

# APEX Private Cloud and APEX Hybrid Cloud

## Subscribe to cloud resources in a few clicks

APEX Private and Hybrid Cloud deliver integrated compute, storage, networking, and virtualization resources so you can build the cloud of your choice. With a simple way to order and manage cloud infrastructure, you can quickly deploy secure and consistent operations across public and private clouds and ensure your workloads are placed in the best environment. In a few clicks, you can subscribe to instances designed for your workloads through the APEX Console and get your cloud infrastructure delivered

and deployed to your datacenter, co-location facility, and edge locations in as few as 14 days<sup>1</sup>.

APEX Private and Hybrid Cloud offers predictable monthly pricing available through 1- or 3-year term subscriptions, including hardware, software, and services (deployment, rack integration, support, asset recovery) components.



Simple to order



Fast deployment

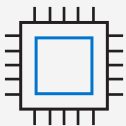


On-going support

## Instances designed for your enterprise workloads

Instances deliver standardized combinations of compute, memory, storage, and networking resources, on which a virtual machine or container can run—powered by Dell EMC VxRail. Each instance includes at least one full core of a CPU (latest generation Intel Xeon Gold class CPU core with 2x hyper-threads - 2x vCPU), network bandwidth, and memory—which are defined by a fixed physical memory to a physical core ratio. Instance types are

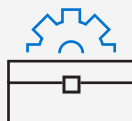
aligned and optimized to your workload requirements, ranging from small (4GB) to extra-large (32GB) memory-to-CPU core ratios. Additionally, we offer special purpose instance types with Graphics Processing Units (GPUs) from NVIDIA™ to address Artificial Intelligence/Machine Learning (AI/ML) and Virtual Desktop Infrastructure (VDI).



### Compute optimized instances

- C-25\*
- C-50
- C-100
- C-200
- C-500

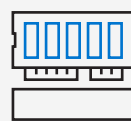
**4GB**  
Memory-to-core ratio



### General purpose instances

- G-25\*
- G-50
- G-100
- G-200
- G-500

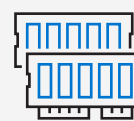
**8GB**  
Memory-to-core ratio



### Memory optimized instances

- M-25\*
- M-50
- M-100
- M-200
- M-500

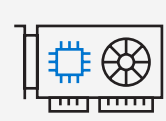
**16GB**  
Memory-to-core ratio



### Large-scale memory optimized instances

- XM-25\*
- XM-50
- XM-100
- XM-200
- XM-500

**32GB**  
Memory-to-core ratio



### Accelerator optimized instances

- AM-50
  - AM-100
  - VM-50
  - VM-100
- 16GB**  
Memory-to-core ratio  
**+GPU**

## Easily size and order on-premises cloud resources

Each instance type is offered in quantities (i.e. blocks) of 25, 50, 100, 200, and 500 instances, allowing you to scale your cloud deployment to the requirements of your target workload. Instance blocks can be added together to run a larger quantity of instances of the same type, or you can mix and match to support multiple different workloads within the same solution.

