

DELL EMC SOLUTIONS FOR STATE AND LOCAL GOVERNMENT

Transform for the Future to Benefit and Protect the Citizens You Serve



STATE AND LOCAL GOVERNMENT: INNOVATING FOR THE 21ST CENTURY

Today's state and local governments have a tremendous opportunity to better serve their citizens through technology. Thanks to technological advances including the cloud, mobility, and big data, agencies are finding new ways of improving access and delivery of government services while driving innovation through new efficiencies and cost savings.

As a result, state and local governments are equipped to move IT into the 21st century and implement modern converged infrastructures that are open, affordable and efficient.

OPPORTUNITIES AND CHALLENGES

The state and local government workplace is rapidly changing as technology continues to move to the forefront. Influenced by these technology advances, government agencies have many opportunities – and challenges – as they strive to innovate.



SOME OF THE KEY OPPORTUNITIES ARE:



Cloud Adoption

Cloud adoption is on the rise, as more and more cloud service providers create solutions specifically designed to meet public sector needs and compliance requirements. According to the Center for Digital Government's 2016 Digital Cities Survey, 91 percent of cities that responded have nearly one-third of their applications and systems in the cloud.



Mobility

Mobility continues to lead the way when it comes to applications, with 95 percent of Americans now owning a cell phone and approximately 50 percent owning a tablet. Because of this trend, citizens and workers now expect their government agencies to support mobile device applications so they can access information, perform transactions and conduct business anywhere, anytime. In response, state and local governments are offering downloadable apps and using responsive web design.



Big Data and Analytics

Government is one of the biggest producers of data, and a wealth of structured (e.g., databases, forms) and unstructured (e.g., video files, photographs, emails and data files) data resides within government organizations. Agencies that can harness this data will be poised to provide services and create new efficiencies.



Emerging Technologies

Smart cities are using Internet of Things (IoT) devices and sensors to generate real-time data about everything from power consumption to traffic patterns and pollution levels. The global smart cities movement is expected to generate a total of \$41 trillion in new spending over the next 20 years, transforming how government makes investments in technology and infrastructure.

AT THE SAME TIME, AGENCIES ARE FACED WITH SIGNIFICANT CHALLENGES, INCLUDING:



Cybersecurity

Cybersecurity continues to be the number one priority for government IT leaders today. State and local governments, like all organizations today, are highly concerned about their systems being compromised through hacks or ransomware attacks. And as many government organizations increase their use of mobile devices and applications, they are challenged to effectively manage and secure not only organization-provided devices, but also personal devices that employees bring into the workplace.

However, not all state and local governments have funding in place to improve their cybersecurity positioning. And cloud services, mobile initiatives and other innovations add complexity and risk without proper management in place.



Cost Reduction

Because personnel costs make up 55 percent of local government budgets and 20 percent of state budgets¹, it is critical that organizations maximize the value of their workforce investments. The problem? IT is often considered a burden to agencies, even though agencies rely heavily on IT to deliver services to citizens.

As state and local governments look to stretch their dollars in the face of legislative funding shortfalls, they are seeking to consolidate IT resources while optimizing and leveraging new technologies.



IT Modernization

Most government agencies do not have modern data centers, and many of them are running their critical business applications on aging legacy equipment. Lacking modern infrastructures, agencies need virtualization and converged solutions to enable innovative services delivered through IT-as-a-service offerings.





Labor

A rapidly aging population is leading to a “Silver Tsunami” of retirements. In fact, about one-fifth of the U.S. population will be 65 or older by the year 2030². These retirements, along with a shortage of skilled labor in specific areas, threaten continuity and productivity in many agencies today.

Additionally, millennials comprise more than one-third of all workers, and they will make up 75 percent of the workforce by 2025³. These younger workers rely on technology in their personal lives and expect it in the workplace. To attract and keep talent, organizations need to provide modern tools and opportunities for collaboration, communication and innovation to keep workers engaged and productive.



Data Access

Employees who can quickly and easily access meaningful data can make faster, better-informed decisions. This is especially important for first responders and other public safety workers, and it drives productivity for case managers, healthcare providers and public works employees.

