

# Simplify and Accelerate Your Virtual Desktop Infrastructure Deployments

## With Cisco HyperFlex Systems



- Simply and easily deploy and manage your solution.
- Deploy your solution in less than an hour.
- Provide consistent performance.



### Efficient

- Scale linearly.
- Reduced your initial investment costs.
- Support a variety of desktop configurations.



### Adaptable

- Independently scale computing and capacity resources.
- Optimize storage with deduplication and compression.
- Reduce costs.



### Reduced Risk

- Use Cisco® Validated Designs.

## Reduce complexity

If complexity keeps you from using virtual desktop infrastructure (VDI), look no further. Cisco HyperFlex™ systems deliver the adaptive VDI environments you need.

Implementing VDI environments on traditional servers is turning out to be more complicated than many companies expected. The high initial costs, ineffective scaling, and unpredictable performance of network storage often inhibit the adoption of VDI technology and keep you from benefiting from desktop efficiency and data security. Cisco HyperFlex systems adapt to your evolving environment. With simplicity, rapid deployment, and flexible scaling, you can start small and grow your VDI deployments with ease.

## Hyperconvergence makes it possible

Cisco HyperFlex systems, powered by Intel® Xeon® Scalable processors, combine computing, storage, and networking into a simplified, easy-to-use platform. These systems bring the pay-as-you-grow economics of the cloud to on-premises virtual infrastructure so you can gain greater agility, efficiency, and adaptability. With an integrated network fabric, excellent graphics processing units (GPUs), powerful data optimization, and unified management, Cisco HyperFlex systems bring the full potential of hyperconvergence to your virtual desktop deployments. These solutions are fast to deploy, simple to manage, and easy to scale, and they arrive ready to provide you with a unified pool of infrastructure resources to power virtual desktops and applications as your business needs dictate.

Cisco HyperFlex™  
Systems with Intel®  
Xeon® Scalable  
processors



## Agility and simplified operations

For your business to be agile, your VDI solutions must be easy to deploy and manage. The elements in Cisco HyperFlex systems are delivered as a preintegrated cluster that is up and running in an hour or less. Integrated management detects any component plugged into the system, making the system self-aware and self-integrating and helping you adapt quickly to changes in business needs. You can move a node from the loading dock and add it to your cluster simply by plugging in network and power cables—no manual node configuration is required. Cisco Unified Computing System™ (Cisco UCS®) service profiles prepare every aspect of a node's identity, configuration,

and connectivity, increasing efficiency and security and reducing deployment time. You can monitor and manage your cluster from any device with an advanced role-based HTML 5 interface with Cisco HyperFlex Connect. Cisco HyperFlex Connect handles all of a cluster's hardware management functions and provides a hypervisor-independent single point of control for the physical infrastructure, the data platform, and the virtualization layer. We also offer a VMware vSphere plug-in that supports most of the capabilities of Cisco HyperFlex Connect. At a higher level of management, you can use Cisco Intersight™ cloud-based management across your data center. It is integrated with Cisco HyperFlex Connect to provide visibility across your clusters and

help you manage any single cluster. With Cisco, you get to choose how and where you want to manage the infrastructure.

## Efficiency and flexible scaling

Cisco HyperFlex systems provide a cluster that independently scales computing, graphics processing, networking, and storage resources to achieve the right balance of processing power, graphics performance, network bandwidth, and storage capacity for your VDI workload (Figure 1). Graphics performance is becoming more important than ever to the user experience, and each Cisco HyperFlex node can support up to two NVIDIA Tesla M10 GPUs. You can start small and grow to support tens or hundreds of users and

