Hyper-V Server Documentation

HYPER-V-HOST-1





Date Wednesday, February 19, 2025 11:38:55 AM

Author CONTOSO\sysadmin

Version 1.10

Product XIA Configuration Server [17.0.5.0]

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Configuration Item

Provides general information for this item.

General Information	
Name	HYPER-V-HOST-1
Description	Windows Server 2025 Hyper-V
Primary Owner Name	Contoso Support
Primary Owner Contact	support@contoso.com

System Information	
Item Path	Demonstration Company
Identifier	6866ae13-4198-493c-9c8e-fd0b00e39773
Item ID	1008
Version ID	1.10
Check Out Status	Available

Custom Item Details

This is a demo Windows Server 2025 Hyper-V server.

Client Information

Provides information about the client that was used to generate the information and the data used by the client to uniquely identify this item.

item Identifiers	
Primary Identifier	HYPER-V-HOST-1
Secondary Identifier	VMware-56 4d 76 70 f7 02 60 dd-51 ba 49 c9 2e fa 4c 6c
Tertiary Identifier	
Environment Identifier	

Client Information	
Client Machine Name	XCS-2K25-DEMO
Client Identifier	a5f92aec-9e9a-4d75-80d9-108e72daf65b
Client IP Address	192.168.128.6
Client Scan Date	13 February 2025 14:49 (6 days ago)
Client Service Username	CONTOSO\sysadmin
Client Version	17.0.5.0

Scan Profile	
Target	HYPER-V-HOST-1
Profile Name	Hyper-V
Profile Identifier	53607c4e-767d-45be-821d-c4368713060e

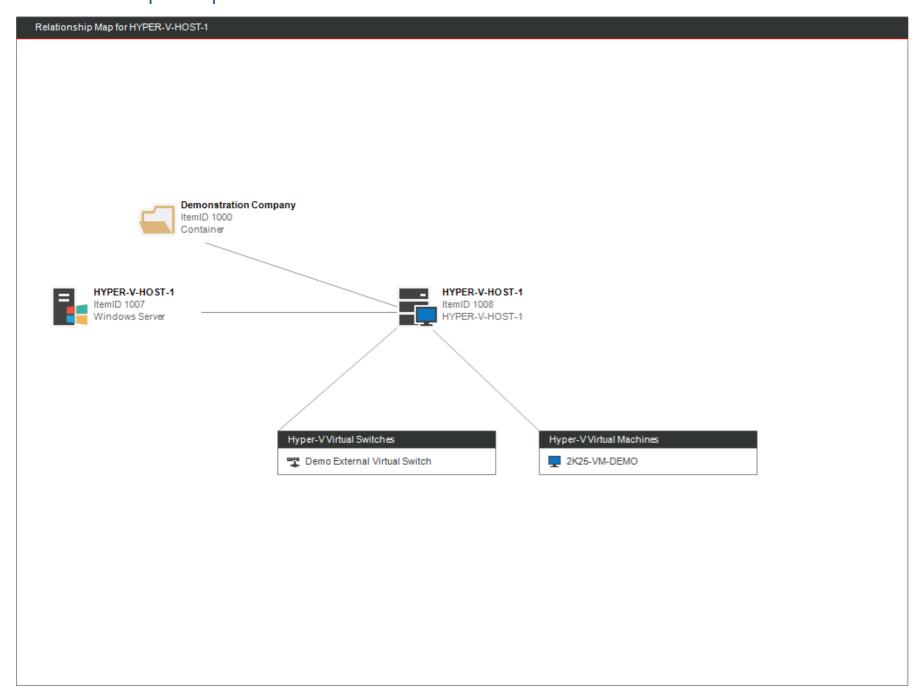
Relationships

Provides a summary of the relationships between this item and other items in the environment.

₽₽ 4 Relationships

Item ID	Direction	Name	Туре	Relationship Type
1007	Outbound	HYPER-V-HOST-1	Windows Server	Hosted On
1000	Outbound	Demonstration Company	Container	Contained Within
Internal	Outbound	2K25-VM-DEMO	Hyper-V Virtual Machine	Hosts Virtual Machine
Internal	Outbound	Demo External Virtual Switch	Hyper-V Virtual Switch	Hosts Virtual Switch

Relationship Map



Server Settings

Hyper-V Server is Microsoft's hardware virtualization product that runs on Windows Server or Azure Local (Azure HCI Stack) operating systems.