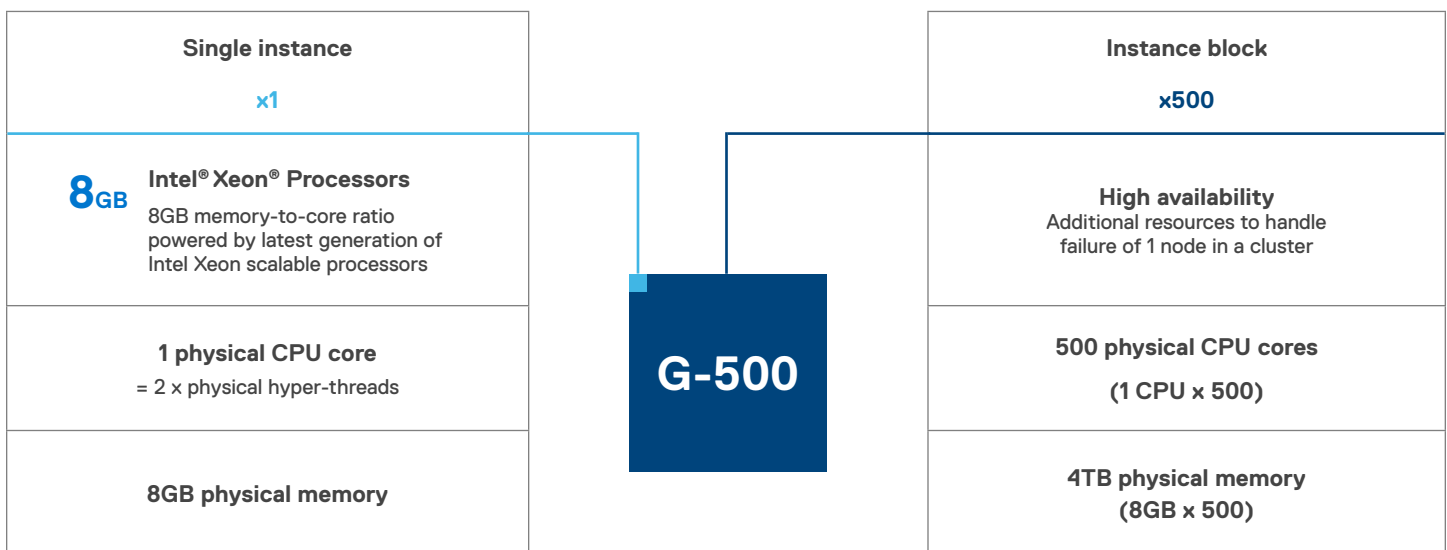


### General purpose optimized

#### Example

If you purchase a general purpose optimized block, i.e. a G-500, you will get at least:

- 500 physical CPU cores (each instance has one CPU core x 500) and 4TB physical memory (500 x 8GB)

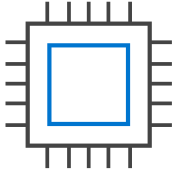


#### Flexible vCPU/core ratios

Administrators can assign vCPU/vMemory as required to their VMs, including “overcommitting” cores and memory.

#### High availability included

Instance blocks are offered in two types, supporting new clusters and expansion clusters. Each instance block configured for a new cluster or workload domain will have additional resources to support high availability. If a node fails, the configuration will continue to meet the defined minimum requirements. For example, with a G-500 instance block you are guaranteed a minimum of 500 CPU cores and 4TB of memory to run your workloads on. If a node fails in that cluster, you will still have a minimum of 500 CPU cores and 4TB of memory for your workloads—with no disruption. Cluster expansions will not include additional HA resources, as they use the added resources in the new cluster configuration.



## Compute optimized instances

**Description:** Compute optimized instances deliver high performance for running workloads that are compute intensive.

**Memory-to-core ratio:** 4GB

Please note: Actual memory-to-core ratio will be within 5% of the specification for the committed instance capacity, driven by CPU core and memory architecture.

**Application examples:** Mainstream webservers, batch processing apps, network appliances, high performance computing (HPC), AI/ML – inferencing.  
**Processors:** 2nd generation Intel® Gold Series Xeon® scalable processors

### Instance blocks

#### C-25

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	-	10TB / 30TB	-	-
Hybrid Storage	-	-	-	-

#### C-50

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	20TB	-	23TB
All Flash	35TB / 90TB	4TB / 60TB	-	4TB / 23TB / 61TB
Hybrid Storage	-	-	-	96TB

#### C-100

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	-	92TB	46TB
All Flash	10TB / 45TB	-	58TB / 154TB / 246TB	8TB / 31TB / 123TB
Hybrid Storage	-	-	240TB	197TB

#### C-200

##### APEX Private Cloud

##### APEX Hybrid Cloud

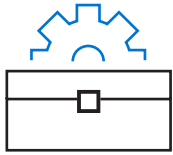
	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	115TB	-	115TB	92TB
All Flash	15TB / 305TB	-	19TB / 307TB	15TB / 81TB / 246TB
Hybrid Storage	-	-	480TB	384TB

#### C-500

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	230TB	-	230TB	207TB
All Flash	35TB / 150TB / 610TB	-	38TB / 153TB / 614TB	35TB / 138TB / 553TB
Hybrid Storage	-	-	960TB	864TB



## General purpose instances

**Description:** General purpose instances offer a balance of compute, memory and storage resources that are ideal for workloads using these resources in equal proportions.