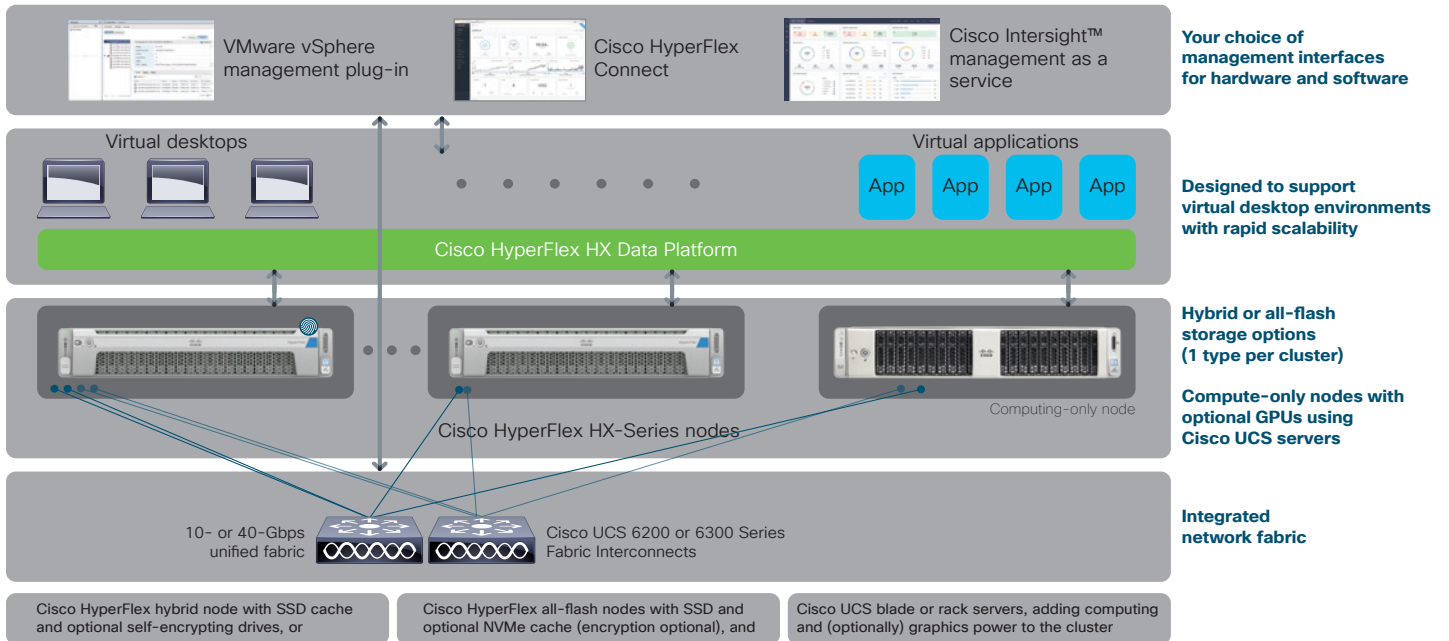


Figure 1 Cisco HyperFlex systems deliver flexible and independent scaling of your VDI environments

**“Building and configuring desktops is so much faster with HyperFlex because it’s built for VDI. We haven’t had one error in deploying a desktop, and we can create dozens of clones in seconds.”**

**Carlos Samayoa**  
Manager of infrastructure services  
Bryant University

easily and cost-effectively scale to support thousands. The solution easily supports persistent and nonpersistent desktops and delivers full desktop infrastructure and application streaming depending on the needs of your workforce.

### **Adaptable, optimized infrastructure**

Cisco HyperFlex systems take a different storage approach, combining either hybrid nodes with solid-state disk (SSD) drives and spinning disk drives or all-flash nodes into a single distributed, multitier, object-based data store. Optional self-encrypting drives encrypt your data in all storage tiers for additional security. Native inline deduplication and compression are always on to help ensure that your storage resources are used optimally without adversely affecting virtual desktop and application performance. Native replication allows you to replicate data on a per-virtual machine basis to local or remote sites for disaster recovery. Integration with leading enterprise backup systems enables the use of a single backup approach across your entire data center. You can also connect your third-party enterprise storage directly to your cluster to migrate storage resources, run virtual desktops, and perform backup operations.

### **Reduce your risk**

We believe that deploying a Cisco® solution shouldn’t come with risk. That is why we pretest and validate

solutions with our Cisco Validated Designs. Cisco Validated Designs provide the foundation for systems design based on common use cases. They incorporate a broad set of technologies, features, and applications to address your needs. Each design has been comprehensively tested and documented by Cisco engineers to help ensure faster, more reliable, and fully predictable deployment. Cisco has tested Cisco HyperFlex systems with VDI for 1000 users and 4000 users.

## **Get started with Cisco solution bundles**

Cisco HyperFlex systems are available as packaged bundles. With these bundles, you can easily purchase and deploy the VDI solutions you need to deliver anytime, anywhere access to desktops and applications and make the most of your IT resources.

## **For more information**

For additional information, see:

- [Cisco hyperconverged infrastructure](#)
- [Cisco desktop virtualization](#)
- [Cisco Validated Designs for VDI](#)