IBM Aspera Upload Acceleration option for Akamai NetStorage

Direct integration of Aspera's high-performance FASP technology into Akamai NetStorage for customers ingesting data into into the Akamai Intelligent Platform

Key benefits

- Significantly increase upload transfer speeds regardless of file size, distance, or network conditions with the integration of Aspera's patented FASP transfer technology

- Reduces the time required to make time-sensitive content, high-quality video files and large content libraries available for delivery across the Akamai Intelligent Platform

- Dramatically speed up file uploads into the Akamai Intelligent Platform by using Aspera's high-performance digital transport capability to improve NetStorage-based workflows

- Aspera Upload Acceleration option enables a transparent end-user experience with no need to re-architect the workflow or build custom API calls

In close collaboration with IBM Aspera, Akamai has integrated Aspera's high-performance FASP® digital transport technology to securely ingest data from customer premises into the Akamai Intelligent Platform with direct integration to NetStorage for improved speed, efficiency and productivity. The Aspera Upload Acceleration option for the Akamai Intelligent Platform™ leverages dedicated servers within the Akamai CDN running Aspera's FASP transfer technology to accelerate file transfers directly into NetStorage many times faster than traditional methods. Aspera transfer clients are easy to configure with built-in connection information for the Akamai NetStorage service, and the FASP server software running in the Akamai platform integrates directly with underlying NetStorage APIs. The resulting performance reduces the time required to make time-sensitive content, high-quality video files, and large content libraries available for delivery using the Akamai Intelligent Platform.

NetStorage customers with the Aspera Upload Acceleration Option are able to:
- Transfer files of any number and size many times faster than HTTP, FTP, or rsync on their existing network infrastructure
- Schedule transfers and configure hot folders to automatically send transfers when files are received
- Encrypt transfers while in transit and at rest so that files can only be decrypted with a passphrase
- Monitor transfers and view reports on transfers
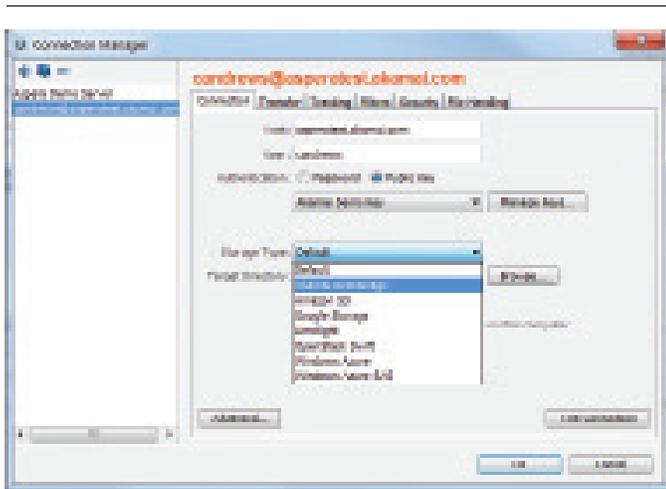- Adjust individual transfers in progress: pause and resume transfers or manage the transfer speed

Figure 1: Aspera client settings

Transfer

The Aspera Upload Acceleration option enables Akamai customers to ingest their content using Aspera FASP technology directly into the NetStorage native object-based storage. The Aspera FASP technology is a breakthrough transfer protocol that leverages existing WAN infrastructure and commodity hardware to achieve speeds up to hundreds of times faster than FTP and HTTP, and is designed to deliver end-to-end security, 100 percent reliability and exceptional bandwidth control.

With the Aspera Upload Acceleration option enabled, existing Aspera customers can upload content into Akamai NetStorage using their existing Aspera clients including IBM® Aspera® Desktop Client, IBM® Aspera® Enterprise Server, IBM® Aspera® Connect Server, IBM® Aspera® Point-to-Point Client, IBM® Aspera® SDK, and command line access from any licensed Aspera transfer server or client.

Akamai customers can also use the Aspera client available from the Akamai website to upload to NetStorage only.

Monitor and report

Transfers can be monitored in real-time from within the Aspera Desktop Client or the Akamai Luna Control Center. Customers who own IBM® Aspera® Console, Aspera's centralized management and reporting software, can also view the Akamai NetStorage environment as part of the overall Aspera transfer environment and monitor the transfers in real-time.

Thanks to the deep integration with NetStorage, users can cancel, pause, resume or reorder transfers in the queue on the fly directly from the Aspera Desktop Client or the Aspera Console management interface. NetStorage users benefit from Aspera software's rate control that allows extraordinary dynamic control over transfer speeds and bandwidth sharing so applications and end-users can pre-set and change on the fly individual bandwidth priorities, transfer rates and finish times.

Besides monitoring transfers, an Akamai customer can view and control the network-wide transfer activity assuming they have the proper viewing permission. Reporting includes details such as volume of data uploaded or downloaded over time and the upload volume by user.

