

SOLUTION SHEET

Scality RING and ARTESCA for Commvault backup environments

High-performance, cyber-resilient object storage for backup, recovery, and long-term retention

Modern backup requirements are no longer one-dimensional. Today's infrastructure must support a complex mix of use cases that place vastly different demands on your storage:

- Rapid backup ingest for large, active production environments.
- Fast restore performance for operational and disaster recovery.
- Cost-efficient scalability for multi-petabyte, long-term retention.
- Immutable air-gapped copies to neutralize ransomware and malicious deletion.

In Commvault environments, these competing demands require a multi-tiered storage strategy. The most recent and operationally critical recovery points sit in a high-performance tier, while the vast majority of historical data resides in a massive, capacity-optimized retention tier. Additionally, organizations are increasingly deploying a specialized tier for immutable cyber-resilience.

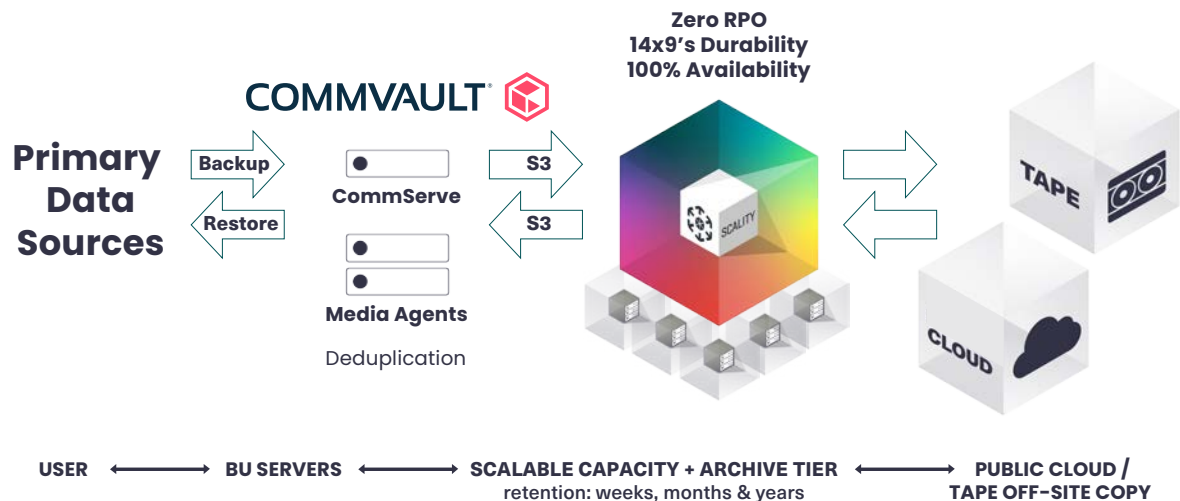
This creates an architectural challenge. A typical enterprise might maintain 500 TB in a high-performance tier for immediate recovery, alongside 5 PB of retained data in a secondary tier. For these and larger-scale environments, you need a storage platform capable of executing both flawlessly: delivering uncompromising speed for recovery-critical data, while scaling economically for the massive footprint of retained backups. Scality storage solutions are designed for these production realities.

Two solutions to address the dual market realities of Commvault data protection

Protecting Commvault backups requires a specialized combination of durability, cyber-resiliency and performance, especially for today's cyber-threat landscape. However, customers in the mid-market and in large enterprises often have unique expectations about backup storage solutions when it comes to ease-of-use, capacity, and workload growth.

For mid-market customers, ARTESCA provides the simplest and most secure storage solution that is built for Commvault backup. It provides the easiest path to immutable, cyber-resilient backup storage, through an integrated Commvault Assistant that streamlines deployment and configuration with minimal expertise and effort required. ARTESCA offers a range of capacities that span from 20TB to 8.5PB of usable storage, fitting the realities of many Commvault mid-market deployments.