**Memory-to-core ratio:** 8GB

Please note: Actual memory-to-core ratio will be within 5% of the specification for the committed instance capacity, driven by CPU core and memory architecture.

**Application examples:** Low-medium traffic web servers, databases application servers, network appliances, CI/CD pipeline servers.

**Processors:** 2nd generation Intel® Gold Series Xeon® scalable processors

### Instance blocks

#### G-25

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	-	10TB / 30TB	-	-
Hybrid Storage	-	45TB	-	-

#### G-50

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	20TB	-	23TB
All Flash	35TB / 90TB	4TB / 60TB	-	4TB / 61TB
Hybrid Storage	140TB	95TB	-	96TB

#### G-100

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	-	92TB	46TB
All Flash	10TB / 45TB	-	58TB / 154TB / 246TB	8TB / 31TB
Hybrid Storage	285TB	-	240TB	192TB

#### G-200

##### APEX Private Cloud

##### APEX Hybrid Cloud

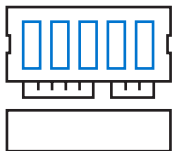
	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	115TB	-	115TB	92TB
All Flash	15TB / 75TB / 305TB	-	19TB / 77TB / 307TB	15TB / 81TB
Hybrid Storage	480TB	-	480TB	384TB

#### G-500

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	230TB	-	230TB	207TB
All Flash	150TB / 610TB	-	153TB / 614TB	38TB / 138TB
Hybrid Storage	960TB	-	960TB	864TB



## Memory optimized instances

**Description:** With a high memory-to-core ratio, memory optimized instances deliver fast performance for workloads that process large data sets in memory.

**Memory-to-core ratio:** 16GB

Please note: Actual memory-to-core ratio will be within 5% of the specification for the committed instance capacity, driven by CPU core and memory architecture.

**Application examples:** High performance relational databases (Oracle, Microsoft SQL, MySQL, MariaDB, PostgreSQL, SAP etc.), midsize in-memory databases (Ex: SQL server, etc.), data mining, web scale in-memory caches (Memcached).

**Processors:** 2nd generation Intel® Gold Series Xeon® scalable processors

### Instance blocks

#### M-25

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	-	15TB / 30TB	-	-
Hybrid Storage	-	45TB	-	-

#### M-50

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	20TB	92TB	23TB
All Flash	45TB / 90TB	15TB / 60TB	46TB / 61TB / 123TB	15TB / 61TB
Hybrid Storage	140TB	95TB	192TB	96TB

#### M-100

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	-	92TB	46TB
All Flash	45TB / 135TB	-	77TB / 154TB / 246TB	31TB / 92TB / 123TB
Hybrid Storage	285TB	-	240TB	192TB

#### M-200

##### APEX Private Cloud

##### APEX Hybrid Cloud

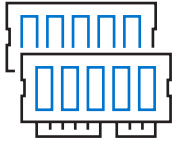
	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	115TB	-	115TB	92TB
All Flash	75TB / 305TB	-	177TB / 307TB	67TB / 246TB
Hybrid Storage	480TB	-	480TB	384TB

#### M-500

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	275TB	-	276TB	230TB
All Flash	180TB / 460TB / 610TB	-	184TB / 461TB / 614TB	153TB / 415TB / 614TB
Hybrid Storage	-	-	-	-



## Large-scale memory optimized instances

**Description:** With an extra high memory-to-core ratio, these heavy-duty instances deliver fast performance for workloads that process very large data sets in memory.

**Memory-to-core ratio:** 32GB

Please note: Actual memory-to-core ratio will be within 5% of the specification for the committed instance capacity, driven by CPU core and memory architecture.

