DELL EMC

DELL EMC VXRAIL™ APPLIANCES

Meeting state and local government needs for greater IT efficiency and cost savings

VxRail™ Appliance

• Standardized on VMware vSphere providing ease-of-management and powered by industry-leading VMware vSAN

• Handles peak performance requirements

• Rapid and automated deployment reduces operational burden

• Application uptime ensured through high-availability vSAN and other VMware software

• Start small and scale quickly as workloads grow

• One-click non-disruptive patch and upgrades

• QoS to eliminate "noisy neighbors" and confidently run multiple applications on the same appliance or within the same cluster without sacrificing performance

• Dell EMC software for data protection, Dell EMC CloudArray, and Dell EMC Secure Remote Support for proactive monitoring

THE CHALLENGE

Three quarters of State CIOs, according to a recent study[1], say that they have "developed or plan to develop strategies to migrate legacy systems to the cloud" and that the drivers include cost, security, efficiency, and agility. For state and local governments, the promise of new technology comes with unique new challenges as well. New applications, including those for remote and mobile computing, can improve citizen services and boost workforce productivity, but they confront an aging IT infrastructure with performance and data-storage demands that the original planners could not have foreseen.

Further, state and local IT personnel are barely able to keep up with the refresh cycles required by their various hardware and software components, much less adjust to today's demands for tightened service level agreements, shorter project deadlines, and shrinking budgets. Pressured to keep costs low, agencies have difficulty requisitioning specialized IT technicians – or even new real estate – to support an upgrade in IT infrastructure. They need a more modern "turn-key" IT infrastructure solution.

THE SOLUTION: VIRTUALIZED IT INFRASTRUCTURE WITH THE DELL EMC VXRAIL APPLIANCE

For many state and local agencies, virtualizing compute resources is an effective solution to the problems of higher service demand, limited skilled personnel, and lowered budgets. State agencies have frequently shown the desire to reduce physical servers through virtualization.

Leveraging hyper-converged solutions for virtualization can do more than help cut hardware expenses. It can eliminate conflicting system-refresh cycles and redundant software and greatly reduce the need for specialized IT technicians. For example, deploying a virtualized desktop infrastructure (VDI) on a hyper-converged infrastructure appliance (HCIA) gives IT the ability to put resources where they are most needed at any given time. Virtualization and HCIA can save costs of over-provisioning IT systems, of hiring expensive IT consultants, and of building out new office space for larger servers, storage, or networking gear. As a jointly developed solution between Dell EMC and VMware, VxRail Appliances are the fastest and easiest way to extend VMware environments: simplifying virtualization and putting the benefits of a software-defined data center (SDDC) within the reach of state and local agencies.

INTRODUCING DELL EMC VXRAIL APPLIANCES

Dell EMC VxRail Appliances offer hundreds of configuration options across a portfolio of powerful appliances that can be used to deploy and manage dozens or hundreds of virtual servers or virtual desktops. VxRail Appliances include a full suite of industry-leading data services, including replication, backup and recovery for data protection in a simple building block. VxRail Appliances have the power, with integrated compute, storage, and VMware software, to simplify IT operations while reducing costs. Expansion is as simple as plugging in another node and VxRail Manager™ software will automatically discover the new hardware without skipping a beat.

FAST DEPLOYMENT, EASY EXPANSION

With conventional IT systems, deployment can take months for planning, procurement, installation, and then setup, provisioning and testing. It can require the services of technicians skilled in servers, storage, networking and applications. The more time it takes for deployment, the higher the costs and the more likely the project will be stopped in its tracks or diminished in scope by budget-conscious regulators.

VxRail Appliances help users avoid these pitfalls because they are self-contained and thoroughly tested by Dell EMC before they are shipped. Wizard-based automation helps non-technical managers set up pools of virtual machines for users. It takes just a few minutes from power-on to creation of a new virtual machine.

Expansion is a simple matter of plugging in a new node. Nodes are "hot swappable," so you do not have to power them down or add new software to grow the infrastructure. In addition, VxRail Appliances have a system architecture that is predictable and repeatable, making it easy to roll-out copies of the master configuration into other agencies or departments without requiring new testing or troubleshooting.

SIMPLIFIED MANAGEMENT

More than 200 automated workflow processes simplify setting up virtual infrastructure for maximum benefit. Clear, user-friendly wizards guide users through assigning resources, restructuring user pools, moving workloads, building out clusters, evaluating performance, and activating new software updates. With VMware software at the heart of VxRail Appliances, users can be confident in managing their VxRail Appliance infrastructure with the familiar off-the-shelf VMware management and operations tools. This familiarity makes it easy to respond quickly to sudden demands for greater capacity—the kind that can come from I/O storms caused by VDI users suddenly logging in on Monday mornings or after a holiday, for instance.

From a VDI perspective, in addition to managing VMware Horizon with View, VxRail Appliances can manage non-VMware desktops from Citrix and other popular vendors. VxRail Appliances are managed with VMware vCenter, empowering any sized IT group to easily manage their infrastructure using existing tools.

UNYIELDING AVAILABILITY AND SUPPORT

Benefit from availability and reliability features for VxRail Appliances, such as

• 24/7 global support for all appliance hardware and software

• Remote "heartbeat" monitoring, diagnostic, and repair with proactive fault detection

• High-availability system design with maximum component redundancy

• Automated operational and disaster-recovery orchestration for VMs, including local and remote hypervisor-based replication and continuous data protection for per-VM recovery to any point in time

• World-class support from Dell EMC's single-point-of-accountability philosophy

THE IMPORTANCE OF IT CONFIDENCE

VxRail Appliances promote confidence in your IT infrastructure because it is a pre-configured, pre-tested solution jointly developed by Dell EMC and VMware who are trusted by large and small organizations around the world, and backed by a single point of 24/7 global support for all appliance hardware and software. With VxRail Appliances, you can be confident that your virtual infrastructure will work today and will keep you on the path to more innovative technologies, from cloud computing to a software-defined data center in the future.

CONTACT US

To learn more about how VxRail™ Appliances can help solve your business and IT challenges, contact your local representative or authorized reseller—or visit us at the EMC Store.

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