Meeting the Future Head On

Education is changing. Interactive whiteboards are replacing blackboards, PCs and tablets are taking the place of reference books, and students are demanding greater flexibility in where, when and how they learn. As students and staff embrace one-for-one initiatives, as well as online and blended learning environments, how can today’s cash- and-resource constrained K–12 institutions support them? How can school district IT teams enable greater access to data and applications on the devices students and staff carry while maintaining information privacy and security? How can schools improve standardized testing, ensure the delivery of Common Core–compliant digital content, and advance personalized learning goals?

Blended learning is a formal education program that combines two learning modes: online delivery of content and instruction (with some student control over time, place, path or pace) and supervised learning at a brick-and-mortar location away from home. This approach blends face-to-face instruction with online learning to achieve greater personalization. “This is the future of education,” asserts Mike Martirano, superintendent of St. Mary’s County Schools in Maryland. “A number of students require a different delivery model and we need to recognize that. Have an open mind, embrace it and move forward with a level of urgency.”

Forward-looking K–12 districts are meeting the future head-on with VMware Horizon Suite. They are using “follow me” learning workspaces to deliver the information students, teachers and administrators need, when they need it, while giving IT staff the ability to easily provision, secure and manage desktops, applications and data from a centralized location. As a result, school districts are able to deliver the cost-effective, flexible, highly available education services that help improve student learning.

Anytime, Anywhere Access for Students and Staff

Through the power of virtualization, VMware provides students and instructors with remote access to educational materials on demand. No longer confined to the location and capability of a single desktop, users can access whatever desktop or application they need from virtually anywhere—in a classroom, at the library, at a restaurant, while traveling, or at home. Horizon virtual workspaces enable users to access their personal desktops, applications or data from any number of devices—from smartphones and tablets to PCs, thin clients and zero clients—over both local and wide area networks. After learning with the aid of one device, students and staff can simply log out and log in to another by using their unique username and password. Their desktops, applications and data can truly follow them throughout their day. Included encryption protects sensitive personal data, helping to ensure data privacy for students, educators and staff on their devices of choice.

Reduced Costs for IT

Virtual desktop infrastructure (VDI) helps school districts streamline both capital and operating expenses. IT teams can purchase thin clients instead of traditional, more costly desktop PCs and terminals, and convert legacy systems into thin clients. Administrators can securely support and embrace new initiatives such as bring your own device (BYOD) policies that further help defer PC costs. By separating applications and data from
VMware is the future of education technology. By virtualizing our environment, we provide a streamlined infrastructure for students and teachers that allows them to access the educational resources they need from wherever they are. VMware changes the way schools think about everything, from IT support, to planning new projects, to budgeting. It seems like every time I turn around, something else good comes from launching our VMware virtualization projects.”

− Julie Bohnenkamp
Director of Technology
Center Grove Community School Corporation

end-user devices and storing them in easier-to-manage data centers, district IT teams can also use virtualization to drastically reduce operating costs. The result is lower TCO. For budget-conscious schools, these savings are critical. But lower cost is just the beginning. Virtualization can also help improve education delivery and information security.

Standardized Testing and More Secure Learning for Everyone

Many school districts are now using VMware Horizon View™ virtual desktops to deliver popular Pearson educational solutions to student endpoint devices. Horizon View is certified to deliver Pearson TestNav. The TestNav Qualified program using the VMware solution helps districts and schools do the following:

- Expand their range of technical options for managing local infrastructure and delivering high-quality instruction
- Leverage or extend the useful life of existing investments in hardware, software, local networks and lab environments to run TestNav reliably
- Enable students to test within the same technology environments or platforms with which they are already familiar and comfortable
- Improve the likelihood of a positive student testing experience
- Achieve technology readiness for online testing

In addition, virtualized Pearson SuccessMaker and Waterford Early Learning can be accessed by Windows, Macintosh and Linux desktops, netbooks and laptops; iPhone operating system (iOS) and Android tablets, including iPads and Galaxy tablets; and thin and zero clients.

With Horizon, a school district can deploy Pearson solutions through a familiar, personalized Windows environment as a managed service—from several different types of devices—anywhere and at any time. The solution enables IT administrators to maintain centralized control, operational efficiency, and the security of virtual desktop systems, applications and associated data from the data center, rather than from a user’s device. Moreover, Horizon View eliminates the need to rebuild or reimage physical desktops and applications, which can be resource-intensive and costly. No direct onsite intervention by IT support personnel is required, eliminating downtime when students and staff cannot use their computers, tablets or mobile devices.

Horizon also enables overburdened district IT personnel to manage virtual desktops from the data center or through remote administration. IT staff can easily configure the virtual desktop environment, create administrators, provision and deploy virtual desktops, and deploy a self-service application catalog. IT can also set up user authentication, configure policies and manage virtualized applications. And to further protect data, including standardized tests and their results, all information is stored in the data center. No confidential data is left on tablets, smartphones, laptops, PCs or other devices that can easily be stolen.

Experience Virtually Limitless Learning

Horizon Suite uses virtualization to help improve learning while reducing costs and IT burdens, making it an ideal solution for next-generation education environments. K–12 school districts can virtualize “follow me” workspaces to keep up with changing technology and make online and blended learning a reality (see Figure 1). Horizon Suite consists of three products—VMware Horizon View, VMware Horizon Mirage™ and VMware Horizon Workspace™—that can be purchased as a complete solution or separately to meet the needs of your K–12 learning environment (see Table 1).
“Desktop virtualization gives teachers and faculty a better desktop experience; eases IT repair and management; cuts costs; and enables the school district to adapt readily to advances in educational tools and methods.”

− Jay Cawley
Director of Technology
Morgan County Schools

Figure 1. Complete Solution Meets Needs of Students, Staff and IT

<table>
<thead>
<tr>
<th>VMware Horizon Suite</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>VMware Horizon View</td>
<td>Desktop and application virtualization</td>
</tr>
<tr>
<td>VMware Horizon Mirage</td>
<td>Centralized image management for local deployment</td>
</tr>
<tr>
<td>VMware Horizon Workspace</td>
<td>Multidevice access to applications, data and desktops</td>
</tr>
</tbody>
</table>

Table 1. Choosing the Right Solution for Your School District
Support For Your District

To help your school district get started, VMware offers academic pricing and the Horizon View Rapid Desktop program. The program enables the rapid deployment of VDI desktops on a known and proven configuration with preinstalled and preconfigured software; it’s intended for proof-of-concept and production environments.

For more information about Horizon Suite or the Horizon View Rapid Desktop program, call 877-4VMWARE (outside North America, +1-650-427-5000), visit http://www.vmware.com/products or search online for an authorized reseller.

---