A Guide to Disaster Recovery in the Cloud
Simple, Affordable Protection for Your Applications and Data
# Table of Contents

**Introduction**  
Cloud-Based Disaster Recovery  ........................................... 3

**Chapter 1**  
Common Business Drivers  .................................................. 4

**Chapter 2**  
Common Questions to Ask When Evaluating Options  .................. 5

**Chapter 3**  
Top 3 Use Cases  ............................................................. 6

**Conclusion**  
About vCloud Air Disaster Recovery  ................................. 7  
Top 5 Benefits of vCloud Air Disaster Recovery  ..................... 8  
Get Started  ................................................................. 8
Most organizations know they need to protect their business critical information and minimize downtime in the event of outages, failures, disasters and other disruptions. But not all companies have the budget, expertise, or time to develop a comprehensive disaster recovery plan.

Traditional disaster recovery solutions can be prohibitively complex and expensive for many businesses, forcing them to make tradeoffs and operate with only a limited disaster recovery plan in place—or none at all.

For organizations with disaster recovery services in place, the challenge often lies in supporting the ongoing maintenance and re-evaluating the initial investment versus newer offerings as their environment continues to expand, or leases expire.

Fortunately, the landscape of disaster recovery solutions is shifting to accommodate changing IT needs. VMware vCloud® Air™ Disaster Recovery provides simple, affordable, automated processes for replicating and recovering critical applications and data — at a fraction of the cost of duplicating infrastructure or maintaining additional data centers. Organizations can afford to scale their efforts as needed, with flexible terms and resource options.

Cloud-based disaster recovery is expected to grow at a 21% CAGR over the next several years. 70% of survey respondents expect to implement cloud-based disaster recovery in the next 12 months.

Source: Drivers for the Growing Adoption of Cloud-Based Disaster Recovery, 451 Research, January 2015
The challenges of traditional disaster recovery solutions include high cost, complexity and lack of reliability, especially for support services. The investment in infrastructure and unused licenses can be prohibitive. So although a top IT priority, the expensive nature of deploying a disaster recovery plan is often an unobtainable goal.

Organizations with an existing disaster recovery solution may rely on a traditional in-house approach, supporting a secondary/tertiary site, or paying a high price for service providers to fully support and manage a disaster recovery plan. That’s why it’s prudent for IT to consider a cloud-based disaster recovery solution that’s more affordable and less complex.

Disaster recovery in the cloud is emerging as a compelling alternative due to the flexibility in commitment, capacity, and cost. Cloud-based disaster recovery enables organizations to overcome:

- Lack of in-house expertise and budget
- Limited time and resources for ongoing maintenance
- Expensive secondary or tertiary data centers
- Expenses of replacing end-of-life/lease solutions
- Lack of protection for remote/branch offices

Q. What are your primary business drivers for implementing or wanting to implement a cloud-based disaster-recovery solution?

- Need to implement disaster recovery, and do not have a DR plan in place today
- Need to augment existing site-to-site disaster recovery solution
- Need to replace existing DR solution
- Need to protect remote, branch, or satellite offices
- Can’t invest in or continue to support a secondary site

Source: Drivers for the Growing Adoption of Cloud-Based Disaster Recovery, 451 Research, January 2015
Common Questions to Ask When Evaluating Options

For organizations with a disaster recovery plan in place, maintaining the solution on an ongoing basis can be a challenge, leading many to look into refreshing their options in order to cut on spending and leverage existing investments. For those lacking a comprehensive disaster recovery plan, or the expertise and resources to configure, manage, and test an effective disaster recovery solution, cloud-based disaster recovery can provide a flexible, more affordable option. Ask these questions when evaluating disaster recovery options:

**Q1:** Is your current disaster recovery plan limited to traditional methods at the risk of costly operational downtime?

The costs of traditional disaster recovery solutions can force you to make tradeoffs on what you can afford to protect versus what you need to protect. This can leave your organization vulnerable to having inadequate protection. vCloud Air Disaster Recovery addresses variable capacity requirements needed to support common disaster recovery use cases, such as replication, failover, and failback, at a significantly reduced price point over traditional in-house disaster recovery solutions like backup and archiving, supporting a secondary site, or managed services alternatives. You have the scalability to accommodate shifting requirements, you pay only for what you need, and you have flexible subscription options.

**Q2:** Has replication-based disaster recovery been beyond your grasp based on the cost and complexity of implementation?

Deploying and managing a traditional disaster recovery plan can be complex and require time, budget, and staff that you may not have. vCloud Air Disaster Recovery provides an easy way to get started with an effective disaster recovery plan — without investing in any hardware, without hiring and training new specialists, and without having to invest in a secondary physical site. The service provides a simple, secure, automated process for replicating and recovering applications and data in the case of a local disaster or disruptive event.

**Q3:** Does your existing disaster recovery plan require high-touch, expensive and time-consuming management to maintain?

