



**HITACHI**  
DATA SYSTEMS



Hitachi Resource Manager™  
Utility Package for TagmaStore™  
Universal Storage Platform and  
Network Storage Controller

Partner Beyond Technology





# Hitachi Resource Manager™ Utility Package for TagmaStore™ Universal Storage Platform and Network Storage Controller

With a closely integrated set of software features, Hitachi Resource Manager utility package enables you to manage and optimize your Universal Storage Platform or Network Storage Controller.

## Hitachi Resource Manager Utility Package—Take Full Advantage of the Power of Your Storage System

The Hitachi Resource Manager™ utility package for TagmaStore™ Universal Storage Platform and Network Storage Controller provides essential functions for the management and optimization of individual Hitachi storage systems in open systems and mainframe environments. It provides both a Web-accessible graphical management interface and a command line interface (CLI), and it contains an advanced set of tools for third-party application integration.

## Benefits

### Manage Your Hitachi Storage System Easily

- :: Simplifies storage visualization and allocation with an easy-to-use graphical interface
- :: Runs locally or remotely via secure HTTP access
- :: Enables efficient deployment of storage resources to meet business and application needs

### Share Consolidated Storage Securely

- :: Lets you safeguard your information by restricting storage access at the port level and providing secure domains for application-specific data
- :: Enables tamperproof long-term data retention—through a virtual, “write once, read many” (WORM), storage system-based capability—for regulatory compliance and supports data shredding at the end of the retention period

### Optimize Physical Disk Use for Cost Savings

- :: Provides an immediate view of available storage and current usage
- :: Allows tailoring of LUN size to match exactly fixed data for improved capacity utilization and performance

### Optimize Overall Storage System Performance

- :: Allows workload balancing, deep analysis, and troubleshooting of performance problems
- :: Accelerates application performance by locking key data into cache in real time
- :: Allows tuning to minimize unnecessary I/Os, logical device contention, and operating system queuing

### Intermix Mainframe and Open Systems Storage

- :: Allows storage system configuration for mixed Microsoft, UNIX, Linux, and mainframe environments, simplifying administrative work and enabling storage consolidation

### Integrate with Enterprise Management Systems

- :: Uses industry-standard interfaces to make Hitachi storage systems visible to enterprise management systems such as HP OpenView, IBM Tivoli, and CA-UniCenter

### Integrate and Enhance Applications

- :: Enables serverless backup (direct from storage to backup device) to help shorten backup windows without overloading the server or network
- :: Includes advanced storage interface support for Oracle databases, Microsoft SQL Server and Exchange, and others

## Hitachi Utilities for Open Systems, Mainframe, or Both

■ Open Systems ■ Mainframe ■ Both

- :: **Storage Navigator** shows system configuration and status information, and it sends administrative commands to the Universal Storage Platform and Network Storage Controller.
- :: **LUN Manager** lets you define, configure, add, delete, revise and reassign LUNs to specific paths without having to re-boot your system. LUN Manager can assign multiple paths to a single LUN, providing the necessary infrastructure to support alternative path failover, path load balancing, and clustered servers.
- :: **Logical Unit Size Expansion** allows LUN expansion by creating virtual expandable LUs out of groups of physical ones.
- :: **Virtual LVI/LUN Manager, also called Customized Volume Size**, lets you create custom-sized logical volumes. It enables better utilization of the storage system's physical capacity and boosts remote copy performance by eliminating the need to copy large volumes of partially used information.
- :: **SANtinel™ port security software** and **Volume Security Port Option** help ensure security in SAN environments by denying access to unauthorized users at the port level.
- :: **Cache Residency Manager** and **Cache Management Host Agent** allow users to "lock" and "unlock" data into cache in real time to optimize access to your most frequently accessed data.
- :: **Performance Monitor** provides an intuitive, graphical interface to assist you with performance management information in capacity and configuration planning, workload balancing, and analyzing and optimizing storage system performance.
- :: **Data Retention Utility for Open Systems and IBM® z/OS®** provides virtual disk-based WORM capability. You can make archived data, non-erasable and non-rewritable for prescribed periods, facilitating regulatory compliance.
- :: **Volume Shredder** enables the shredding of sensitive data once the prescribed retention period ends.

## Hitachi leads the industry with advanced capabilities New to Resource Manager Utility Package: Hitachi Data Retention Utility and Volume Shredder Software

By enabling customers to lock down archived data to make it non-erasable and non-rewritable, the Hitachi Data Retention Utility protects sensitive information and helps to facilitate compliance with government and industry regulations. Correspondingly, Hitachi Volume Shredder software can securely erase data after the retention period expires to protect sensitive information.

- :: **Volume Shadow Copy Service (VSS)** hardware provider supports direct storage system-based point-in-time copies for Microsoft VSS-enabled applications using the Hitachi ShadowImage™ Heterogeneous In-System Replication or the Hitachi TrueCopy™ Heterogeneous Remote Replication software bundle.
- :: **SNMP Agent** provides MIBs that enable the reporting of status and alerts to enterprise management systems.
- :: **NDMP Agent** supports the open standard Network Data Management Protocol for enterprise-wide backup of heterogeneous, network attached storage.
- :: **Serverless Backup Enabler** manages backup data movement directly from disk to tape without impacting server or LAN resources via the SCSI-3 Extended Copy standards in conjunction with host-based backup software, such as VERITAS NetBackup.
- :: **Database Validator** is a solution developed by Hitachi that integrates with Oracle H.A.R.D. technology to ensure that corrupt data is never written to disk, supporting a higher level of data integrity.

## System Requirements and Support Matrix

<http://www.hds.com/go/hicommandrequirements>

## Complementary Solutions

### Hitachi HiCommand® Device Manager Software

Providing centralized, advanced management of multiple Hitachi and Sun StorEdge 9900/9990 series storage systems in distributed environments, this software helps manage higher-level functions such as replication configuration and is the storage "pool" manager and prerequisite for many advanced functions in Hitachi storage systems. Device Manager software adds to Resource Manager capabilities by provisioning the whole path (servers and storage systems), and as the SMI-S provider, it allows Hitachi storage system management via standards-based tools such as Hitachi HiCommand Storage Services Manager software.

### Hitachi HiCommand Storage Services Manager Software

Extending storage management capabilities in heterogeneous SAN environments, this software auto-discovers your multivendor storage infrastructure and illuminates the path from each application through the storage area network to the storage system, while providing end-to-end monitoring, reporting, management, and automation capabilities.

### Hitachi HiCommand Tuning Manager Software

Monitoring Hitachi storage system capacity and performance metrics from the application to the storage device, Tuning Manager software enables storage environment tuning and management of storage growth.

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