State and local governments need to store their data in modern, secure, high-performance data storage systems that enable fast, easy access. As a result, employees can have real-time decision support and operational insight; provide more efficient services; reduce errors and redundancies; and improve communication and service delivery.

Sources:

1. Center on Budget and Policy Priorities 2. United States Census Bureau 3. The Brookings Institution

Helping State and Local Governments Cut Costs

State and local governments facing ever-tightening budgets can deploy cost-effective Dell EMC PowerEdge servers – while still gaining the superior performance they need to support modern services for citizens.

Larger agencies with higher compute resource requirements can reduce costs while enabling flexibility through Dell EMC Converged and Hyper-Converged compute and storage solutions such as VxRail, Vblock and VxRack. These solutions help consolidate data center footprints, so agencies can operate more efficiently and with fewer staff.

State and local governments can also overcome budget hurdles by working with Dell Financial Services (DFS) to procure solutions. DFS offers lease, lease-to-own and other structured payments plans designed to fit agency budget cycles. In addition, Dell EMC offers national contracts to make the procurement process as simple as possible.



MOVING AHEAD THROUGH DIGITAL TRANSFORMATION

We are now at the intersection of traditional and new IT. To overcome the numerous obstacles they face today, state and local governments must move quickly to adopt new technologies and invest resources wisely to leapfrog older technologies and become future ready.

At Dell EMC, we believe this requires Digital Transformation, which can turn your IT into an agile and efficient innovation engine that can better meet, exceed, and anticipate citizens' demands by being more responsive to your constituents.

Agencies embracing Digital Transformation must change in three key areas:



IT transformation

Where IT organizations create a modern infrastructure to enable digital transformation



Workforce transformation

Where IT creates a truly digital work environment



Security transformation

Where data is secure in transit and at rest, and where IT drives value to the organization as it creates a new kind of security strategy for IT, the workforce and the agency.



DELL EMC: GUIDING YOU THROUGH YOUR TRANSFORMATIONAL JOURNEY

Dell EMC is a leader in enabling state and local governments to transform their operations and deliver IT as a service. Using Dell EMC solutions, state and local governments can simplify the digital transformation journey through converged and hyper-converged technologies, system virtualization and comprehensive solutions – from the edge to the core to the cloud – that provide deep functionality built to meet the demands of the 21st century government.

Dell EMC enables digital transformation through the connected Dell Technologies family of brands: Dell, Dell EMC, Pivotal, RSA, SecureWorks, Virtustream, and VMware. Through these brands, we offer a wide range of products and solutions for state and local governments. All our solutions have integrated security capabilities and are fast to deploy and easy to maintain.

Dell EMC technologies are designed to enable:

Efficient Government Transformation

Transforming your IT efficiency is critical for innovation, creating a foundation that enables organizations to rapidly, cost-effectively and securely deploy new capabilities and expand capacity as data volumes grow, new regulatory requirements come into play, and new end user expectations are created.



DELL EMC TECHNOLOGIES THAT SUPPORT EFFICIENT GOVERNMENT TRANSFORMATION:



Converged and Hyper-Converged Solutions

Designed to bolster agencies' IT modernization efforts, solutions include Dell EMC Vblock and VxBlock, VxRail.



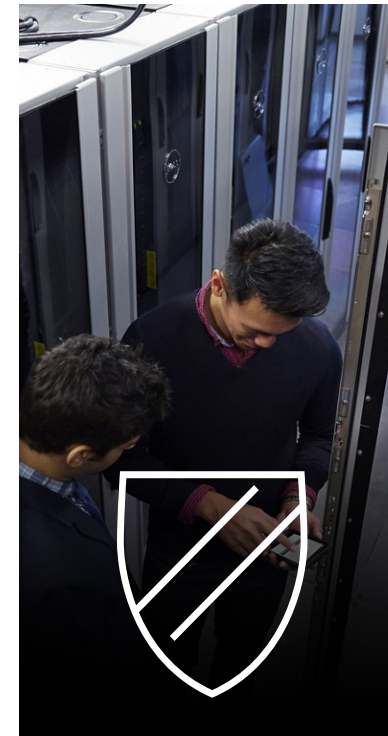
Consolidated Storage and Server Solutions

Dell EMC offers a full range of data center technologies, including Dell EMC PowerEdge rack and tower servers; PowerEdge modular FX, VRTX and blade servers; Dell EMC Networking switches; VMware NSX network virtualization platform; and Dell EMC VMAX, Isilon, Unity and XtremIO all-flash storage arrays.



