

5 Warning Signs It's Time To Rethink Branch IT

Embrace zero branch IT for greater data protection, better agility, maximum business continuity, optional performance, and lower TCO.

Edge sites such as branch offices, manufacturing sites, warehouses, retail stores, and customer service centers are the front lines of the business in today's extended enterprise. As businesses look for ways to enter new markets, be more responsive to customer needs, attract and retain talented employees, and support general growth, these global organizations continue to expand operations by adding new locations.

As the number of remote locations continues to increase, organizations find themselves purchasing and deploying more infrastructure to reliably deliver applications and data to support users and customers. Today, nearly half of annual IT budgets are spent supporting these remote operations¹.

In addition to these costs, organizations face a number of other challenges with branch IT. Applications and data are harder to protect, application performance is harder to manage, and business continuity is harder to ensure. As a result of these complexities, many organizations are rethinking branch IT. Here are 5 warning signs it's time you do the same.

Your 5 warning signs:

- 1. You are finding it increasingly difficult to protect data at remote locations.
- 2. Your backup processes are outdated and difficult to manage.
- 3. You struggle to manage costs when running branch apps, but can't compromise performance or end-user experience.
- 4. You take days or weeks to recover sites when downtime occurs.
- 5. Your remote sites are becoming mini-copies of your data centers.

 $^{^{\}rm 1}$ Data Center and Branch Office Resiliency, Riverbed, February 2015

Warning sign #1: You are finding it increasingly difficult to protect data at remote locations.

The average corporate data center supports 55 branch offices or remote locations², as annual data volumes across the enterprise grow by 40%3. This proliferation of sites and data underscores the importance of remote locations in driving business productivity and growth.

The result is an increased complexity tied to managing this data sprawl. Branches and remote locations generally lack the continuous protection mechanisms employed at the data centers to safeguard data from risks. So supporting these islands of infrastructure creates additional points of failure and exposure, leaving organizations more susceptible to data loss. This is particularly true in high-risk sites — those prone to theft, natural disasters, and other unanticipated issues where critical information could easily be stolen or lost.

For many CIOs and business leaders, tightening up information security measures is a top priority to reduce the risk of data loss while preserving customer confidence. The answer to this challenge has been to recentralize branch services and applications in the data center where data can be secured and protected. However, with traditional solutions, this approach still leaves the branches at risk, delivering poor performance and lack of access due to network issues.

Warning sign #2: Your backup processes are outdated and/or difficult to manage.

Approximately 50% of corporate data resides in branch offices and remote sites4. This practice is often a result of rapid growth, leading to fragmented processes where many offices are performing their own backups on different schedules — perhaps using different methods and technologies — or even worse, not completing them at all.

The problem with these remote backups is that they are error-prone, often placed in the hands of non-IT personnel who are likely to neglect this added responsibility when workloads intensify. Backups are also expensive, as the cost of outfitting each location with the necessary infrastructure to execute and manage these processes can be excessive. And lastly, backups are inefficient, so when an office experiences downtime, new data created between the time of outage and the last captured backup is gone.

Compounding these problems is that tape backups are still common because the technology is cheaper and widely available. However, tape is also susceptible to loss and damage due to environmental issues, human mishandling or error, and disasters such as flooding or fire. This is especially true when the systems deployed in remote locations are not enterprise-class systems such as those found in the data center.

² Enhancing Business Value with an Edge-Optimized Virtual Server and Storage Deliver Solution, IDC, June 2013

 $^{^3}$ The Digital Universe of Opportunities: Rich Data and the Increasing Value of the Internet of Things, IDC, April 2014

⁴ Data Center and Branch Office Resilency, Riverbed, February 2015

Warning sign #3: You struggle to manage costs when running branch applications, but cannot compromise performance or end-user experience.