Automate

With Aspera technology, Akamai customers have a set of rich options to include high-speed file transfers, monitoring, and reporting into their content distribution workflow. Transfer automation can range from initializing a transfer when a file is placed into a hot folder to the automation of recurring transfers using Aspera Console's "Smart Transfer" capability. With a wide variety of automation tools, Akamai customers using the Aspera Upload Acceleration option and additional Aspera products can have complete flexibility and control over their file transfer environment.
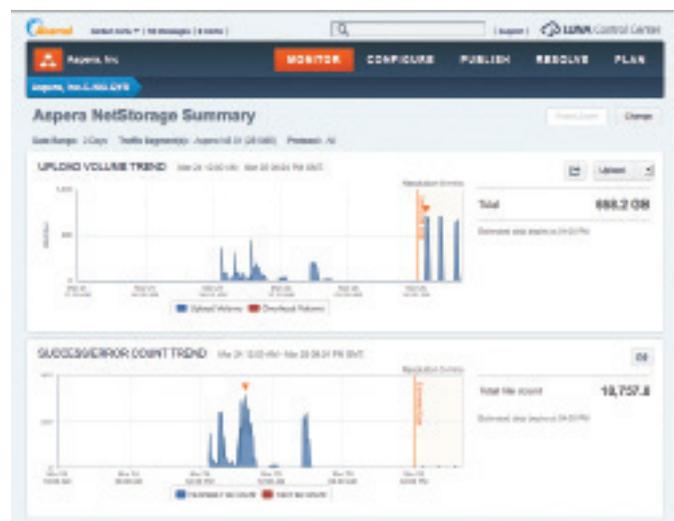

Figure 2: Luna Control Center NetStorage Summary

Scheduling

Customers can schedule a file to be transferred at a specified day and time. These scheduled file transfers can be set up as a recurring file transfer.

Hot folders

Using the Aspera Desktop Client, hot folders can be created to transfer files to a destination whenever a new file is added to the specified folder. When a new file is placed into this hot folder, a FASP high-speed file transfer is initialized based on the timeframe chosen. Transfers can happen immediately or daily at a specified time. Transfers from hot folders can be monitored from within the Aspera Desktop Client.

Smart transfers

Customers who have access to the Aspera Console can create Smart Transfers to automate distribution of files. A smart transfer will control all aspects of the transfer including the source, connection, transfer rate, file handling, and notification. Smart Transfers can be scheduled to the minute on a repeating schedule. Smart Transfers can be kept private to one user or shared with other Console users.

Command line

Aspera users who have access to the command line can automate their transfer using a script. The command line transfer option includes the same capabilities as the Aspera Desktop Client to enable encryption and specify a transfer speed.

Key features

- High-speed uploads powered by FASP transfer technology directly into Akamai
- Native support for connection configuration in the Aspera transfer client
- Transparent integration with Akamai NetStorage
- Integrated monitoring and reporting with Aspera Console and Akamai Luna Control Center
- Existing Aspera customers can upload content into NetStorage using Aspera clients including Aspera Desktop Client, Enterprise Server, Connect Server, Point-to-Point Client and the Aspera SDK
- Command line access from any licensed Aspera transfer client and server software (nodes)

Supported IBM Aspera products

- IBM® Aspera® Desktop Client
- IBM® Aspera® Enterprise Server
- IBM® Aspera® Connect Server
- IBM® Aspera® Point-to-Point Client
- IBM® Aspera® Developer Network

Aspera requirements

- Aspera client licensed for upload into NetStorage (provided through Akamai via purchase of the Aspera Upload Acceleration option)
- Active Aspera customers can use their existing clients with Akamai

Akamai requirements

- Akamai NetStorage Groups Provisioned
- Aspera Upload Acceleration option

About Netstorage

Akamai customers use the NetStorage cloud service for secure, geographically distributed storage that reduces the time and expense of maintaining their own data centers and infrastructure for data and file distribution and management. In many of the industries that Akamai serves, customers need to rapidly move large amounts of data or files to distribute them over many recipient sites or at great distances from the source. Examples include:

- Releasing large video and media files to international and national distribution centers
- Replicating large source code repositories and build files to offshore teams
- Moving scanned legal or engineering files for historical archive
- Transferring large amounts of biomedical data and imagery to remote institutions

About Aspera, an IBM Company

Aspera, an IBM company, is the creator of next-generation transport technologies that move the world's data at maximum speed regardless of file size, transfer distance and network conditions. Based on its patented, Emmy® award-winning FASP® protocol, Aspera software fully utilizes existing infrastructures to deliver the fastest, most predictable file-transfer experience. Aspera's core technology delivers unprecedented control over bandwidth, complete security and uncompromising reliability. Organizations across a variety of industries on six continents rely on Aspera software for the business-critical transport of their digital assets.

For more information

For more information on IBM Aspera solutions, please visit
http://www.asperasoft.com and follow us on Twitter
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