



HPE Data Protector 8.10 Virtualization Support Matrix

Version: 2.2

Date: November 2016

Note: The combinations of Data Protector component + operating system and/or application versions listed in this support matrix are only supported by Data Protector as long as the associated operating system and/or application versions are supported by respective vendors.

All guest operating systems supported by the respective vendors are supported with Data Protector as long as they are listed as supported on physical hosts in the *HPE Data Protector 8.10 Platform and Integration Support Matrix*.

For HPE Data Protector components running in combination with application versions and operating system versions, which are not supported by their respective vendors, the support from HPE is limited to a reasonable-endeavors basis. At any time HPE, can decide to remove those combinations from the support matrix.

Updates/changes to individual fields within the Matrix will be highlighted in **RED**.

What's New

There are no updates for this version.

Table 1: Supported components inside virtual machines

Following table lists various Data Protector components supported on the guest operating systems:

Supported components inside virtual machines	
Virtualization application	Supported Data Protector components
VMware	<ul style="list-style-type: none"> • Cell Manager/Installation Server • Manager of Managers • Disk Agent • Media Agent ¹ • Graphical User Interface • Online Extension Agents² • StoreOnce Software Deduplication • HPE P9000 XP, SSEA Agent³ • HPE P6000 EVA, SMI-S Agent⁴ • VSS Agent ⁵
Microsoft Hyper-V	<ul style="list-style-type: none"> • Cell Manager/Installation Server • Manager of Managers • Disk Agent • Media Agent • Graphical User Interface • Online Extension Agents² • StoreOnce Software Deduplication • HPE P9000 XP, SSEA Agent³ • HPE P6000 EVA, SMI-S Agent⁴ • VSS Agent ⁵
HPE Integrity Virtual Machines (IVM)	<ul style="list-style-type: none"> • Cell Manager/Installation Server • Disk Agent • Media Agent ⁶ • Manager of Managers • Online Extension Agents² • HPE P9000 XP, SSEA Agent³

Citrix XenServer	<ul style="list-style-type: none"> • Cell Manager/Installation Server • Manager of Managers • Disk Agent • Media Agent • Graphical User Interface • Online Extension Agents²
Solaris Zones	<ul style="list-style-type: none"> • Disk Agent (Global and Local Zones) • Media Agent (Global Zone) • Oracle Online Agent (Global and Local Zones)
Oracle VM	<ul style="list-style-type: none"> • Cell Manager/Installation Server • Manager of Managers • Disk Agent • Media Agent • Graphical User Interface • Online Extension Agents² • StoreOnce Software Deduplication • HPE P9000 XP, SSEA Agent³ • HPE P6000 EVA, SMI-S Agent⁴ • VSS Agent⁵ • Oracle Online Agent
Red Hat, KVM	<ul style="list-style-type: none"> • Cell Manager/Installation Server • Manager of Managers • Disk Agent • Media Agent • Online Extension Agents² • StoreOnce Software Deduplication • HPE P9000 XP, SSEA Agent³ • HPE P6000 EVA, SMI-S Agent⁴

1 Supported for HPE StoreOnce Backup Systems with iSCSI and Catalyst, file devices, HPE StoreOnce B6200 Backup System (firmware version 3.11.1) using Catalyst, HPE Store Once Software, and file libraries only.

2 Valid for all applications that are listed as supported in *HPE Data Protector 8.10 Platform and Integration Support Matrix* and are supported by respective vendors inside a virtual machine

3 Includes application integrations listed in the *HPE Data Protector 8.10 Zero Downtime Backup and Instant Recovery Support Matrix for HPE P9000 XP Disk Array Family*

4 Includes application integrations listed in the *HPE Data Protector 8.10 Zero Downtime Backup and Instant Recovery Support Matrix for HPE P6000 EVA Disk Array Family Using SMI-S Agent*

5 In case of VSS backups, the application host can be a virtual host, but the backup host for FC based arrays (EVA, XP, etc) must be a physical server. For details of the supported VSS configurations, see *HPE Data Protector 8.10 VSS Integration Support Matrix*

6 Support includes attached AVIO Devices

Table 2: Supported virtualization applications

Data Protector backup clients are supported to run inside guest operating systems on the following virtualization applications:

Supported virtualization applications	
Vendor	Supported application
VMware ^{1,4,5,7,8,9}	<ul style="list-style-type: none"> • VMware Virtual Infrastructure • VMware vSphere 4 • VMware vSphere 5^{2,3} • VMware vSphere 6.0¹⁰ • VMware vCenter Linux Virtual appliance 5.5 • VMware vCenter Server 5.1 U2, 5.5, 6.0¹⁰

1 Includes support for Virtual Infrastructure and vSphere components like vMotion, HA, DRS.

2 Supports only the features available with vSphere 4.

3 All updates are supported.

4 Data Protector supports guest operating systems that are supported by the respective operating system vendor and are supported as a guest operating system by VMware.