General Settings			
Enhanced Session Mode	False		
NUMA Spanning	True		
Bare-Metal Hypervisor	False		
Windows Version	10.0.26100.0		
Paths			
Default Virtual Hard Disk Path	c:\ClusterStorage\Volume1\Disks		
Default Virtual Machine Path	c:\ClusterStorage\Volume1\VirtualMachines		
Storage Migration			
Maximum Storage Migrations	2		
☐ Global Fibre Channel Settings			
Fibre Channel WWNN	C003FF0000FFFF00		
Fibre Channel Minimum WWPN	C003FF2556480000		
Fibre Channel Maximum WWPN	C003FF255648FFFF		
Global Network Settings			
MAC Address (Minimum)	00-15-5D-83-71-00		
MAC Address (Maximum)	00-15-5D-83-71-FF		
Failover Clustering			
Enabled	True		
Cluster Name	hvclusterdemo		
Fully Qualified Domain Name	hvclusterdemo.contoso.com		

Live Migration Settings

Live migration allows for running virtual machines to be moved from one Hyper-V host to another without perceived downtime.

General Settings		
Enabled	True	
Maximum Simultaneous Live Migrations	1	
Networks	Use Any Available Network	
Advanced		
Authentication Type	Credential Security Support Provider (CredSSP)	
Performance Option	Compression	

Replication Settings

Hyper-V Server replication improves resilience by replicating virtual machines from one Hyper-V host server to another.

General Settings		
Enabled	True	
Authorization Type	Allow replication from any authenticated server	
Default Storage Location	C:\ClusterStorage\volume1\Replication	
Certificate Authentication		
Enabled	True	
Certificate Authentication Port	443	
☐ Certificate		
Issued To	hvreplica2k25.test2025.net	
Issuer Name	CertReq Test Root	
Expiry Date	Tuesday, January 6, 2026	
Enhanced Key Usages	Client Authentication (1.3.6.1.5.5.7.3.2) Server Authentication (1.3.6.1.5.5.7.3.1)	
Thumbprint	C900508F64BED4BA537AC244651196DA3F4BB753	
Enabled	True	
Kerberos Authentication Port	80	

Host Information

This section provides information about the host platform.

General Settings	
Computer Fully Qualified Domain Name	HYPER-V-HOST-1.contoso.com
Operating System Name	Microsoft Windows Server 2025 Datacenter
Service Pack	None Installed



Hardware	
Manufacturer	VMware, Inc.
Model	VMware20,1
Serial Number	VMware-56 4d 76 70 f7 02 60 dd-51 ba 49 c9 2e fa 4c 6c
Processors	Intel(R) Core(TM) i9-10885H CPU @ 2.40GHz

Resource Pools

Resource pools are used to aggregate physical resources and allocate them to virtual machines (VMs).

9 Resource Pools

Name	Туре	Parents	Parameters	Resource Metering
Primordial	Ethernet		Demo External Virtual Switch	False
Primordial	Fibre Channel Connection			False
Primordial	Fibre Channel Port			False
Primordial	ISO			False
Primordial	Memory			False
Primordial	PCI Express			False
Primordial	Processor			False
Primordial	Virtual Floppy Disk			False
Primordial	Virtual Hard Disk			False

Virtual Machines

Virtual machines (VMs) in Hyper-V are software-based compute resources that use software instead of a physical computer to host the operating system.

Name	Generation	Guest Operating System	Configuration Version
3 2K25-VM-DEMO	Generation 2	Windows Server 2025 Datacenter	12.0
Guest Operating System	Breakdown		
Guest Operating System		C	Count
Windows Server 2025 D	atacenter	1	
Windows Server 2025 Datacenter			_1

2K25-VM-DEMO

Virtual machines (VMs) in Hyper-V are software-based compute resources that use software instead of a physical computer to host the operating system.

■ General Settings	
Generation	2
Identifier	240990c5-54e0-4b3c-bcc0-5368d5a77cba
Path	c:\ClusterStorage\Volume1\VirtualMachines
Description	This is a demo Windows Server 2025 virtual machine running in Hyper-V.
State	Running
Configuration Version	12.0

Fully Qualified Domain Name WIN-PJDO82SACDK Integration Services Version 10.0.26100 Operating System Name Windows Server 2025 Datacenter Operating System Version 10.0.26100 Processor Architecture 64-bit Service Pack [None Installed]

Guest Screenshot



Serial Numbers

Serial Number	0149-4950-5052-0080-5505-8079-04
Baseboard Serial Number	0149-4950-5052-0080-5505-8079-04
Chassis Asset Tag	0149-4950-5052-0080-5505-8079-04
Chassis Serial Number	0149-4950-5052-0080-5505-8079-04

I►I Automatic Actions

Automatic Start Action	Nothing
Automatic Stop Action	Save
Automatic Critical Error Action	Pause
Automatic Critical Error Timeout (Minutes)	30

Failover Clustering

Clustered	True
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Checkpoint Settings

Checkpoint Type	Production Checkpoints (Failback to Standard)
Checkpoint File Location	c:\ClusterStorage\Volume1\VirtualMachines
Automatic Checkpoints Enabled	False

Firmware Boot Order

Name	Value
File	bootmgfw.efi
DVD Drive	en-us_windows_server_2025_x64_dvd_b7ec10f3.iso
Network Adapter	Demo External Virtual Switch
Hard Drive	2K25-VM-DEMO_1.avhdx

Integration Services

Backup (Volume Shadow Copy)	True
Data Exchange	True
Guest Services	True
Heartbeat	True
Operating System Shutdown	True
Time Synchronization	True

Smart Paging

Smart Paging File Path	c:\ClusterStorage\Volume1\VirtualMachines
------------------------	---

Checkpoints

Hyper-V checkpoints capture the state of a virtual machine at a particular time allowing the virtual machine to be reverted to that state if necessary.