Cloud and Hybrid Cloud Solutions

Cloud and hybrid cloud technology solutions include Dell EMC Elastic Cloud Storage (ECS), Isilon, CloudArray, Enterprise Hybrid Cloud Solutions (EHC), CloudConnect, VMware vCloud Air, VirtuStream and Pivotal Cloud Foundry.



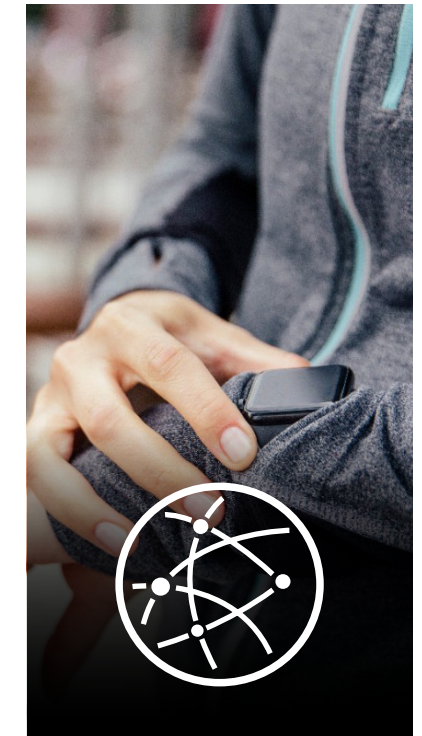
Data Protection Solutions

Offering data protection from client to edge to core to the cloud, data protection solutions include Dell EMC VPLEX; RecoverPoint; Avamar and Data Domain backup and recovery solutions; NetWorker backup software; PowerVault storage; and the CloudBoost platform



Big Data and Analytics Solutions

Solutions include the Greenplum data compute appliance; Dell EMC IoT Gateway; Dell EMC Isilon and ECS Data Lakes; and Pivotal.



IoT (Internet of Things)

Dell EMC IoT solutions such as NSX and Dell EMC IoT Gateway help you support smart city solutions that integrate IoT devices, sensors, license plate readers, and video surveillance services.





CUSTOMER SUCCESS STORY: GEORGIA STATE BOARD OF WORKERS' COMPENSATION

The Challenge

The Georgia State Board of Workers' Compensation (SBWC) needed to improve its service quality in claims management for internal staff and stakeholders within the workers' compensation system, to ensure 24/7 uptime and support 2,500 concurrent users. However, SBWC had operated on an outdated system for nearly a decade and wanted to upgrade its IT environment to deliver a more stable and productive user experience.

The Solution: A New Dell EMC IT Infrastructure

SBWC and Dell EMC redesigned the agency's network architecture, deploying five Dell EMC PowerEdge R730 rack servers as host servers in a virtualized environment based on VMware vCenter Server and Site Recovery Manager. SBWC then implemented Dell EMC PS6210E storage arrays with a combined 48TB of storage space, and replaced legacy network switches with faster 10GbE and 1GbE Dell EMC Networking N-Series switches. Finally, SBWC set up a disaster recovery system at a field office, with additional Dell EMC PowerEdge servers and Dell EMC storage arrays.

Benefits

- 50% Reduction in IT Administrative Time
- 80% Improvement in User Efficiency
- Reliable Disaster Recovery and Backup Solutions



The new ICMS system is quicker at processing claims as well as more robust. What took ten clicks now takes 3.”