For large-enterprise customers, Scality RING is a software-defined object storage platform engineered for large-scale enterprise environments where data must remain highly available, durable, and recoverable for decades. It provides a flexible solution that can grow from 100s of TB to 100s of PB scale and beyond, giving even the largest enterprises in the world the headroom and comfort to grow without limit. In addition, RING provides multi-workload isolation and multi-tenancy to allow multiple backup streams, archive, analytics and private clouds to be hosted on a single deployment instance.



Instead of forcing you to manage a fragmented architecture of different point products for performance, capacity, and security, RING unifies the entire Commvault backup lifecycle onto a single, predictable platform.

Both RING and ARTESCA provide CORE5 immutability and cyber-resiliency to ensure the highest degree of protection against cyber-threats such as ransomware attacks on backups. This gives customers the ability to quickly restore from safe, high-integrity backups in the event of these incidents.

CORE5: Cybersecurity by Design

Our five-layer approach to cyber resilience

1. **API-level S3 Object Lock**
Ensures instant, configurable immutability
2. **Data-level encryption and zero-trust IAM**
for fine-grained access control
3. **Storage-level erasure coding**
secure metadata separation
4. **Geographic resilience and dispersion**
via multi-site replication and stretched clusters
5. **Architectural-level immutability**
secure metadata separation



Both Scalify RING and ARTESCA are natively supported options within the Commvault ecosystem. Commvault documentation explicitly validates RING among its supported cloud/object storage targets, and recognizes both Scalify RING and Scalify ARTESCA for immutable, object-lock-based WORM workflows.

A unified platform for multi-tier Commvault backups

Primary copy (Tier 1): Rapid ingest and fast operational recovery

For most organizations, Tier 1 is where recovery speed dictates business survival. Designed for recent backups, this tier is relatively small (often 10–15% of the total backup footprint) but demands maximum throughput.

The RING advantage

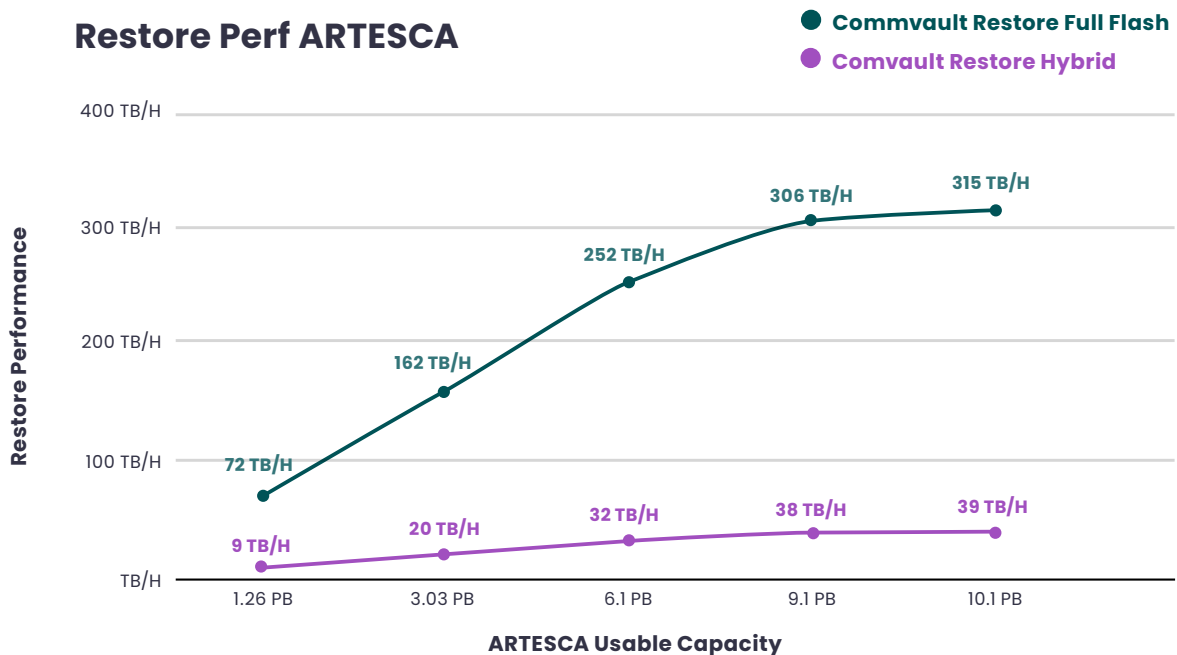
RING handles demanding Commvault workloads effortlessly, capable of delivering over 10TB/hour backup and restore throughput to meet strict RPOs and RTOs (see figure 1 & 2).

