Talon FAST™ + Azure NetApp Files
Globally Distributed Enterprise File Sharing

Modernizing Distributed Storage in Microsoft Azure

Talon FAST™ and Azure NetApp Files help unify the distribution and presentation of globally accessible content for distributed storage and business applications. Talon and Microsoft—built on NetApp technology—assist organizations with modernizing their distributed storage and propel their journey into hybrid or public cloud infrastructure(s). This proven solution allows enterprises to centralize and consolidate unstructured data while leveraging a software fabric that caches "active data" sets in distributed offices globally. As a result, business users are guaranteed transparent data access and optimal performance on a global scale.

Factors impacting the Distributed Enterprise

Today, one of the biggest challenges that organizations face is the excessive growth of unstructured data and the inability to centrally manage those data sets efficiently. Considering that 80% of unstructured data resides at distributed locations, organizations struggle to manage these "islands" of data, resulting in complex and costly IT management, as well as increased risk of audit, compliance, and security breaches.

Challenges around Distributed Storage

- Are you managing "Islands of Data" in your branch offices?
- Do you plan to consolidate file servers into the cloud?
- Are your users struggling with poor performance accessing their files from the cloud?
- Do you need a cost-effective way in managing unstructured data to accommodate ever growing data stores?
- Does the business require you to move your unstructured data workloads into the cloud to supply for better collaboration on large data sets?

What if you could have the governance, compliance, control, and cost advantages of centralizing unstructured data without sacrificing edge performance?
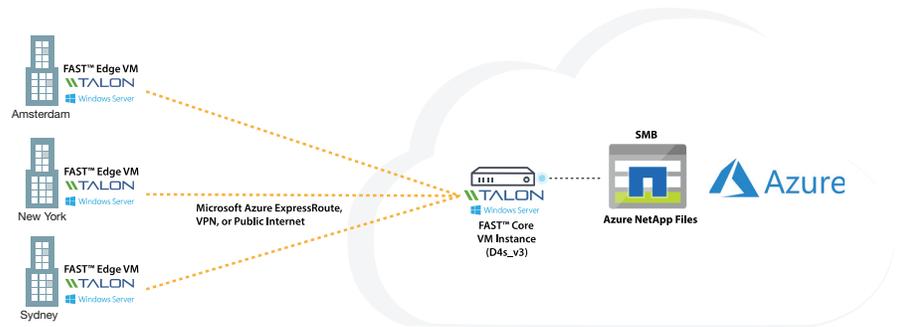
What if you could combine better operational controls and lower infrastructure costs with an incredible collaboration experience at the edge?

Talon + Azure NetApp Files: a "major step" in Unstructured Data Management

85% of companies are in the process of adopting a cloud transformation strategy. This means that enterprises are now executing plans to consolidate on-premise storage and infrastructure workloads into the cloud. CIO's recognize that this approach allows for better TCO/ROI, scalability and flexibility, security, capacity management and data compliance.

Through data consolidation with Azure NetApp Files, enhanced with Talon FAST™ Intelligent File Caching software, distributed branch offices have complete access to the organization's central data sets, while fully adhering to the principles of ACLs/NTFS permissions, which gives end users streamlined access to all data while only caching active data locally at the edge.

FAST™ Edge VM
\\\\TALON
Windows Server
Amsterdam

FAST™ Edge VM
\\\\TALON
Windows Server
New York

FAST™ Edge VM
\\\\TALON
Windows Server
Sydney

Microsoft Azure ExpressRoute, VPN, or Public Internet

\\\\TALON
Windows Server
FAST™ Core
VM Instance
(D4s_v3)

SMB

Azure NetApp Files

Azure

This means users have immediate access to all central file shares, which often makes up 100s of TBs or even PBs of unstructured data; however, only data that is relevant to the user population in that specific site is cached locally in the FAST™ Edge cache. See above figure

Drastically reduce storage footprint

Consolidation with Azure NetApp Files, enhanced with Talon FAST™, gives distributed branch offices total access to the entire directory structure, providing them with streamlined access to all company data while only active data sets are cached locally. Users have immediate access to all centralized data, which could be 100s of TBs or even PBs of unstructured data, but only data that is relevant to the user population in that specific site is cached locally in the FAST™ Edge cache. Additionally, as the active dataset ages over time, the FAST™ Intelligent File Caching purging mechanism clears the least recently used (LRU) cached files from the local storage cache volume(s).