The ongoing maintenance and monitoring of a disaster recovery solution can require new training and skills, and introduce time-consuming manual processes. vCloud Air Disaster Recovery provides a single interface and common management with your onsite VMware environment. You’ll be up and running faster as your staff can use the UI that they are most familiar and comfortable with to manage your disaster recovery environment. Workflow execution and task management are available from both the vSphere® Web Client and the vCloud Air Console to ensure access to your disaster recovery environment at all times.

**Q4:** Is your disaster recovery solution incompatible with your onsite infrastructure, requiring custom integration to protect onsite virtualized applications?

Moving applications and workloads to the cloud usually involves introducing a different environment than what you are running onsite. This increases complexity, not just for monitoring and management, but also for networking, security, and operational processes. For vSphere customers, vCloud Air Disaster Recovery provides a fully compatible cloud solution built on the same platform — vSphere — that you are already using with your onsite VMware environment. This full compatibility means you can protect any virtualized application without custom integration or implementation.
With cloud-based disaster recovery, organizations can easily implement or extend their disaster recovery solution for a variety of circumstances, such as:

1. **Avoid Building a Secondary Disaster Recovery Site**
   Cloud-based disaster recovery allows you to protect your production environment without the expense and management burden of replicating it to a secondary site operated by core IT staff. It’s a great way to improve upon existing disaster recovery plans — or get a new plan off the drawing board and into operation — with minimal cost and resources.

2. **Replace or Enhance a Traditional Disaster Recovery Solution**
   With cloud-based disaster recovery you can replace or enhance a traditional in-house or secondary site disaster recovery solution with newer functionality without capital investment, with elastic scaling and with flexible subscription terms.

3. **Deliver a Disaster Recovery Solution for Remote Offices**
   Cloud-based disaster recovery makes it possible to protect remote office sites without additional CAPEX investments and with lower OPEX. You can extend your current disaster recovery plan to include satellite offices with no additional recruiting, hiring, and training expenses.

Listen to Legacy Reserves talk about why they chose vCloud Air Disaster Recovery as a better way to protect their day-to-day business applications.

[vmware.com/go/legacyreserves](http://vmware.com/go/legacyreserves)
About vCloud Air Disaster Recovery

vCloud Air Disaster Recovery is built on VMware vSphere® and vCloud Air. The service leverages vSphere Replication to provide robust, asynchronous replication capabilities at the hypervisor layer. This approach to replication allows for virtual machines in vSphere to be easily configured for disaster recovery without the traditional dependencies on underlying infrastructure hardware or data center mirroring.

vCloud Air Disaster Recovery also takes advantage of vCloud Air as a scalable platform for compute infrastructure and storage capacity. By utilizing a secure, multi-tenant cloud architecture, vCloud Air Disaster Recovery can address variable capacity requirements needed for common disaster recovery use cases, such as replication, failover and failback, at a significantly reduced price point over traditional in-house disaster recovery solutions or managed service alternatives. Combined with an unprecedented degree of self-serviceability over what to protect and when, vCloud Air Disaster Recovery makes it easy to enable hybrid-aware BC/DR capabilities across the virtualized enterprise.

vCloud Air Disaster Recovery includes:
- Self-service disaster recovery protection for virtual machines
- Recovery point objectives (RPO) from 15 minutes to 24 hours; retention of multiple recovery points
- Automated failover testing, planned migrations, and failback for end-to-end recovery
- Elastic cloud compute and storage capacity

vCloud Air Disaster Recovery is a subscription-based service offering with term lengths of 1, 3, 12, 24, and 36 months. The service is packaged based on the amount of resource capacity (Compute, Storage and Bandwidth) reserved for replication and failover. It can be purchased as a core subscription (set increment of Compute, Storage and Bandwidth) with additional add-on options needed to properly accommodate your disaster recovery requirements.

“We now have the cutover capabilities to a mirror disaster recovery environment to ensure uptime for those critical systems our physicians use to treat their patients. By utilizing the VMware vCloud Air Disaster Recovery technologies, we have reduced our existing RPO by 74% and our RTO by 90%.”

— Bryan Graven, Chief Executive Officer, National Physician Services
Top 5 Benefits of vCloud Air Disaster Recovery

1. **Flexible, affordable solution**
A fraction of the cost of traditional alternatives, with flexible contract lengths and pricing

2. **Trusted, proven market leader**
Instills confidence that business-critical assets are protected by top-class VMware support

3. **Leverages in-house knowledge**
Requires no new training or IT resources; same tools, skill sets, and management

4. **Elastic cloud compute and storage capacity**
Easily scalable to accommodate growth, pay for what you need now, expand when you need it

5. **Lower TCO**
Enables a transition from CAPEX to OPEX; eliminates secondary or tertiary data center investment and ongoing maintenance

Get Started
vCloud Air Disaster Recovery enables you to increase business resiliency, while protecting applications with minimal investment and providing a failover environment for dependable recovery in the event of a disaster or disruption.

Learn why you should choose VMware to provide a safe haven for your business critical information at www.vmware.com/go/protectyourapps.