5 Data Protector ships with VMware VDDK 5.5.4. The proxy backup host operating support listed is as per the VDDK

- 5.5.4 release notes. See <https://www.vmware.com/support/developer/vddk/vddk-554-releasenotes.html>.
- 6 Backup of VMDKs larger than 4TB is not supported.
- 7 Data Protector supports only the above mentioned VMware vCenter versions. The ESXi Servers supported by these VMware vCenter versions are supported as Data Protector Application clients.
- 8 For the respective ESX Server support, refer to the VMware Product Interoperability Matrix using the following link: https://partnerweb.vmware.com/comp_guide2/sim/interop_matrix.php.
- 9 Data Protector does not support free ESXi licenses.
- 10 Backup Host on Linux is not supported.

Table 2: Data Protector Virtual Environment Agent platform support

Supported platforms for Data Protector and VMware VDDK component ^{1,2}		
Data Protector version	VMware VDDK component operating systems	Supported backup / mount proxy
8.10, 8.11, 8.12	VDDK 5.5.0	Windows Server 2003 R2 (64-bit) (x64) Windows Server 2008 (64-bit) (x64) Windows Server 2008 R2 (64bit)(x64) Windows Server 2012 (64bit)(x64) RHEL 5.9 (64-bit) (x64) ^{1,3} RHEL 6.2, 6.3, 6.4 (64-bit) (x64) ^{1,3} SLES 10, 11 (64-bit) (x64) ^{1,2,3}
8.13	VDDK 5.5.2 (x64)	Windows Server 2003 R2 (64-bit) Windows Server 2008 (64-bit) (x64) Windows Server 2008 R2 (64bit)(x64) Windows Server 2012 (64bit)(x64) RHEL 5.9 (64-bit) (x64) ^{1,3} RHEL 6.2, 6.3 (64-bit) (x64) ^{1,3} SLES 10, 11 (64-bit) (x64) ^{1,2,3}
8.14	VDDK 5.5.4	Windows Server 2003 R2 (64-bit) (x64) Windows Server 2008 (64-bit) (x64) Windows Server 2008 R2 (64bit)(x64) Windows Server 2012 (64bit)(x64) Windows Server 2012 R2 (64bit)(x64) RHEL 5.9 (64-bit) (x64) ^{1,3} RHEL 6.2, 6.3, 6.4 (64-bit) (x64) ^{1,3} SLES 10, 11 (64-bit) (x64) ^{1,2,3}

- 1 Supported partition type: Linux partition (ID 83), Linux LVM partition (ID 8E)
- 2 For SUSE 11.x Minimal kernel version 2.6.27.21

File System	Mount Proxy Operating system		
	Red Hat 5	Red Hat 6	SUSE 11
ext2	✓	✓	✓
ext3	✓	✓	✓
ext4	-	✓	-
reiserfs	-	-	✓
xfs	-	✓	✓
ntfs	✓	✓	✓

Data Protector 8.10 Virtual Environment Agent platform support ³		
Data Protector component	VMware component systems	Supported backup / mount proxy operating
Virtual Environment Agent (vStorage API support for Data Protection) ^{1, 2}	VMware vCloud Director 1.5.1, 5.1.x 5.5.0	Windows Server 2008 (64-bit) (x64) Windows Server 2008 R2 (64bit) (x64) Windows Server 2012 (64bit) (x64)

- 1 Virtual Environment Agent does not support Ipv6. The functionality is only available with native Windows graphical user interface.
- 2 Raw Disk Mappings is supported with VADP based backups in virtual mode but not supported in physical mode.
- 3 Data Protector supports all guest Operating Systems that are supported as guest Operating Systems by VMware.

Table 3: Data Protector Virtual Environment Agent Support for Microsoft Hyper-V

Data Protector Virtual Environment Agent support for Microsoft Hyper-V ¹
Microsoft Hyper-V
Microsoft Hyper-V R2
Microsoft Hyper-V Server 2012

¹ For supported operating system versions, refer to Microsoft Hyper-V support manuals.