On average, 50% of enterprise employees are based at remote locations⁵, meaning that if branch applications don't perform, these workers can't work and business is lost with direct impacts to top and bottom line results. End-user morale also suffers, which can lead to increases in turnover

Due to a number of contributing factors, businesses continue to manage critical applications and services locally at each remote site. Sometimes, the nature of the application prevents it from being served across a WAN or through the cloud. Other times, the distance from the corporate data center is too far or there is inadequate connectivity. And while buying more bandwidth is often thought of as a cure-all, it can be an expensive proposition, and bigger pipes don't solve the inherent challenges imposed by physics, distance, and network latency.

Installing the infrastructure needed to support these applications at each remote site is an equally costly endeavor to both maintain and administer. To make matters more complex and, oftentimes, business limiting, companies report several challenges in maintaining and rolling out services at branches and remote sites - data security (46%), data backup (37%), and speed of deployment (35%), just to name a few⁶.

Finally, organizations often lack the visibility and control needed to manage applications across branches, data centers, and the cloud. These remote sites are also often without skilled IT pros who can quickly troubleshoot and resolve performance problems when they occur.

Warning sign #4: It takes days or weeks to recover sites when downtime occurs.

The velocity at which business moves today means downtime must become a thing of the past. But when an outage does occur, companies want assurance that sites can be restored as quickly as possible with minimal data loss and little to no impact on employee productivity and the bottom line.

The problem is that recovery of branch services can take a long time. A typical disaster recovery scenario requires replacing servers and other physical hardware, rebuilding and patching the underlying operating system, and reinstalling applications and data. In addition, backup tapes must be located and brought back to the remote site before all of the data can be recovered. Lastly, if IT personnel aren't on site, additional time must be factored in to schedule and relocate them.

In total, site recoveries can take days, or even weeks, to complete. As a result, IT organizations are looking to improve their recovery point and recovery time objectives (RPOs/RTOs) to ensure stronger business continuity.

"Our operations cover oil rigs and offshore locations where any disruption or unavailability of applications on site would result in loss of production time. With Riverbed's SteelFusion, we are able to optimize data center processes and thereby eliminate file servers, storage, and other backup processes which require our IT teams to be dispatched to remote locations. This has enabled focused production on site with peace of mind that data is secured at our data center."

Han Koon Er, Asia Pacific IT Manager Weatherford Asia Pacific Pte Ltd.

 $^{^{\}rm 5}$ Data Center and Branch Office Resilency Survey, Riverbed Feb, 2015

⁶ ROBO Trends Survey, Enterprise Strategy Group, March 2015

Warning sign #5: Your remote sites are becoming mini-copies of your data centers.

Maintaining islands of infrastructure can be an administrative nightmare. Teams are forced to manage individual servers, storage devices, backup systems, and networking equipment in order to successfully make applications and data available to remote office end users. The result is a footprint not too dissimilar from the corporate data center. And because so much data and infrastructure still resides at the edge, expensive storage arrays and other investments in the data center go heavily underutilized.

All too often, when IT personnel are dispatched to far-flung locations to respond to branch office problems, they are pulled away from higher-value initiatives. So maintaining these mini-copies of the corporate data center is highly inefficient, preventing an organization from optimizing its use of current resources.

"SteelFusion fully matches our IT vision; helping us to simplify the infrastructure, reduce the management burden at smaller sites, and centralize services and data in the main data centers."

Stefan Tittel, Chief Information Officer NKT Cables

Rethink Branch IT. Think Zero Branch IT.

Despite the ongoing cost and complexities of conducting business at branch offices and other remote locations, organizations have been locked into these traditional approaches of deploying and managing branch IT. But now is the time to challenge these conventional ways.

Embrace the Riverbed® Application Performance Platform[™] to deliver the branch of the future today by consolidating all IT from the branch into the data center for instant branch provisioning and recovery, complete security of all branch data and applications, full visibility of network and application performance, and applications that simply work.



- ☑ No Servers. No Storage. No Backup
- ✓ Instant provisioning. Instant recovery.
- ✓ Complete data security. Full visibility.
- Apps that simply work.