Ensure optimal user experience

With Talon FAST™ Intelligent File Caching software, your distributed users are guaranteed an optimal experience. By accessing and collaborating on data in real-time—transparent to all client platforms—users will feel as if they're all working in the same office, anywhere in the world, regardless of bandwidth, latency, and distance.

Streamline and Simplify Distributed IT

As organizations are aiming to centralize and consolidate their branch office IT storage assets, eliminating complexity and backups provides significant cost savings. As Talon FAST™ deploys transparently on a (virtual) Microsoft Windows Server instance, on traditional servers, or on virtualization platforms like Microsoft Hyper-V or VMware vSphere, enterprises can consolidate local storage and embed services like Microsoft Active Directory, DNS/DHCP, DNS, DFS Namespaces, and Software Distribution in their streamlined and standardized branch office IT image. Since the actual data is consolidated and stored safely and securely in Azure, a variety of data management tasks like backup and restore (BU/R), disaster recovery (D/R), and archiving can now be handled centrally by leveraging powerful mechanisms like time and space efficient snapshots and replication within the Azure Intelligent Cloud. This not only simplifies operations (by taking away these tasks at "the edge") but also allows for achieving more aggressive SLAs, further enhancing the business and taking away business risks.

TALON

Microsoft

Unleash the power of the Azure Intelligent Cloud

Azure NetApp Files is a powerful, cost-effective, and easy-to-use data management solution for your enterprise cloud NAS storage workloads. With Azure NetApp Files, organizations can build a public cloud "datacenter" that is the foundation of a data fabric that services the needs of users worldwide. IT teams can then seamlessly manage data as it flows to wherever needed most, leveraging a centrally managed approach to all data, with the benefits and scale of public cloud.

Enterprises can simplify their storage environment with proven operational efficiency by leveraging economies of scale and the resiliency of the Microsoft Azure public cloud infrastructure and services. Data is secured with built-in encryption and a consolidated approach with local caching gives a global view of storage with a single management console and a single physical footprint.

The FAST™ Software Fabric

FLEXIBLE & SCALABLE STORAGE AGNOSTIC, WORKS WITH ANY CIFS/SMB INFRASTRUCTURE	**INTELLIGENT** CACHES ONLY WHAT'S NEEDED AT THE BRANCH (ACTIVE DATASET)	**ZERO-TOUCH** AUTOMATICALLY PURGES 'STALE' CACHED FILES OVER TIME (LRU)
TRANSPARENT ACCESS DATA THROUGH A GLOBAL DFS NAMESPACE, HONORS ALL SMB/CIFS PRINCIPLES (LOCKING)	**PERFORMANT** CACHES UNSTRUCTURED DATA, COMPRESSES, STREAMS, AND REDUCES DATA OVER THE WAN	**COMMODITY HARDWARE** LEVERAGE EXISTING HARDWARE OR VM INFRASTRUCTURE FOR FAST™ CORE AND EDGE SOFTWARE ROLES

Talon FAST™ and Azure NetApp Files: A Modern Solution for the Distributed Enterprise

This combination of Azure NetApp Files and Talon FAST™ software allows enterprises to consolidate their unstructured data to a centralized "single set of data," taking advantage of the flexibility, availability, and economics of a centralized storage model in the public cloud for one of their largest use cases—unstructured data—while maintaining a reduced storage footprint at the datacenter and distributed branch locations.

The resulting effect(s) on the business are significant:

√ A consolidated file storage environment leveraging the benefits of the public cloud and the scalability and performance from an enterprise storage service

√ A reduced storage infrastructure footprint at distributed locations through Intelligent File Caching

√ Significant cost savings in the hardware and management aspects of providing file services to distributed users

√ The ability to leverage the enterprise-class scale, flexibility, and security of Azure NetApp Files-resident data across all users, regardless of location, both on-premises as well as in-cloud

√ Increased flexibility and agility through enhanced global collaboration

√ Enhanced security by removing the risk of data loss/leak at distributed locations through error, disaster, and intrusion