Table 4: Granular Recovery Extension for VMware vSphere

Granular Recovery Extension for VMware vSphere		
Data Protector component	VMware component	Supported operating system / version
Granular Recovery Extension for VMware vSphere ¹	<ul style="list-style-type: none"> VMware vCenter Server 	5.1 U2 ² , 5.5 ³

¹ VMware vCenter Linux Virtual appliance is not supported

² Supported only from vSphere Desktop Client

³ Supported only from vSphere Web Client 5.5

Table 5: Supported ZDB/IR configurations for virtual environments

The zero downtime backup and instant recovery feature in virtual environments is enabled by installing the respective array and application agents inside the virtual machines running the applications. Following is a listing of supported configurations:

Supported ZDB/IR configurations for virtual environments				
Virtualization application	Array type	Application host operating system (guest OS)	Backup host operating system	Supported components
VMware	HP P6000 EVA Disk Array Family ¹	Windows Server 2003 (32-bit)	Windows Server 2003 (32-bit) (Physical host only)	<ul style="list-style-type: none"> Filesystem & Raw Device/volume and Application integrations listed in the <i>HP Data Protector 8.10 Zero Downtime Backup and Instant Recovery Support Matrix for HPE P6000 EVA Disk Array Family Using SMI-S Agent</i>
		Windows Server 2003 (X64)	Windows Server 2003 (x64) (Physical host only)	
		Windows Server 2008 (32-bit)	Windows Server 2008 (32-bit) (Physical host only)	
		Windows Server 2008 (x64)	Windows Server 2008 (x64) (Physical host only)	
		Windows Server 2008 R2 (x64)	Windows Server 2008 R2 (x64) (Physical host only)	
		Windows Server 2012	Windows Server 2012 (Physical host only)	
		Red Hat Enterprise Linux 5.x, 6.0, 6.1, 6.2, 6.3 (64-bit)(x64)	Red Hat Enterprise Linux 5.x (64-bit)(x64) (Physical host only)	
SUSE Linux Enterprise Server 10 (32-bit)	SUSE Linux Enterprise Server 10 (32-bit) (Physical host only)			
SUSE Linux Enterprise Server 11 (64-bit)(x64)	SUSE Linux Enterprise Server 11 (64-bit)(x64) (Physical host only)			
VMware	HPE P9000 XP Disk Array Family ¹	Windows Server 2003 (32-bit)	Windows Server 2003 (32-bit) (VM & Physical host)	<ul style="list-style-type: none"> Filesystem & Raw Device/volume Application integrations listed in the <i>HPE Data Protector 8.10 Zero Downtime Backup and Instant Recovery Support Matrix for HPE P9000 XP Disk Array Family</i>
		Windows Server 2003 (X64)	Windows Server 2003 (X64) (VM & Physical host)	
		Windows Server 2008 (32-bit)	Windows Server 2008 (32-bit) (Physical host only)	
		Windows Server 2008 (x64)	Windows Server 2008 (x64) (Physical host only)	

		Windows Server 2008 R2 (x64)	Windows Server 2008 R2 (x64) (Physical host only)	
		Windows Server 2012 (x64)	Windows Server 2012 (x64) (Physical host only)	
		Red Hat Enterprise Linux 5.x, 6.0, 6.1, 6.2, 6.3	Red Hat Enterprise Linux 5.x (VM & Physical host)	
HPE Integrity Virtual Machines (IVM)	HPE P9000 XP Disk Array Family	HP-UX (Itanium) 11.31	HP-UX (Itanium) 11.31	<ul style="list-style-type: none"> • Filesystem & Raw Device/volume • Application integrations listed in the <i>HPE Data Protector 7.00 Zero Downtime Backup and Instant Recovery Support Matrix for HPE P9000 XP Disk Array Family</i>

¹ Only the FC Protocol and the RDM configuration are supported.

The VSS transportable backups are supported by installing the respective array and VSS agents inside the virtual machines running the applications. For all supported VSS configurations for virtual environments (inside virtual machines), refer to the respective *HPE Data Protector 8.10 VSS Integration Support Matrix*.^{1,2,3}

¹ Only the FC Protocol and the RDM configuration are supported.

² Only the FC Protocol and the Hyper-V pass through configuration are supported.

³ IR is not supported.

Table 6: Virtualization application integration support

Data Protector also supports virtualization application specific features that enable snapshots for instant recovery and disaster recovery purposes.

Virtualization application integration support		
Virtualization application	Data Protector component	Supported application components
Microsoft Hyper-V / Hyper-V R2	MS Volume Shadow Copy Integration	<ul style="list-style-type: none"> • VSS based snapshots of VMs
Microsoft Hyper-V / Hyper-V R2	Virtual Environment Agent	<ul style="list-style-type: none"> • VSS based snapshots of VMs (cluster aware)
Microsoft Hyper-V Server 2012	Virtual Environment Agent	<ul style="list-style-type: none"> • VSS based snapshots of VMs (cluster aware)