SOLUTION BRIEF

AT A GLANCE
• Achieve rapid time to value and cloud-scale elasticity in your environment and focus on delivering new digital medical services.
• Simplify the management of infrastructure and end-user devices while improving patient outcomes.
• Support key legacy applications that deliver critical clinician and patient services on modern infrastructure.
• Centralize entitlement and security using existing tools and skillsets while quickly onboarding staff with an accelerated path to employee productivity.
• Optimize cost with predictable OpEx through As A Service Consumption Model and get out of the hardware procurement business.

Executive summary
The acceleration of technology continues to drive Healthcare organizations to embrace Virtual Desktop Infrastructure (VDI) and published apps as it goes through its own digital transformation process. In the healthcare environment, VDI can aid in improving patient outcomes, securing and protecting patient information, supporting legacy applications, enable an increasingly mobile workforce, scale to meet the demands of an ever-changing health environment, and maintain regulatory and compliance postures. Deploying VDI on VMware Cloud on Dell EMC provides organizations a way to quickly deploy on a managed service without becoming an expert on VDI infrastructure.

Key benefits
• Simplify desktop image and application delivery to clinicians anytime, anywhere, and on any device no matter where they are working from.
• Ensure all employees and contractors have access to only the necessary current and legacy applications, regardless of the device they are using.
• Leverage existing VMware tools and skillsets to deliver consistent operations and security for your VDI and healthcare infrastructure.
• Eliminate infrastructure management overhead and local IT while supporting VDI and published application workloads that enable healthcare providers, freeing up resources to increase productivity.
• Full support of key Horizon technical capabilities, including Cloud Pod Architecture (CPA), Instant Clone and Just-in-time Management Platform (JMP).
• VMware Cloud on Dell EMC, consumed as a managed service, optimizes resource cost with predictable OpEx through an as-a-Service Consumption.

Digital transformation for healthcare
Digital transformation has revolutionized every industry, but in healthcare specifically, technology is helping us live longer and lead safer, healthier, more productive lives. While traditional medicine involved patients picking up a phone to call doctors, going to their appointment, and waiting days for results, things are drastically changing. Emerging technologies like Telemedicine, AI and Data Analytics, Wearables and IoT, Blockchain, and Cloud are transforming the healthcare industry. This advanced technology is now the new normal in healthcare and organizations must embrace them while maintaining high standards for security and compliance.

To keep pace with the digital transformation of healthcare and patient expectation for immediate access to practitioners and their medical information, hospitals must securely enable doctors and other medical personnel to deliver healthcare faster than ever before. With VDI powered by VMware Cloud on Dell EMC, organizations can deliver healthcare and technology capabilities enabling agility, consistency, and security with predictable as a service consumption and economics.
VDI and Published Applications for Healthcare Powered by VMware Cloud on Dell EMC Managed Services

Benefits of VMware Cloud on Dell EMC running VDI for healthcare

Mobility

The practice of medicine is more mobile than ever before, thanks to the use of mobile devices and telemedicine. Clinicians are also constantly on the move going from patient to patient in traditional healthcare facilities.

In non-VDI environments, as clinicians move between patients, they spend significant amounts of time authenticating to systems and applications. Multiply that lost time across multiple patients; this waiting on the login experience leads to inefficiency, less time focusing on patient care and outcomes, and an annoying user experience for the clinician. With VDI’s ability to centralize authentication and authorization, the login process can be significantly accelerated allowing for clinicians to focus on patient care without having to wait for the technology to catch up.

VDI also increases clinician mobility by providing a remote access alternative over traditional and cumbersome VPN technologies. Hospitals that implement VDI can offer clinicians and other medical personnel a BYOD experience that can let them access their personal desktop environment from organizationally approved devices. This not only improves mobility but provides a more flexible work experience with efficient access.

Legacy application support

Legacy systems and applications in a healthcare environment can mean different things to different organizations. “Legacy” can be classified as systems that have been in the organization for years supporting critical clinical processes and applications that are homegrown, operating on obsolete hardware or operating systems or ancient programming languages. Using VDI and published apps on VMware Cloud on Dell EMC provides a path for organizations to virtualize these applications without refactoring and securely deliver them to medical personnel through and on-premises cloud.

Securing PHI and EMR

Security of Personal Health Information and Electronic Medical Records is paramount in any medical environment to comply with security and compliance regulations and
maintain patient trust. In non-VDI environments, every end-user endpoint and mobile device is an entry point into an organization’s attack surface that needs to be managed and updated. Hybrid VDI on VMC on Dell EMC allows healthcare IT and security teams to have a much higher degree of control over sensitive medical information. In VDI environments, endpoints and mobile devices only access and display desktop environments with all data being stored in a secure on-premises cloud. This centralized control drastically shrinks an organization’s attack surface while allowing expansion of BYOD since no sensitive data is stored on the device itself.

**Increase efficiency while reducing costs**

Powering VDI with VMware Cloud on Dell EMC in healthcare environments allows organizations to avoid costly hardware refresh cycles for infrastructure required to deploy VDI. This allows organizations to adopt a more predictable cost model when it comes to deploying VDI while getting out of the infrastructure management business freeing up resources to work on more strategic activities.

**Benefits VMware Cloud on Dell EMC managed service for healthcare**

**Reduce operational complexity**

Since VMware Cloud on Dell EMC is a fully managed service, organizations can drastically simplify the management of IT infrastructure for healthcare. VMC on Dell EMC simplifies operations from ordering the physical infrastructure itself, deployment, patching, and upgrades of hardware and software, monitoring and remediation, while providing a global view of all your healthcare infrastructure across the organization.

**Consistent infrastructure, operations, and security**

VMware Cloud on Dell EMC integrates VMware’s industry-standard compute, storage, and networking software with enterprise-class Dell EMC hardware, empowering you to drive VDI or healthcare workload using familiar VMware tools and skilllets. Additionally, VMware Cloud on Dell EMC provides intrinsic security like encryption, micro-segmentation and, the ability to keep data in specific geographic regions to meet any sovereignty requirements.

**Accelerate innovation**

The infrastructure provided by VMware Cloud on Dell EMC is completely managed by VMware, whether it is deployed in your datacenter or edge locations. This empowers your VI admins to focus on developing the best infrastructure for your organizational goals, including continued support of legacy applications and creating the flexible, automated infrastructure required by modern applications. This unique approach empowers you to focus on business innovation and differentiation, while VMware operates the entire infrastructure end-to-end.

**Predictable cost**

Historically, the acquisition of IT infrastructure was treated as a capital expenditure that had to be refreshed based hardware supportability, application performance, and other factors. This required IT professionals to go through costly procurement cycles, taking away focus from operations. Since VMware Cloud on Dell EMC is a subscription service, there is no hardware to purchase, so organizations can take advantage of predictable OpEx cost models and resource transparency for on-premise healthcare site infrastructure just like in the public cloud.

Learn more at [URL](#)