Hewlett Packard Enterprise

Remote Connectivity for HPE Storage

Get connected for greater storage uptime, proactive planning, and faster support

What you get with remote connectivity as a HPE 3PAR StoreServ customer

- Proactive fault detection to avert issues

- Proactive email notifications

- Faster time to resolution

- Simplified software updates that can be completed in minutes instead of days

- Access to the HPE Storage Analytics platform at **storefrontremote.com**

- Web-based analytics based on historical data to help you get the most out of your storage

- Best practice recommendations from HPE for maintaining system health

Why remote connectivity is safe

- HPE has access to system metadata only, not user data

- HTTPS ensures secure, encrypted communications

- All communications are initiated in an outbound manner

- Authentication takes place via VeriSign, the leading SSL certificate authority

- Available policy-based access lets you authorize multiple users with varying access levels

- All communications are captured in an audit log that is viewable using a Web browser from within your internal network

What is required to use HPE Storage Analytics with HPE 3PAR StoreServ?

- Your HPE 3PAR Service Processor must have connection to the Internet

- Remote connectivity must be enabled on your service processor

- HTTPS port 443 must be enabled on your external firewall

- Your system must be under warranty and/or Active Support Contract

[1] Based on internal HPE analysis of data gathered from currently available HPE 3PAR StoreServ Storage systems between November 2012 and April 2014

Protect your storage quality of service

To experience uninterrupted data availability with your HPE Storage system and protect quality of service levels, it's necessary to proactively detect faults and resolve them before they can become issues. But it isn't possible to monitor your system 24x7x365—or is it?

Your HPE 3PAR StoreServ Storage system comes with built-in remote connectivity capability via the HPE 3PAR Service Processor, which is capable of offloading this critical task to HPE 3PAR Central—a world-class, around-the-clock monitoring hub staffed with experts and sophisticated tools that are dedicated to making sure that your HPE 3PAR StoreServ Storage delivers predictable high availability and reliability.

Our metrics show that systems connected to HPE 3PAR Central benefit from 35 percent greater uptime than non-connected systems that require service intervention.[1] Remote connectivity is also your key to receiving proactive fault detection and the fastest possible support if an issue does arise. The best part is that remote connectivity to HPE 3PAR Central comes at no additional cost to you. To take advantage of this capability, all you need to do is provide an Internet connection to your system's built-in service processor and turn on remote connectivity.

Once connected, you can use the secure **HPE StoreFront Remote web portal** to gather insights into capacity and performance details relating to your HPE Storage arrays. By installing and registering your system with the web portal, you gain anytime, anywhere access to an intuitive dashboard that presents unique insights into all of your HPE Storage arrays in one place. This means you can monitor your HPE 3PAR StoreServ, HPE StoreOnce and HPE StoreVirtual Storage systems for protection from the one and the same secure web portal.

Remote error detection

Your **HPE 3PAR StoreServ Storage system** includes either a physical or virtual service processor that connects to HPE 3PAR Central to provide remote error detection and support diagnostic and maintenance activities. Metadata collected by the service processor is encrypted and transmitted via a secure TLS connection to HPE 3PAR Central over a secure Internet connection where it is used to monitor, maintain, and troubleshoot your system. This allows our support experts to react quickly to alerts, notifications, and patterns so that faults are detected before they can impact service levels or data availability. Note that only metadata is required for this process. Remote connectivity does not permit access to any user data, but instead relies on metadata collected and stored on your service processor.

World-class support

HPE 3PAR Central is HPE's 24x7x365 support center dedicated exclusively to monitoring and supporting HPE 3PAR StoreServ Storage. This support hub features an infrastructure comprised of integrated processes, tools, procedures, and people that work in unison to proactively support your system. In addition to greater uptime, systems connected to HPE 3PAR Central experience 64 percent faster time to resolution in cases where onsite support is required.[2] Remote connectivity also simplifies the software upgrade process to free you and your IT staff from manual tasks.

Secure communication that you control

Remote connectivity leverages the industry-standard HTTP over Secure Sockets Layer (HTTPS) protocol to ensure that all external communications with HPE 3PAR Central are secure and that all transmission is encrypted. You maintain complete control over remote connectivity configurations and options and remote access to the service processor. By installing HPE 3PAR Secure Service Policy Server software on a separate server, you are able to define, implement and configure remote service access policies for HPE 3PAR StoreServ. These policies do not provide access to your system's user data.

HPE StoreFront Remote

Hewlett Packard Enterprise also provides a secure web portal that you can use to complement your on-premise management tools and remote connectivity to HPE 3PAR Central. Unlike remote connectivity to HPE 3PAR Central, which is used by HPE to monitor your system metadata, HPE StoreFront Remote is a secure web portal where you can log in to gain insights and analytics related to your HPE 3PAR StoreServ, HPE StoreVirtual, and HPE StoreOnce systems from a single interface.

