



SPECIFICATION: NORTHERN STORAGE SUITE

In your hand is a complete description of all the features and functionality included in Northern Storage Suite - the market leading User Data Management solution. The functionality in Northern Storage Suite has made the solution the number one choice of some of the world's most demanding organisations. Find out why.



NORTHERN STORAGE SUITE

USER DATA MANAGEMENT

Northern Storage Suite is a software solution that resolves the technical and managerial issues associated with storing user-generated data.

Northern Storage Suite's interface consists of four workspaces; Quota Server, Storage Reporter, Storage Portal and Storage Chargeback. Each of these workspaces is designed to help you tackle specific storage management goals in the best possible way.

Below you can find a complete list of all the features offered within Northern Storage Suite.

■ NSS: QUOTA SERVER

Advanced quantity control policies allow you to minimize usage and growth rates:

- Unicode Support - Increased support for environments that concurrently use multiple character sets
- Notify offender – quota notifications to the single individual who most recently wrote into the quota path [available for EMC Celerra/VNX and Netapp FAS]
- Notify last writers – quota notifications to last X number of users who most recently wrote into the quota path [available for EMC Celerra/VNX and Netapp FAS]
- Automatic deployment of user quotas with filtering according to group membership
- High performance NAS quotas – a cached fast access list of file sizes ensures zero impact on NAS performance
- Hybrid EMC Celerra quotas – advanced asynchronous monitoring and synchronous locking guarantees a secure quota policy and maximizes filer performance
- Hybrid NetApp NAS quotas – asynchronous monitoring and synchronous locking warrants a secure quota policy and preserves filer performance
- User-based quotas – set quotas on individual user accounts [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN]
- Directory and object level quotas – set quotas on all levels of file structure
- User exclusion – lift quota restrictions for specific users within a quota [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN]
- Path exclusion – lift quota restrictions for specific paths within a quota [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN]
- Exchange quotas – set quotas on individual exchange mailboxes
- Group-based quotas – make quota settings dependant on a users Primary Group membership [available for Windows, Windows Cluster and SAN]
- HSM quotas - calculate quotas using physical file sizes
- Real-Time Quota and File Block editing - add, remove or edit paths lie in both quota and file block policies
- Set quota wizard – a more efficient tool for designing and implementing quota policies
- Smart quota columns – pick up Active directory data in the quota view for mass and micro management
- Automated user quotas – create a template quota that automatically controls all existing and any new users [available for Windows, Windows Cluster and SAN]
- Automated directory quotas – create a template quota that automatically controls all existing and any new directories
- Asynchronous quota monitoring – user and device activity are not stalled by quota processes
- Real-time quota controls – quotas are evaluated, displayed and enforced in real-time
- Hard quotas – allow users to edit and save existing files, only save open files or save no files at all
- Hard exchange quotas – lock mailboxes or just stop the possibility to send mail
- Soft quotas – encourage compliance with notifications only
- Active quotas – execute programs at quota thresholds to take remedial action when a quota is exceeded
- Trigger notifications at usage intervals – send emails and popup messages at thresholds of quota usage
- Customizable notification templates – localize quota notification templates to suit your specific needs

Content control policies allow you to prohibit unwanted file types:

- Notification on file block policies - customizable e-mail notifications to users who attempt to save prohibited files
- File type blocking – do not allow users to store specific file types [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN]
- File type group blocking – mass-prohibit music, movie or program files [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN]
- File Allow - specify a list of file types that can be saved into a path and deny all other content [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN]
- File level quotas - allow jpgs to be saved into a path but set a hard limit on the data footprint of these files [available for Windows, Windows Cluster, and SAN]
- Efficient file block – real-time scanning at file extension level [available for Windows, Windows Cluster, EMC Celerra, NetApp NAS and SAN], binary-level scanning performed in a scheduled report

Advanced quota management to achieve specific results:

- Customizable quota workspaces – edit existing or create new workspaces, include or exclude columns, filter, subtotal and group
- Delegate permissions – allow user groups controlled access to manage certain aspects of the quota policy
- Storing quota settings – quota configurations can be stored in the local registry, in MS SQL or in Active Directory
- Command-line tools – utilities offer straightforward integration into batch operations
- Custom quota labels – label quotas for quick recognition and mass-management
- Automated notification setup – use LDAP queries and custom variables to automate notification configuration

■ NSS: STORAGE REPORTER

Information-rich drill-down interface shows general storage status:

- General status – view status at enterprise, host group, host and path levels
- Distribution across data types – view usage by file type group and individual file type
- Distribution across users – view usage by user
- Distribution across file age - view percentages of seldom used or modified files per host, volume, share, and user
- History of usage – view history graphs for host group, host and path levels

- History of file type content – view history graphs for file type group and file type levels
- History of user levels – view history graphs for individual users
- Projected usage – view projected usage for host group, host and path levels
- Projected file type content – view projected file type group and file type levels
- Projected user levels – view projected usage by user
- Largest files – view largest files at host and path levels
- Oldest files – view oldest files at host and path levels
- Disk and I/O performance data – identify weakening devices
- Dynamic reporting interface - customize interface to display particular sets of data, interface memorizes your preferences
- Customizable graphical displays – choose to display data as column chart, pie chart, a plain list or as icons
- Export to MS Excel – export any data shown in the interface to Excel

Comprehensive scheduled reports reveal specific details of your storage environment:

