

#1 Kubernetes Data Protection and Mobility

Veeam Kasten *for Kubernetes*

Cloud-Native Resilience for Modern Apps, VMs, and their Data

As Kubernetes adoption accelerates in the cloud-native era, organizations need to address the critical requirement of protecting their Kubernetes applications, virtual machines (VMs), and their data. To keep things running, robust protection and recovery of the entire application — along with data services — must be prioritized to overcome misconfiguration, outage, and security threats that compromise availability.

Containers play a pivotal role in the development of cloud-native applications. According to the Veeam [2024 Data Protection Trends Report](#), 52% of organizations surveyed are running containers in production, with 25% planning to deploy. Kubernetes has emerged as the go-to container orchestration platform for these deployments. [GigaOM's](#) annual market report on Kubernetes Data Protection expands, “Kubernetes has become the de-facto standard for cloud-native applications, including those with stateful data. It is also gaining a foothold as the platform for traditional enterprise applications running both in the cloud and on-premises. Given that applications and their stateful data are inseparable, organizations must implement data protection solutions for applications running on Kubernetes to safeguard against losing that data.”

Workloads on Kubernetes, whether newly developed or revamped, exhibit increasing diversity, which highlights the growing importance of VMs within the Kubernetes ecosystem. These trends emphasize the necessity of not only prioritizing backing up Kubernetes applications and their data, but also natively managing the applications themselves among cloud platforms.

Setting the Record Straight on Kubernetes Data Protection



- Backing up Kubernetes applications and data — whether on-premises, at the edge, or in the cloud — is an enterprise imperative.
- Traditional backup solutions are ill-equipped to handle the dynamic nature of Kubernetes.
- Volume backup does not fully protect cloud-native applications and data.
- Kubernetes enhances application availability through features like self-healing, but this does not guarantee data protection.
- Kubernetes is as susceptible to ransomware attacks as traditional platforms and requires purpose-built protection.

Achieve Unified Data Resilience with Veeam Kasten



Backup and Restore

Confidently and efficiently protect your Kubernetes applications and VMs, as well as their business-critical data.



Disaster Recovery

Easily manage how backups are replicated off-site to meet business and regulatory requirements.



Application Mobility

Effectively move and protect data where it is needed, without vendor lock-in.



Security Everywhere

Secure your data against risks with proactive threat detection, encryption, and immutability.

Why Veeam Kasten?

Veeam Kasten delivers secure, Kubernetes-native data protection and application mobility at scale and across a wide range of distributions and platforms. Proven to recover entire applications simply, quickly, and reliably, Kasten gives operations and application teams the confidence to withstand the unexpected.

Key capabilities

Policy Automation

Efficiently manage complete application protection — including data inside and outside the cluster — at an enterprise scale.

Granular Restore

Maintain total control over what artifacts and data you want to restore, including data-only restores for running applications.

Automated DR

Recreate entire application stacks into the same namespace or make a new one automatically.

Immutable and Encrypted

Safeguard data against ransomware and other threats by placing backups in an encrypted and WORM state.

Least-Privilege Access

Granularly assign permissions to data protection operations and resources on a per-application level.

SIEM Integrations

Ingest and aggregate SIEM data for governance and real-time threat detection, investigation, and analysis.

Cross Cloud Portability

Mobilize applications across namespaces, clusters, and clouds for disaster recovery (DR), test/dev, and performance testing.

Transform Across Distributions

Bolster security and adhere to strict benchmarks and best practices fit for governments.

Modern Virtualization

Migrate, modernize, and manage VMs on Kubernetes alongside containers without refactoring the entire application.

Intuitive GUI

Get critical insights into data protection operations via a state-of-the-art management interface.

DevOps Agility

Easily identify and protect system applications.

Effortless Operations

Provide simple and efficient operational control and the smoothest experience for new and experienced administrators.

How Veeam Kasten Works

Discover

Automated discovery of your Kubernetes application.

Protect

Secure your Kubernetes applications and data.

Restore

Quickly and effectively restore your Kubernetes applications and data.

Kubernetes applications, just like their traditional predecessors, demand resilience from day 0 to protect against data loss and outage events like failure, deletion, and ransomware — Veeam Kasten fills this critical need.

→ For more information, visit [Veeam.com](https://veeam.com) or follow us on [Linkedin](#).

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