**Application examples:** High performance relational databases (Oracle, Microsoft SQL, MySQL, MariaDB, PostgreSQL, SAP etc.), large in-memory databases (Ex: SQL server, etc.), data mining, large web scale in-memory caches (Memcached).

**Processors:** 2nd generation Intel® Gold Series Xeon® scalable processors

### Instance blocks

#### XM-25

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	-	16TB / 60TB	-	-
Hybrid Storage	-	-	-	-

#### XM-50

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	65TB	45TB	92TB	46TB
All Flash	60TB / 120TB	60TB / 120TB	61TB / 123TB / 246TB	61TB / 123TB
Hybrid Storage	-	-	240TB	192TB

#### XM-100

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	115TB	-	115TB	92TB
All Flash	75TB / 180TB	-	107TB / 215TB / 307TB	123TB / 246TB
Hybrid Storage	-	-	480TB	384TB

#### XM-200

##### APEX Private Cloud

##### APEX Hybrid Cloud

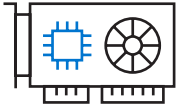
	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	230TB	-	230TB	184TB
All Flash	305TB / 610TB	-	307TB / 614TB	246TB / 492TB
Hybrid Storage	-	-	960TB	768TB

#### XM-500

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	735TB	-	737TB	614TB
Hybrid Storage	-	-	-	-



## Accelerator optimized instances\*

**Description:** By using hardware accelerators, these computing instances are ideal for machine learning, graphic-intensive and compute-intensive applications. Processors: 2nd generation Intel® Gold Series Xeon® scalable processors

**Memory-to-core ratio:** 16GB

Please note: Actual memory-to-core ratio will be within 5% of the specification for the committed instance capacity, driven by CPU core and memory architecture.

### Graphic Processing Units (GPUs)

**AM:** Powered by NVIDIA v100S Tensor Core GPU with 32GB of memory - optimized for AI/ML (Training), HPC, and data science

**VM:** Powered by NVIDIA T4 multipurpose Tensor Core GPU with 16GB of memory – optimized for VDI and deep learning

### Instance blocks

#### AM-50

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	45TB	15TB	-	15TB
Hybrid Storage	-	-	-	-

#### AM-100

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	-	-	61TB	31TB
Hybrid Storage	-	-	-	-

#### VM-50

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	45TB	15TB	-	15TB
Hybrid Storage	-	-	-	-

#### VM-100

##### APEX Private Cloud

##### APEX Hybrid Cloud

	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)	New cluster - storage (raw TB)	Cluster extension - storage (raw TB)
All NVMe	-	-	-	-
All Flash	-	-	61TB	31TB
Hybrid Storage	-	-	-	-

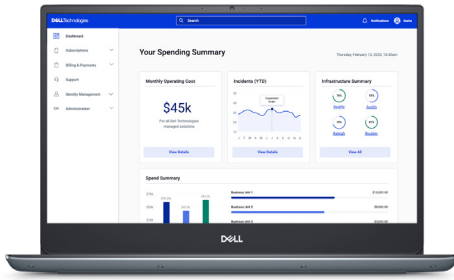
\* NVIDIA virtual GPU software licenses are not included with APEX Accelerator Optimized instances. To get started on purchase of various NVIDIA virtual GPU solutions, contact your Dell representative or visit <https://www.nvidia.com/en-us/data-center/buy-grid/>

## Support throughout your entire cloud journey

APEX Private and Hybrid Cloud are designed to support you wherever you are in your cloud journey. In partnership with VMware, multiple options are available that enable you to choose the best cloud infrastructure that fits your cloud strategy. This means you can start small and scale up in a phased approach that matches your application and business needs.

