © 2011 Fujitsu Technology Solutions GmbH, Printed in Germany, Contact: ts.fujitsu.com/contact

All rights reserved, including intellectual property rights. Technical data subject to modifications and delivery subject to availability. Any liability that the data and illustrations are complete, actual or correct is excluded. Designations may be trademarks and/or copyrights of the respective manufacturer, the use of which by third parties for their own purposes may infringe the rights of such owner. For further information see ts.fujitsu.com/terms_of_use.html