The ARTESCA advantage

ARTESCA is ideal for simple, secure backup storage for mid-market and enterprise customers with Commvault deployments starting at 50TB. It provides immutability and CORE5 cyber-resiliency, with GB/sec of backup and restore throughput.

Architectural alignment

Fast recovery in Commvault relies on the end-to-end architecture, including MediaAgents, cache, and network design. Scalify RING seamlessly integrates with Commvault's gateway and caching mechanisms, ensuring the storage target accelerates, rather than bottlenecks, operational recovery.



Tier 2: Multi-petabyte backup retention at scale

If Tier 1 is about speed, Tier 2 is about scale, efficiency, and consistency. This is where the bulk of your Commvault backup data lives, often scaling into the multi-petabyte range.

The RING advantage: Where scale-up appliances break down or become cost-prohibitive, RING thrives. It allows organizations to consolidate sprawling backup repositories onto a single platform built for limitless capacity growth. You avoid the management nightmare of constantly adding and balancing discrete storage silos as your retention needs grow.

The ARTESCA advantage: For customers where ease-of-use is a key requirement. ARTESCA provides the simplest and most secure storage solution for up to 8.5PB of backups, with assured data durability and high-availability configurations.

Tier 3: Immutable and cyber-resilient copies

Modern data protection strategies (like 3-2-1 or 3-2-1-1) require at least one air-gapped, heavily fortified, immutable copy of your data for extended retention and ransomware defense.

The RING advantage: RING natively supports S3 Object Lock. Because Commvault fully supports this object-lock WORM model, you can build an ironclad, cyber-resilient tier on the exact same infrastructure used for your core backups.

The ARTESCA advantage: ARTESCA provides Veeam validated immutability with S3 Object Lock, and multi-level CORE5 cyber-resiliency. With simplified deployment through the Commvault Assistant, it provides the simplest management experience for admins.

4 questions to ask when evaluating backup storage

When assessing storage platforms for a Commvault environment, cut through the marketing noise by focusing on these practical requirements:

Can the platform support both performance and petabyte-scale?

Many systems are fast but can't scale economically. Others are cheap but too slow for operational recovery. A credible platform must support a high-performance ingest tier alongside a massive retention tier without requiring a forklift upgrade.

Does it natively support cyber-resilience?

Immutability is no longer optional. Your storage must support S3 Object Lock and integrate cleanly with Commvault's WORM protection models to guarantee data survival during a breach.

Will it remain operationally invisible as it grows?

Storage that looks cost-effective at 50 TB can become an operational nightmare at 50 PB. A true enterprise platform maintains consistent management overhead and predictability, regardless of its size.

Is it structurally aligned with Commvault?

Because backup performance is dictated by gateways, MediaAgents, and the data path, your storage platform must integrate smoothly into Commvault's specific architectural requirements.

Evaluating storage for Commvault isn't just about finding a target to dump data into. It is about identifying a platform capable of supporting the total lifecycle of your backups.

Scality RING is a proven solution that delivers on all fronts. It combines the raw throughput required for aggressive operational recovery, the predictable economics needed for multi-petabyte long-term retention, and the S3 Object Lock immutability required to defend against modern cyber threats. With RING, you get a comprehensive storage foundation for Commvault — without the complexity of managing separate storage silos. ARTESCA provides a simple, secure, built-for-backup solution for Commvault, with immutability and CORE5 cyber resiliency.