—Delece Brooks, Executive Director,
Georgia State Board of Workers' Compensation

Simplifying Your Journey to the Cloud

State and local governments are embracing the cloud, but they often need help on their migration journey. Dell EMC can assist by providing cloud and hybrid cloud solutions that help create agility and flexibility. Through innovative cloud products and services, Dell EMC accelerates the cloud journey to help you serve, store, manage, protect and analyze your information in an agile, trusted and cost-effective way.

Using Dell EMC Enterprise Hybrid Cloud (EHC) Solutions, you get the benefits of a converged infrastructure solution along with a management console and a service catalog that enables you to provide shared services to both end users and other agencies. Additionally, you can take advantage of Virtustream cloud management software to swiftly and easily move existing mission-critical applications to the private, public or hybrid cloud. Virtustream complies with key federal data security regulations such as FedRAMP and CJIS.



CUSTOMER SUCCESS STORY: CITY OF VIRGINIA BEACH, VIRGINIA

The Challenge

Virginia Beach, Virginia, is a modern and growing city, but it was limited by technologies that could no longer adequately support the city's services. The city's aging infrastructure was hard to maintain and required additional administrative overhead because of the need for different skillsets. Virginia Beach needed to deploy a new, more sophisticated IT infrastructure that could empower customers and citizens with technology innovations.

The Solution: Dell EMC Converged Infrastructure

The city worked with Dell EMC to implement a Dell EMC Vblock-based converged infrastructure and Dell EMC Isilon storage technologies. Vblock Systems gives the city a building-block approach that enables it to quickly scale its infrastructure, rather than replacing components, when more processing power or storage capacity is required. With the new solution, the City of Virginia Beach has a single unified platform to scale, secure, and efficiently operate its applications.

Benefits

- **Modern, Forward-Thinking Infrastructure**

The city's new technologies are designed to meet its current needs, with the necessary scalability to meet future projected growth.

- **\$675,000 in Annual Savings**

The city expects to save more than \$675,000 per year in maintenance, labor, and power and cooling costs, while avoiding the expense of \$1.2M to upgrade the legacy storage systems. The city also anticipates a payback in 3.99 years and a 5-year return on investment of 25.2%.

- **Reduced Risk of Service Interruption and Possible Data Loss**

With Dell EMC Vblock Systems, the city's backups are reduced to only 4 hours and recent data can be recovered in minutes: greatly reducing the loss of data in the event of a disaster.



Our mission to deliver a dynamic and evolving set of core services and innovative technologies that the citizens demand is critical. Dell EMC is helping the City of Virginia Beach achieve this mission by enabling us to develop and implement the best technology solutions to meet those demands. Vblock Systems helps make this possible by providing the agility and scalability to meet growing data management needs and to deliver services that support the real-world needs of the community.”

— Matthew Arvay, former CIO, City of Virginia Beach, VA



WORKFORCE TRANSFORMATION

Providing staff and citizens with secure and up-to-date data empowers them all to make better informed decisions, helping to reduce errors or duplication of efforts and improving overall communication and service delivery. Workforce transformation can also be enabled through powerful and flexible mobile devices and tools that help you attract and retain workers.

Dell EMC technologies for Workforce Transformation include:



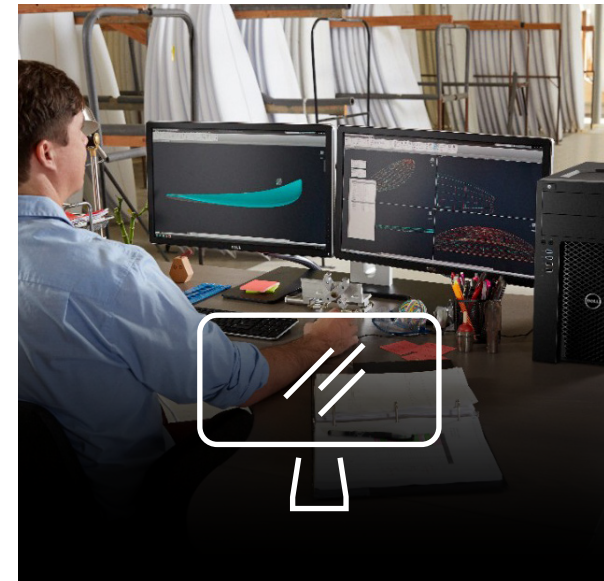
Innovative Mobile Solutions

Dell EMC offers the right mobile devices and tools for your needs, including Dell Latitude laptops, Dell Latitude Rugged laptops, and Dell XPS laptops.



