



# Dell Compellent FS8600 VDI Solution Brief

When administrators approach the design of storage for stateless virtual desktop solutions, they face several challenges associated with:

- Accommodating simultaneous workloads over various protocols
- Managing several data types such as desktop images, clones, users files and profiles
- Building strategies for storage provisioning, administration and management
- Evaluating cost and administration efforts
- Meeting changing performance and space requirements

In addition to datastores, a non-persistent desktop environment commonly involves application and user files management, accessibility, backup and security as well as the preservation of a consistent personalized experience. Such challenges are often addressed using a separate storage repository, resulting in increased administration overhead and complexity.

The Dell Compellent FS8600 with Dell Fluid File System (FluidFS) technology lies in the point where the storage requirements of a non-persistent VDI solution intersect. It acts as a unified storage platform for all types of data in the organization, reducing management overhead, provisioning complexity and diverting IT administration focus from the administration of storage to the management of data. An FS8600 system is equipped with the advanced feature set needed to keep user data management fully integrated to the organization domain policies, while keeping secure availability using standard network access protocols.

## A unified storage platform for the entire solution

Store desktop images and clones along with user data and personal settings in a single FS8600 system to reduce the cost of deploying and maintaining separate repositories per storage protocol. The FS8600 multiprotocol compatibility allows you to accommodate virtual desktop images in NFS datastores and allocate storage for user data and profiles using SMB along with the various file storage needs in the organization. Under this configuration, user file access management is kept under your domain security rules and the administration of data consistent with business policies. Furthermore, all your storage configuration, management and monitoring tasks remain consolidated under a single platform.

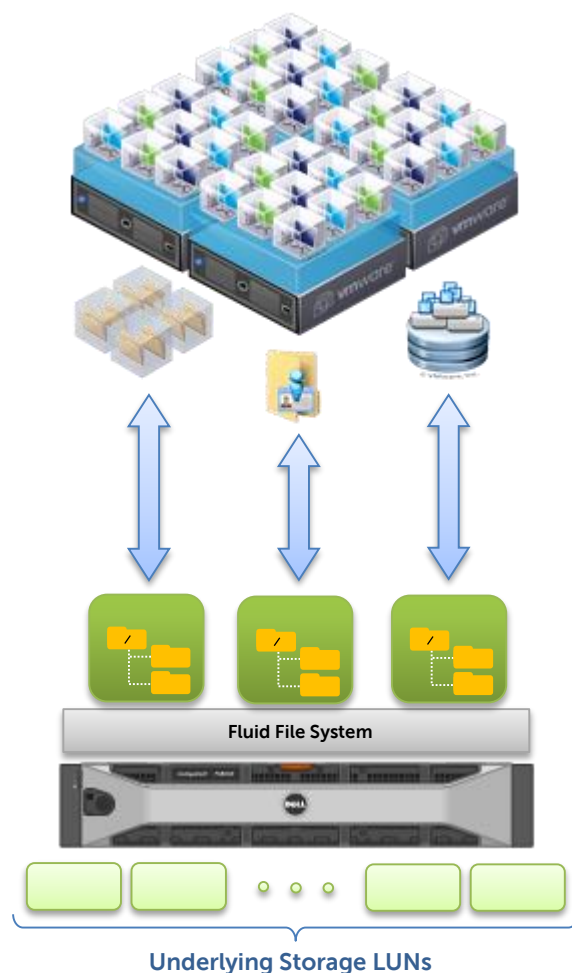


## Increase data management flexibility and granularity

The FS8600 turns datastores from storage volumes into flexible management domains, allowing you to store entire virtual desktop pools in a single datastore. In parallel, the FS8600 advanced file-level features can be applied on user files such as data reduction, auto-tiering, replication, backup and recovery. Data types in the solution are separated in NAS volumes allowing you to apply different management policies for each data type.

## Facilitate storage provisioning and accessibility of user data

Automate the allocation of user-level storage for domain users under custom space growth regulation policies. User, group and directory level quota rules can be applied on newly created or existing user folders at any time to adjust them. Additionally, as the FS8600 integrates to your domain, it enables seamless data sharing among users easily and securely according to organization policies.



### Dell Compellent FS8600

*is a NAS appliance that offers a flexible solution for capacity- and performance-intensive file workloads. An FS8600 system consists of one to four appliances, where each appliance consists of two, active-active, controllers. Each controller is an independent field replaceable unit, running an instance of the FluidFS firmware. The FS8600 supports enterprise grade features such as SMB and NFS protocols, snapshots and replication, data reduction via deduplication and compression, flexible NAS volumes and comprehensive quota management.*

## Offload desktop provisioning operations with VAAI

Desktop cloning operations can be offloaded to the FS8600 to keep your hypervisors' CPU and memory resources focused on running desktop processes. Cloning is transparently performed by the FS8600 using VAAI, which leverages the instant FluidFS cloning technology, minimizing provisioning times and storage footprint.

## Optimize for performance

Reduce disk I/O by leveraging the FS8600 caching technologies. Scale out the system with more appliances to meet growing performance demands. With the auto-tiering feature hot VDI shared data is delivered faster.