- File size – list all files above a certain threshold
- File accessed date – list all files that haven't been accessed since a certain date
- File modification date – show all files that haven't been modified since a certain date
- File creation date – report on all files that were created before, after or on a certain date
- File type – list all files of a specific type, using file extension or header data
- File backup status – show all files that have their backup attribute set or not set
- Files containing hidden streams – report on files that contain hidden streams
- File type growth rates – show the file types that have grown the most during a specific time period
- File duplicity – identify true duplicate files by matching file content, not just name and size
- Folder size – see the usage per folder
- Folder size per user – see the usage of every folder per user
- Folder size per file type – see the usage of every folder per file type

- User accounts – list all files owned by a specific user
- User accounts that are obsolete – report on all files owned by obsolete accounts
- Users that consume the most space – list the top users within your environment
- User growth rates – show users with the fastest growing space consumption
- Host forecasts – which hosts will reach a dangerous level of usage on a specific date
- Path forecasts – which paths will reach a dangerous level of usage on a specific date
- Quota report – easily see all the quotas above or below a certain size
- HSM report - displays logical and physical usage
- Export to Excel – report output to blank work books or customizable templates
- Graphical report output – inline graphs for clearer communication
- Grouped report output – group raw data straight in the report

■ NSS: STORAGE PORTAL

User-focussed storage portal makes users responsible for the data they own:

- Storage quota integration – portal reports scan quota paths and are provided through quota threshold notifications
- User specific reports – individual storage reports offer users the tools they need to manage their own storage use
- Interactive reports – users can open, move or delete files or groups of files from directly within these reports
- Quota status report – displaying the users current quota status
- File age report – provide users with a interactive report listing their oldest files
- File size report – provide users with an interactive report of their largest files
- Media file report – provide users with an interactive report showing their true media files, a report generated by a binary level scan
- Duplicate file report – provide users with a list of their true duplicate files, a list generated by a binary level scan and pattern matching
- Files owned by others report – show users all files owned by other accounts that are stored within the path of their storage quota

Controlled growth rates and decreased administrator involvement:

- Grace limit rules – define rules to handle quota increase requests, allowing usage to grow by a specific percentage over a specific period
- Group membership dependency – define different rules for different User Groups
- Automatic or manual handling – have increase requests evaluated automatically or queued for administrator approval

Customizable user experience:

- Localize portal language – translate the component text to ensure quick understanding
- Localize portal message – use the available text fields to describe the details and motivations behind the company's SRM policy
- Remove interface elements – if the users should not have the option to request a quota increase, simply remove it from the interface

■ NSS: STORAGE CHARGEBACK

Billing for storage use highlights the true costs involved:

- File system analysis – invoice or report according to storage use
- Exchange mailbox analysis – invoice or report depending on mailbox size
- Quota analysis – invoice or report according to quota size
- User level reporting/billing – send individual users an invoice or a cost report
- Group level reporting/billing – send department managers an invoice or a cost report
- Path level reporting/billing – send reports and invoices to project managers and customers
- HSM reporting/billing - send on both costs and savings associated with HSM to cost centers
- Open format outputs – calculation output is stored in MS SQL, and can also be exported to MS Excel and CSV

Granular pricing schemes match real-world business models:

- Multi-tiered billing classes – use a flat pricing scheme or one where different usage thresholds trigger escalated costs
- Pricing to match device types – charge a premium for high end storage and encourage infrequently used data to be kept on low end devices
- Base cost – charge a start-up fee to cover administrative overhead

Scheduled reports offer financial analysis:

- Identify cost growth patterns – the fastest growing user, group or path
- Identify budget viability – forecast budget exhaustion dates according to current trends

■ NSS

Manage the enterprise:

- 64-Bit Architecture - native 64-bit architecture allows for increased memory allocation and scalability
- Transparent support for distributed file systems (DFS)
- Binary-level file scanning - identify file types based on header information; MOV, MPEG, RMF, AVI, MP3, EXE, FLAC, FLV, GIF, JPG, PDF, PLS, PNG, RAR, ZIP, AIFF, ASF, BMP, RIFF, RM, MKV and TORRENT
- Multi-host display – all workspaces can include data from all devices
- Multi-host management – all workspaces allow concurrent management of multiple devices
- Email protocol support – send notifications using SNMP, MS Mail, MS Exchange, Windows Messenger and command-line messaging
- Operation Manager support – post warnings and information messages to the Event Viewer
- COM API – integrate storage control policies with COM aware applications
- SQL database store – quota settings, usage and cost data, billing class definitions, etc. are all stored in an open SQL database
- Active Directory integration - LDAP is used extensively to automate configuration wherever possible

NORTHERN

Northern is dedicated to helping organizations gain control over their unstructured and user generated data. By gaining control, organizations avoid unnecessary costs, handle compliance related issues with their user generated data, and reduce the operational risks related to their IT infra-structure. Furthermore, control also means that organizations are able to capitalize on the opportunities related to their pools of data.

Founded in Stockholm, Sweden in 1995 Northern has from the beginning served a global market focusing solely on User Data Management [UDM]. The in-house developed solution, Northern Storage Suite, is used by organizations around the world with large numbers of users and/or large amounts of unstructured data. Organizations in all areas, from aerospace and healthcare to government and education, have realized the benefits of the goal-driven, policy-based approach to UDM that Northern can offer.

The company serves a global market through its six bases of operations; Sweden [Stockholm], United States [Boston, MA], France [Paris], United Kingdom [London], Italy [Turin] and The Netherlands [Utrecht]. For more information visit: www.northern.net