	APEX Private Cloud	APEX Hybrid Cloud
	Get started with private cloud for as low as \$25 per instance per month <sup>2</sup>	Get started with hybrid cloud for as low as \$47 per instance per month <sup>3</sup>
<b>Infrastructure</b>	Virtualized compute and storage	Virtualized compute, storage and networking
<b>Cloud operations</b>	Simplify VMware cloud adoption and update legacy infrastructure with next-generation technology — a great first step to application modernization	Deploy a full enterprise cloud operating model by automating and orchestrating all your cloud environments for consistent operations and security
<b>Workload examples</b>	Perfect for edge workloads — a manufacturing production line for example	Deploy Virtual Desktop Infrastructure (VDI) that delivers lower application latency and faster logon response than public cloud provider alternatives
<b>Cloud stack</b>	VMware vSphere Enterprise Plus™, vSAN Enterprise™  (Or customer ELA)	VMware Cloud Foundation - Standard or Enterprise License option:  <b>Standard:</b> VMware vSphere Enterprise Plus™, vSAN Advanced™, NSX Data Center Advanced™  <b>Enterprise:</b> VMware vSphere Enterprise Plus™, vSAN Enterprise™, NSX Data Center Enterprise Plus™, vRealize Suite Enterprise™  (Or customer ELA)
<b>Hardware</b>	Dell EMC VxRail	
<b>Support services</b>	Rack Integration, ProDeploy Plus, ProSupport Plus, and Asset Recycle included in price	
<b>Rack infrastructure</b>	<ol style="list-style-type: none"> <li>Fully configured rack owned by Dell, including rack, PDUs, switches (ToR &amp; mgmt), cabling</li> <li>Customer provides own rack: you provide rack, PDUs, switches (ToR &amp; mgmt), cabling</li> </ol>	<ol style="list-style-type: none"> <li>Fully configured rack owned by Dell, including rack, PDUs, switches (ToR &amp; mgmt), cabling</li> <li>Customer provides own rack: you provide rack, PDUs – we provide switches (ToR &amp; mgmt), cabling</li> </ol>
<b>Lifecycle management</b>	VxRail Manager	VxRail Manager deeply integrated with VMware Cloud Foundation SDDC Manager
<b>Cloud native with Tanzu (optional add-on)</b>	Add Tanzu Basic Edition for the fastest way to get started with Kubernetes workloads	Add Tanzu Standard Edition to get the best way to run Kubernetes workloads at scale





## Management is simple with the APEX Console

APEX Console is a brand-new online platform that reduces complexity in discovering, subscribing to, deploying, monitoring, optimizing, and growing IT services.

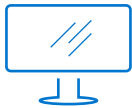
- Manage cloud workloads and services through a single web interface
- Integrated monitoring tools help streamline your operations with real-time actionable insights
- Give users what they need with access based on role while retaining IT oversight

## Built for VMware, with VMware

VxRail, powered by Dell EMC PowerEdge server platforms and VxRail HCI System Software, delivers deep integration across the VMware ecosystem. This means you can rapidly deploy secure on-premises cloud infrastructure and take advantage of a full stack single-click lifecycle management experience. This significantly simplifies operations and ensures clusters are in continuously validated states so that your cloud infrastructure is always up to date.



1. Applies to select preconfigured solutions, contact your sales representative for details. Excludes orders over 1000 instances, hybrid storage, select vRealize (vRA, vRO) components, and some other features. Customer credit approval, site survey and configuration workbook must be completed before order is placed. Product availability, shipping, holidays, and other factors may impact deployment time. Deployment includes delivery, standardized installation and hardware and software configuration. US, United Kingdom, France, and Germany only.
2. Estimate based on the purchase of 500 Compute optimized instances for new private cloud deployments over a 3-year term with All Flash Storage, vSphere Enterprise and vSAN Enterprise, and provided rack infrastructure, with an average monthly price of \$12,240 (USD) as of February 2021. Pricing for pre-configured solutions with subscription may vary depending on the number and type of instance blocks in your configuration. For details on pricing, consult your account manager. US, United Kingdom, France, and Germany only.
3. Estimate based on the purchase of 500 Compute optimized instances (C-500 instance block) over a 3-year term with All Flash Storage and VMware Cloud Foundation Standard Edition, with an average monthly price of \$23,500 (USD) as of February 2021. Pricing for pre-configured solutions with subscription may vary depending on the number and type of instance blocks in your configuration. For details on pricing, consult your account manager. US, United Kingdom, France, and Germany only.



Learn more about  
APEX Cloud Services

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