Flexible Desktop Solutions

Designed with maximum flexibility to meet the demands of all employees, Dell EMC features Dell Inspiron desktop PCs, Dell XPS desktop computers, and Dell All-in-One PCs.



Dell Precision Workstations

Dell EMC Precision Tower Workstations offer high performance and customization to power professional applications, while thin and light Dell EMC Precision Mobile Workstations are designed to support today's demanding business applications.



Virtualized Computing Solutions

Dell EMC virtualized desktop infrastructure (VDI) solutions feature Dell EMC VMware Horizon virtual desktops and Wyse thin clients.





CUSTOMER SUCCESS STORY: LOS ANGELES POLICE DEPARTMENT (LAPD)

The Challenge

To improve efficiency and mobility for its officers on the streets of L.A., LAPD wanted to deploy laptops throughout the organization. Because squad cars are not ideal for devices, LAPD needed rugged solutions to provide mission-critical reliability under the most extreme conditions.

The Solution: Dell Latitude Rugged Notebooks

LAPD deployed Dell Latitude Rugged notebooks in the trunks of squad cars, with dash-mounted touch-screen monitors and keyboards connected to the devices.

Benefits

- Protecting officers and IT in all situations and environments
- Reliably running up to 10 programs a day
- Increasing public safety by boosting efficiency and enabling officer agility



It's critical that our notebooks are always available — especially when we're dealing with potentially life-threatening situations. Dell Rugged notebooks are always running, and they just operate like they're supposed to."

—Jim Stover, Officer, LAPD

Dell EMC Consulting Services for State and Local Governments

Dell EMC offers a full range of consulting and professional services to help state and local governments design, configure and implement modern data center, and other, solutions to aid in the digital transformation process. These services include:

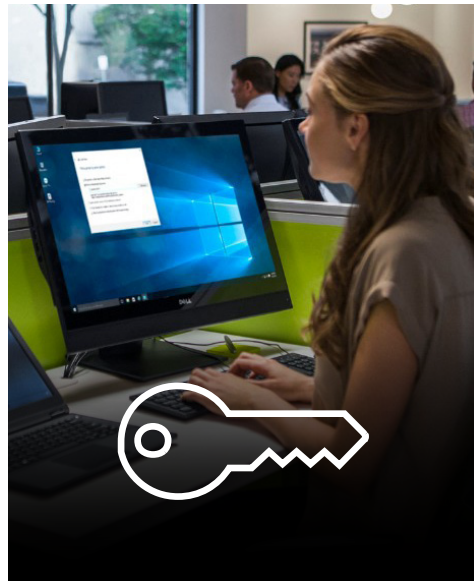
- Big Data, Data Management & Analytics
- Cloud & Mobile Application Development
- Consulting for Enterprise Application Cloud Workloads
- Data Protection Assessments & Services
- Enterprise Architectures, IT Strategy & Transformation
- IT Assessment, Design & Implementation
- ITIL & ITSM Consulting
- Migrate, Modernize & Optimize IT
- Residency Services
- Security Services, Governance & Frameworks



CYBERSECURITY TRANSFORMATION

At Dell EMC, security is more than just an add-on to an existing product. It's integrated into every solution, part of a holistic security approach that eliminates gaps in security and governance strategies to mitigate risk, comply with regulations and help your agency thrive in a connected world.

Dell EMC technologies for Cybersecurity Transformation include:



End Point Security

Protect your devices with features such as VMware AirWatch enterprise mobility management technology and RSA, which delivers advanced threat detection, cyber incident response, and identity and access management.



