

Enterprise Apps On Demand

with FlexPod™ and eCloudManager™



End-to-end FlexPod Monitoring and Management

The fluidOps™ eCloudManager™ is an innovative cloud management platform for complex, virtualized enterprise application environments. By integrating directly with NetApp® storage appliances, with VMware® vSphere™ and VMware vCenter™, and with Cisco Unified Computing System™, it delivers full support for NetApp FlexPod™, allowing for complete monitoring and management of your data center.

On-demand Delivery of Enterprise App Landscapes

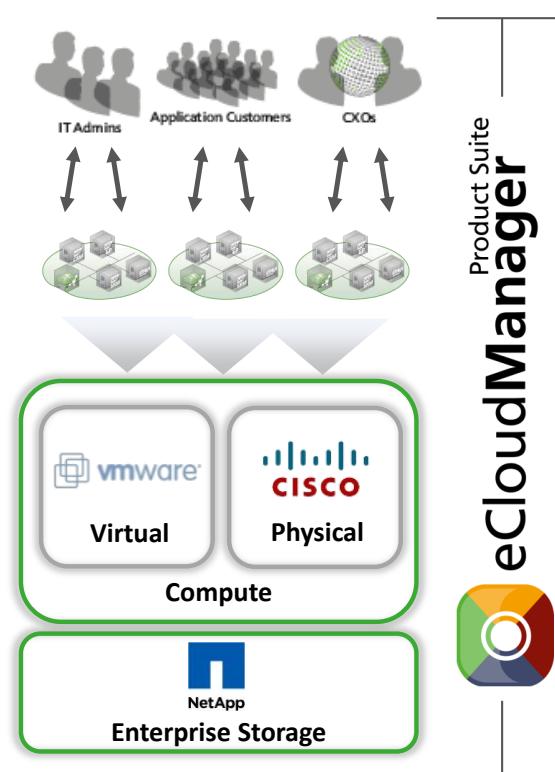
The eCloudManager platform leverages NetApp storage capabilities and maximizes VMware hypervisor potential, enabling the rapid provisioning and efficient monitoring and maintenance of enterprise workloads, such as SAP®, Oracle® or Microsoft® enterprise application landscapes. This allows customers to bring their business-critical enterprise applications to the cloud and deliver them to business clients as Landscape as a Service™: on demand, on time, ready to run.

eCloudManager's advanced management capabilities also support the monitoring and provisioning of Cisco UCS Blades, allowing for bare-metal provisioning within minutes and without any post-provisioning configuration necessary and making V2P and P2V scenarios for enterprise applications reality. This delivers higher server performance and the same level of flexibility and automation which is now available through hypervisor virtualization.

FlexPod and eCloudManager

The process of provisioning enterprise application Virtual Landscapes on FlexPod can be fully automated using the eCloudManager, enabling enterprises to drive IT innovation and rapidly respond to new business needs. In order to be able to deliver enterprise apps as standardized services in a secure and rapid fashion, the eCloudManager

platform enables easy application lifecycle management and a fully automated process for requesting, approving, deploying, updating and retiring complete multi-tiered multi-system enterprise app landscapes. This is achieved through the utilization of application and landscape templates (e.g. SAP VAF templates or company-specific templates) to jump-start the process and ensure consistency and re-use of previous efforts.



Through the one-time definition of a Master Virtual Landscape (VL) and the implementation of a Virtual Landscape Manager, a landscape's network and system configurations can be monitored efficiently and replicated 100 times faster than the standard manual provisioning and configuration. This means that new landscapes can be created with zero-configuration effort because the Virtual Landscape Manager holds the accumulated know-how of the optimal enterprise app VL environment as to storage, network and system connections; this configuration is then replicated with each new VL, ensuring that they run as desired from the get-go.

Use Cases

Enterprises can benefit from two main scenarios when using eCloudManager to monitor and manage their FlexPod infrastructure:

- they can **deliver ready-to-use enterprise app landscapes** to their end users (be it internal or external users) on demand as Landscape as a Service™, thus providing a more service-based consumption model and meeting SLAs, and
- they can **create enterprise app sandboxes** by deploying copies of complete productive landscapes and using them to run upgrade tests, development tests, perform training for new employees, streamline and accelerate internal or customer projects – and all this with real productive data and without disturbing the production environment.

Your Benefits

eCloudManager’s full scope of FlexPod monitoring and management solution includes

- end to end monitoring and semantic correlation of information retrieved from the integrated resources
- rapid provisioning of entire enterprise application landscapes together with their underlying infrastructure resources without any post-provisioning effort
- automatic configuration and pre-defined FlexPod-specific templates

- automatic error notification based on a rule / policy engine
- full SLA reporting
- granular billing / metering for all consumed resources
- optimized FlexPod resource allocation

This allows customers to

- accelerate data center virtualization and private cloud adoption,
- drive standardization, agility and efficiency,
- simplify administration and provide automation,

while

- allowing agile business process definition, and
- making the most of their infrastructure investments and maximizing return on investment

To sum up, using the eCloudManager to monitor and manage your FlexPod infrastructure, you can bring your heavy mission-critical enterprise applications to the cloud and make them easy to deliver and easy to consume as Landscape as a Service. By enabling you to deliver your IT as a Service – **Infrastructure as a Service, Platform as a Service, and Landscape as a Service** – the eCloudManager allows you to respond more quickly to business needs and transform your IT into a value driver.

Use Case	Typical Data Center	eCloudManager & FlexPod Joint Solution
Virtual and physical provisioning of enterprise workloads	Manual, error-prone, requires post-provisioning configuration, can take up to a few weeks	Leverages advanced storage features, automatic, reliable, no post-provisioning effort, ready within minutes
IT stack monitoring	Difficult, requires several tools from several vendors, and individual login for each resource	One console solution, full IT stack integration, multi-datacenter, vendor independent
Resource utilization	Inefficient, wasted hardware space	Optimal hardware allocation, increased workflow efficiency, speeds up internal expansion through ease of use
Error tracking throughout the whole IT stack	Manual, error-prone, can take up to a few hours	Automatic, reliable, based on internal processes and workflows, errors discovered within minutes
SLA enforcement	Difficult to determine whether SLAs will be met, high lead times	SLAs remain within defined parameters, potential failure to meet SLAs recognized immediately
Resource booking	Tedious process, requires permission from several departments	On-demand, full control over costs, real cloud enablement