With no limits on the number of systems that you can support, this **web portal** can help you make better decisions, identify capacity and performance issues early, and maximize asset utilization for greater efficiency.
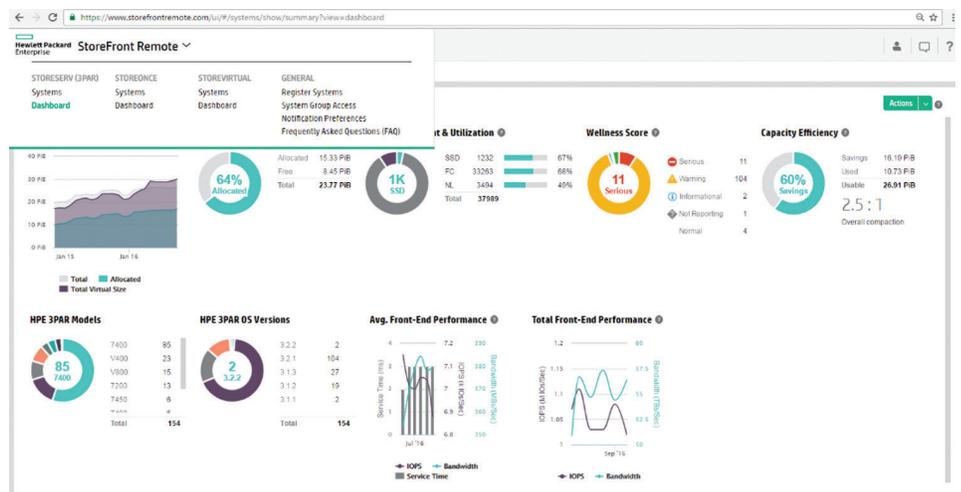

Figure 1. HPE StoreFront Remote web portal, 3PAR dashboard view

When you use this web portal, you get:

- Anytime, anywhere access to information regarding your registered systems over a secure web portal at no additional cost.

- Insightful analytics about capacity and performance for all of your registered HPE 3PAR StoreServ arrays, HPE StoreOnce, and HPE StoreVirtual systems.

- An intuitive web portal that shares design consistency with HPE 3PAR StoreServ Management Console (SSMC) and HPE OneView for simplicity of use.

- Powerful and intuitive capacity trend analysis, performance trend analysis, and capacity forecasting capabilities for your HPE 3PAR StoreServ arrays so you can make better data center decisions.

- Secure access via use of HTTPS and strong authentication. The StoreFront Remote (SFRM) security is audited by PE security experts.

- System wellness email notifications, encompasses health alerts and best practices information based on HPE's recommendation. Flexibility in choosing the types of notifications and the frequency ensures that the wellness notifications stay relevant to customers.

Platforms supported

	HPE 3PAR StoreServ	HPE StoreOnce	HPE StoreVirtual (3200)
System details	✓	✓	✓
Wellness score & device status	✓	✓	✓
Capacity trend & forecast	✓	✓	✓
Performance information	✓	Coming soon	Coming soon
Performance analytics	Coming soon	Coming soon	Coming soon
Support case history	✓	✓	Coming soon
Alerts history	✓	-	Coming soon
Configuration history	✓	-	Coming soon

HPE StoreFront Remote: Features

Secure*	• Metadata, not Data • HTTPS, Non-text Query Language • Secure authentication • Audited by HPE Security Experts
Easy to use	• Easy to learn GUI—consistent with other HPE Storage Management GUIs • Customizable dashboard • Intuitive "Filters" • Customizable email notifications[†]
Anytime, anywhere, no limits	• Web portal—Always available • One portal for all HPE Storage devices • No limits to the number of devices you can register and monitor

[*] Refer the **StoreFront Remote Security white paper** for more details

[†] Only for customers with Proactive Care Support or above

Why you should get connected

If your system's service processor isn't connected to HPE 3PAR Central, and if you're not using the web-based HPE StoreFront Remote analytics portal, you aren't taking advantage of the processes, people, and tools that HPE offers to protect system uptime, speed issue resolution, and collect data that helps you improve operational efficiency. With a warranty or valid support contract, these benefits come at no cost to you.

Proactively detect faults and expedite resolution with remote diagnostics
When connected to HPE 3PAR Central, critical diagnostic information such as system health statistics, configuration and performance data, and system events can be transferred frequently and maintained centrally on a historical basis. As a result, proactive fault detection and analysis are maximized and manual intervention is minimized. With such advanced remote troubleshooting capabilities, HPE 3PAR Technical Support can offer you more reliable response and resolve issues more quickly—before they can become problems.

Protect system uptime and prevent onsite visits with remote serviceability
Any downtime is too much downtime, which means that waiting for onsite support can cost you more than just time and money, but the credibility of your business. Connecting to HPE 3PAR Central allows HPE 3PAR Technical Support to remotely monitor and service your system through a secure IP connection. Remote serviceability provides quick, reliable response to issues without having to send resources onsite, therefore expediting time to resolution. The processes used to detect, analyze, and proactively resolve faults incorporate automation that minimizes human intervention and reduces human error. When onsite visits are required to replace parts, those parts can be ordered and dispatched immediately—even before the visit is scheduled—to expedite resolution.

Simplify software upgrades with automatic pushes
When connected to HPE 3PAR Central, you are immediately notified of software upgrades so that you can download update packages. But you can also free up time for you and your IT staff by choosing to allow HPE to pre-stage software on your system to simplify the upgrade process. Depending on your system model, you have the option to perform software updates yourself—on your time, using new software update wizards—instead of scheduling onsite engagements or coordinating with HPE 3PAR Technical Support to perform your upgrades.

Improve operational efficiency via historical data collection and analysis
Maintaining a connection to HPE 3PAR Central allows historical data collection that tracks your system in order to increase operational efficiency. By working with your sales account team, you can leverage this data for performance trending, forecasting capacity requirements, and performing hardware and capacity analysis to better anticipate needs and keep pace with business and data growth.

Learn more at
hpe.com/storage/3PAR

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