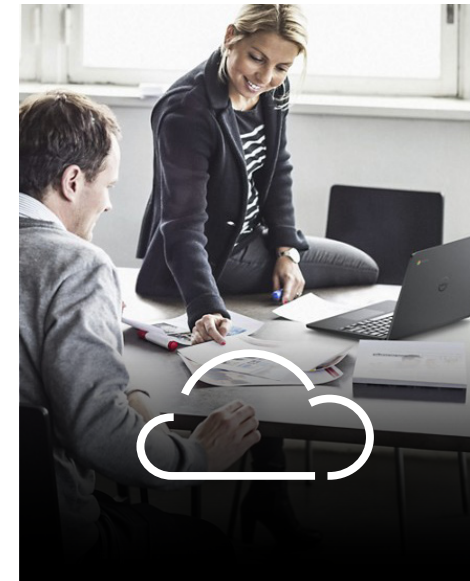
Governance and Compliance

Take advantage of the RSA Archer GRC platform to create a common set of capabilities and methodologies to support your risk and compliance requirements.



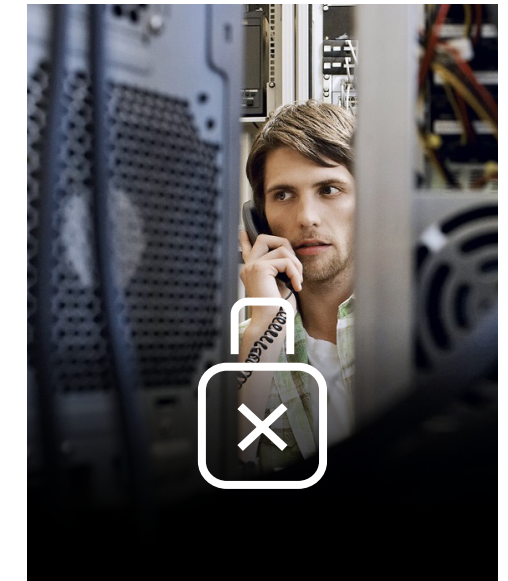
Security Analytics

Using SecureWorks and RSA, you can gain security-as-a-service capabilities that drive comprehensive analytics.