"The use of Riverbed has helped us tap into new markets and new geographic areas. The consolidation and availability of data from virtually anywhere enables our practice builders to more efficiently pursue new opportunities and resources."

Abe Esquerra, IT Director Dudek

Manage today's sprawling IT environments with Riverbed® SteelFusion™, the first and only hyper-converged infrastructure solution for the branch.

- Slash costs and eliminate islands of IT by consolidating 100% of data and servers from remote sites into the secure data center.
- Shrink backup windows from 24 hours to just a few minutes, minimizing data loss while ensuring critical information is always available to those who need it.
- Provision and deploy new branch services and entirely new sites as quickly and as easily as spinning up virtual machines in your data center.
- Turn branch recovery into a process that takes minutes versus days, meeting the most aggressive requirements for business continuity and disaster recovery.

SteelFusion reduces the average time to provision branch services by 30x (from five hours to ten minutes) and recover from branch outages by 96x (from 24 hours to 15 minutes).

Guarantee superior performance for all applications as you centralize them back to the data center with Riverbed® SteelHead™, the industry's #1 WAN optimization solution.

- Accelerate all user traffic in the branch while drastically reducing network bandwidth costs.
- Control network consumption with integrated quality of service (QoS) and intelligent path selection that prioritizes delivery of missioncritical traffic while minimizing utilization by recreational traffic.
- Ensure on-premises, cloud, and SaaS apps meet their performance SLAs so your remote users stay productive.

SteelHead improves performance by up to 100x for on-premises, cloud, and SaaS applications while reducing bandwidth consumption by up to 99%.

Keep your branch applications running at peak performance with Riverbed® SteelCentral™, the only solution that provides end-user, application, and network performance management and centralized control.

- Gain a centralized view into application and network performance across all remote locations, where problematic sites can quickly be drilled into, drastically reducing the time it takes to pinpoint the cause of an issue.
- Complement traditional sources of performance data like packets, SNMP, and NetFlow, and gain a holistic view of how the network is performing its most vital role – delivering applications to all end users.
- Leverage integrated end-user experience monitoring, high-definition transaction capture, and big-data analytics to catch and fix slowdowns and errors before users are impacted at branch sites.

SteelCentral provides businesses with IT budget savings between 10 and 30%. And research from IDC shows that customers achieve an average payback period of 6.4 months and an average three-year ROI of 521%8.

Confidently deliver your branch of the future with Riverbed Professional Services.

- Plan, build, and optimize services accelerate and amplify the value of the entire Riverbed Application Performance Platform.
- Deep planning and implementation expertise in data center consolidation, data migration, and branch converged infrastructure initiatives.
- Flexible, cost-effective technical education services to build in-house proficiency and confidence with Riverbed solutions.

Enterprises around the world trust Riverbed Professional Services (RPS) to help them achieve peak performance in the new hybrid world. RPS has a track record of 90%+ on-time, on-budget projects and client satisfaction scores that consistently measure 9.7 out of 10.

About Riverbed

Riverbed, at more than \$1 billion in annual revenue, is the leader in application performance infrastructure, delivering the most complete platform for the hybrid enterprise to ensure applications perform as expected, data is always available when needed, and performance issues can be proactively detected and resolved before impacting business performance. Riverbed enables hybrid enterprises to transform application performance into a competitive advantage by maximizing employee productivity and leveraging IT to create new forms of operational agility. Riverbed's 26,000+ customers include 97% of the *Fortune* 100 and 98% of the *Forbes* Global 100. Learn more at riverbed.com.



⁷ Convergence for the Branch Office: Transforming Resiliency and TCO with Riverbed SteelFusion, Taneja Group, April 2014

⁸ The Business Value and ROI Achieved with Riverbed in Analyzing, Diagnosing, and Resolving Application Performance Issues, IDC, August 2014