EMC Enterprise Hybrid Cloud Solution Brings Private and Public Cloud Together

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Abstract: Due to the emergence of a new class of workloads powered by the cloud, mobile, social, and big data megatrends, IT professionals are quickly realizing that there are advantages to both on-premises private cloud and off-premises public cloud consumption models. The challenge is that it is difficult to manage and administer both together. The EMC Enterprise Hybrid Cloud solution simplifies deployment of a hybrid cloud operating model, enabling IT to become a broker of trusted cloud services sourced from on-prem private clouds and off-prem public clouds, enabling IT to support the ever-expanding set of workloads their business requires.

Emerging Class of Workloads Leads to Need for Hybrid Cloud Operating Model

Due to businesses seeking to capitalize on new revenue opportunities presented by the cloud, mobile, social, and big data megatrends, the breadth of the workloads enterprise IT is asked to support is rapidly expanding. Developers are creating and iterating applications faster than ever before and are leveraging a variety of development platforms. Enterprise IT organizations are being challenged to react quickly because businesses want to take advantage of revenue opportunities as quickly as they emerge. When IT is unable to deliver infrastructure and development services at the speed the business requires, business units now have the option of shortcutting the IT process by engaging external IT service providers directly. There is a need for enterprise IT to embrace the service offered by public cloud to satisfy the needs of workloads that are not in their core competency to support—the challenges for enterprise IT organizations lie in how to integrate public cloud services into the services enterprise IT offers through their on-prem private cloud environments. Inability to integrate the two sources of services together will lead to cloud silos in which workloads are trapped or are not properly supported over time.

IT requires a solution that:

- Supports traditional and next-generation applications.
- Provides a seamless management experience regardless of whether resources originate from on-prem private or off-prem public clouds.
- Dramatically simplifies the end-user experience.
- Provides economic transparency.
- Offers choice in the technology upon which the solution is built.
- Provides the capability to interoperate with a variety of public cloud resources.

The EMC Enterprise Hybrid Cloud Solution

The EMC Enterprise Hybrid Cloud solution enables IT to become a broker of trusted cloud services with a fully-engineered solution that enables users to consume IT services sourced from private and public clouds in a single hybrid environment. IT captures the control and visibility they require, while being able to support the on-demand self-service that users require for their workloads. The solutions can be built on Microsoft, OpenStack, or VMware cloud OS technologies and can interoperate with a wide spectrum of public clouds, including VMware vCloud Air, EMC’s Cloud Service Provider Partners, and larger public clouds such as Amazon Web Services.

Delivered as part of the out-of-box solution, EMC Engineering has integrated workflows and scripts that deliver automated self-provisioned end-user services enabled by the click of a button. Those services include infrastructure-as-a-service, data-protection-as-a-service, and platform-as-a-service for developers. Services for deploying popular enterprise applications such as Microsoft Exchange, SharePoint and SQL Server, Oracle, and SAP are also included.
IT administrators gain the advantage of automated provisioning, monitoring, metering, chargeback, automated disaster recovery, continuous availability, and the ability to provision services from public cloud resources, which allows them to embrace the hybrid cloud operating model.

**One Architecture, A Variety Of Workloads**

EMC is basing its offering on experience with its customers and the accelerating trend to embrace a hybrid cloud strategy. As businesses look to introduce IT operational efficiencies and invest in next-generation cloud applications and modern cloud computing consumption models, EMC’s goal is to create an environment where businesses and their IT organizations can choose the right cloud to put workloads in based on cost, performance, and security and then move those workloads back and forth as business requirements change.

Services are also available to help customers accelerate and simplify hybrid cloud deployment, no matter how evolved their strategy is. For customers who are “undecided,” EMC runs executive workshops to map out potential paths to cloud computing. For those who are further along in the decision process and are “motivated,” EMC offers a more engaged interaction via its Cloud Advisory Service. And for those customers who are “all in” and “ready” to deploy an EMC Enterprise Hybrid Cloud solution, EMC offers a full suite of implementation and optimization services.

**The EMC Enterprise Hybrid Cloud Federation SDDC Edition consists of:**

- **Self-Service Portal:** Hundreds of EMC-engineered workflows delivering infrastructure, data protection, and platform-as-a-service along with a variety of enterprise applications and databases come out-of-the-box.
- **Software:** VMware: vCloud Automation Center, vCenter Orchestrator, vCenter Operations Manager, ITBM Standard, Log Insight, NSX or vCNS, vSphere 5.5.
- **EMC:** ViPR Controller, Storage Analytics, Data Protection Advisor, Avamar, Recoverpoint, Data Domain, VPLEX.
- **Hardware:** Built on VCE Vblock and EMC VSPEx for accelerated deployment, or the customer’s choice of EMC infrastructure.

**The Bigger Truth**

With a hybrid cloud model, IT has the ability to improve operational simplicity while delivering support for a wide variety of workloads—both traditional and next-generation. Successfully embracing a hybrid strategy is going to include a relationship with a vendor that has the experience and technology to help bring the hybrid cloud model to business. EMC has both. The EMC Enterprise Hybrid Cloud solution enables IT to continue supporting existing applications as well as new, modern, next-generation platforms and applications using a hybrid cloud built on a cloud OS of a customer’s choice. With this, IT organizations can meet the demands of new projects and embrace the workflow automation through a hybrid cloud strategy that leverages private and public cloud consumption models together.