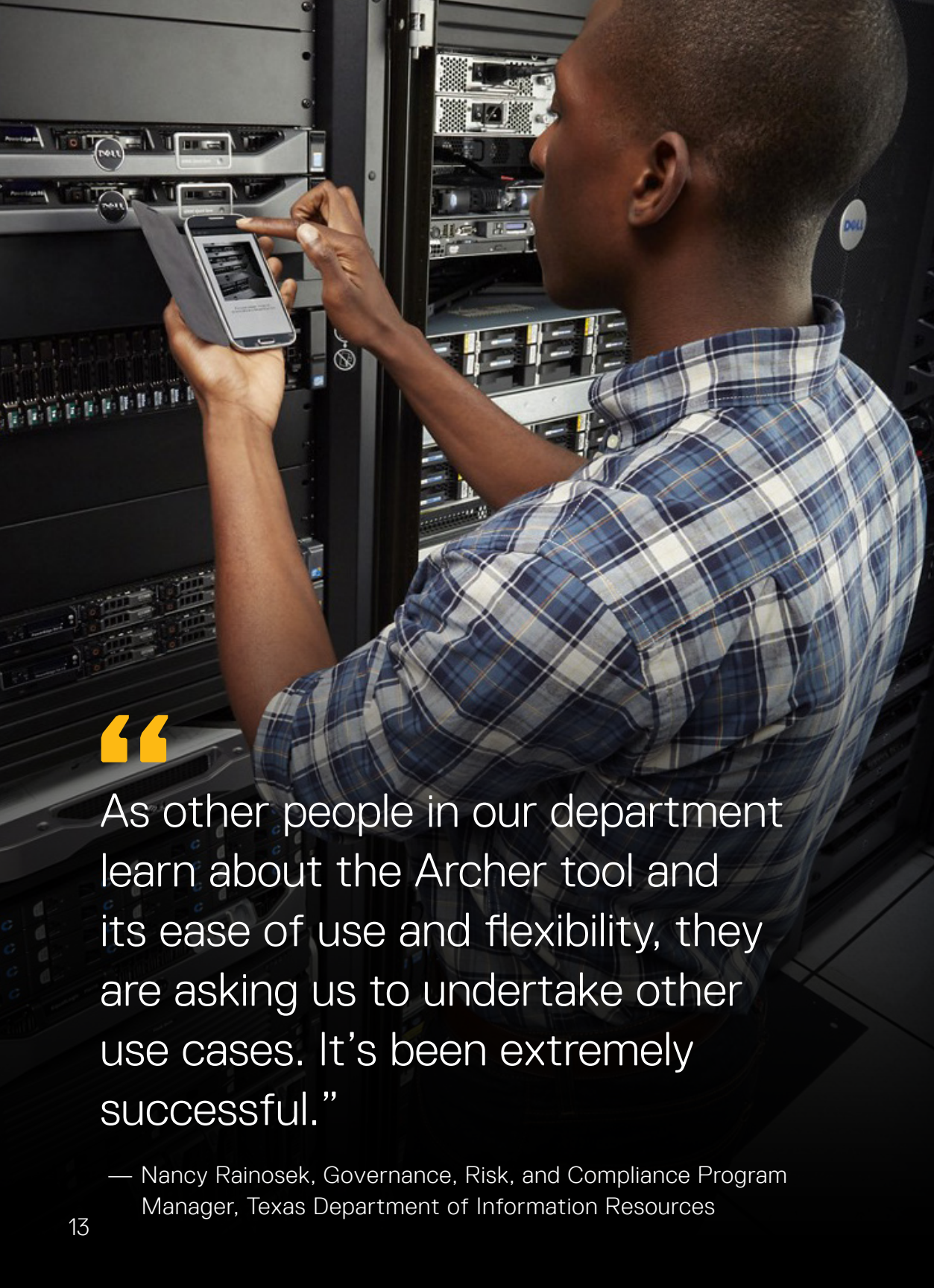
Cloud Security

Use Virtustream to run your most complex, critical applications with the security and resilience your agency needs.



Data Protection

Back up and protect your most critical data by using Dell EMC VPLEX; RecoverPoint; Avamar and Data Domain backup and recovery solutions; NetWorker backup software; PowerVault storage; and the CloudBoost platform.



CUSTOMER SUCCESS STORIES: TEXAS DEPARTMENT OF INFORMATION RESOURCES

The Challenge

The Texas Department of Information Resources manages large amounts of information for many different agencies and higher education institutions across the state. Its systems and processes, though, were outdated and cumbersome and created inefficiencies throughout the organization.

The Solution: RSA Archer

The department chose to deploy RSA Archer, taking advantage of the solution's enterprise, policy risk, compliance and incident modules.

Benefits

- **Centralizes Reporting**
With RSA Archer, all risk assessments and security incident reports are now in one tool, giving the department the ability to see where the key risks are across the state.
- **Provides Easy Access to Common Tools**
With the implementation of RSA Archer, all Texas state agencies and higher education institutions now have access to the same tools, regardless of their size or budget.



As other people in our department learn about the Archer tool and its ease of use and flexibility, they are asking us to undertake other use cases. It's been extremely successful."

— Nancy Rainosek, Governance, Risk, and Compliance Program Manager, Texas Department of Information Resources



CONCLUSION

To narrow the gap between citizen expectations and government performance, agencies must upgrade mission-critical legacy systems with technologies and services that support integration with reliable, secure infrastructures.

With Dell EMC solutions for state and local government, you can transform your organization for the future with proven strategies and government-focused technologies that benefit and protect the citizens you serve.

Next Steps

For more info, go to www.dell EMC.com/en-us/industry/state-local-government.htm.
Or contact your Dell EMC State and Local Government representative at 800-568-6235.



DELLTechnologies



DELL EMC

Pivotal

RSA

Secureworks

virtustream

vmware