	1 Checkpoints
0	i Checkpoints

Name	Date Created	Configuration Version
O 2K25-VM-DEMO - (13/02/2025 - 14:09:09)	Thursday, February 13, 2025 2:09:27 PM	12.0

DVD Drives

Hyper-V DVD drives allow virtual machines to access ISO files from the host machine.

1 DVD Drives

Name	Media Type	Path
DVD Drive (SCSI 0/1)	ISO	C:\ClusterStorage\Volume1\ISOs\en-us_windows_server_2025_x64_dvd_b7ec10f3.iso

Fibre Channel Adapters

Fibre channel adapters (also known as HBAs) allow virtual machines to directly access fibre channel (FC) storage.

0 Fibre Channel Adapters

There are no fibre channel adapters found.

Hard Disk Drives

Hyper-V provides virtual machines with access to virtual hard disks (VHDs) that provide similar functionality to physical hard disk drives. Pass-through physical disks on the host are also available though no longer recommended.

	3 Hard	Disk	Drives
-	o i iaia	D.0.0	D11100

Name	Туре	Path
Virtual Hard Disk (SCSI 0/0)	Virtual Hard Disk	c:\ClusterStorage\Volume1\Disks\2K25-VM-DEMO_1.avhdx
Physical Hard Drive (SCSI 0/1)	Physical Hard Drive	Disk 19 0.49 GB Bus 0 Lun 0 Target 1
Persistent Memory Device (PMEM 0/1)	Persistent Memory Device	c:\temp\Disk.vhdpmem

Virtual Hard Disk (SCSI 0/0)

Hyper-V provides virtual machines with access to virtual hard disks (VHDs) that provide similar functionality to physical hard disk drives. Pass-through physical disks on the host are also available though no longer recommended.

Controller Location	0
Controller Number	0
Controller Type	SCSI
Hard Disk Drive Type	Virtual Hard Disk
Internal Identifier	Microsoft:240990C5-54E0-4B3C-BCC0-5368D5A77CBA\F16F206F-D6E1-4F7B-8F9F-1BF779A5E2\0\0\0\D
Path	c:\ClusterStorage\Volume1\Disks\2K25-VM-DEMO_1.avhdx
Performance	
Minimum IOPS	Not Specified
Maximum IOPS	Not Specified
▼ VHD Information	
VHD Type	Differencing Disk
VHD Format	VHDX
Size	127 GB
File Size	516 MB

Default

Write Hardening Method

Physical Hard Drive (SCSI 0/1)

Hyper-V provides virtual machines with access to virtual hard disks (VHDs) that provide similar functionality to physical hard disk drives. Pass-through physical disks on the host are also available though no longer recommended.

General Settings	
Controller Location	1
Controller Number	0
Controller Type	SCSI
Hard Disk Drive Type	Physical Hard Drive
Internal Identifier	Microsoft:EB161F6F-6FFB-4CA4-A5BB-F399B7A36A9F\1E3B6F18-5729-4CFD-B931-19D2318C2 19D\0\1\D
Disk Number	0
Path	Disk 19 0.49 GB Bus 0 Lun 0 Target 1

Advanced	
Write Hardening Method	Not Specified

Persistent Memory Device (PMEM 0/1)

Hyper-V provides virtual machines with access to virtual hard disks (VHDs) that provide similar functionality to physical hard disk drives. Pass-through physical disks on the host are also available though no longer recommended.

General Settings	
Controller Location	1
Controller Number	0
Controller Type	PMEM
Hard Disk Drive Type	Persistent Memory Device
Internal Identifier	Microsoft:EB161F6F-6FFB-4CA4-A5BB-F399B7A36A9F\9BB6C87B-83AF-4E4B-8151-865EFD1E4 14C\0\1\D
Path	c:\temp\Disk.vhdpmem

▼ VHD Information		
	VHD Type	Fixed Size
	VHD Format	VHDX
	Size	3 MB
	File Size	8 MB

Advanced	
Write Hardening Method	Default

Memory

Provides information about the memory that is made available to the virtual machine by the Hyper-V host.

General Settings	
Startup Memory	4096 MB
Priority (Weight)	50
Dynamic Memory	
Dynamic Memory Enabled	False
C Resource Pool	
Resource Pool Name	Primordial

Network Adapters

A virtual network adapter (also known as virtual NIC) is a virtualized version of a physical network adapter and is used to provide network connectivity to virtual servers.

1 Network Adapters			
Name	Legacy	Connection	VLAN
Network Adapter	False	Demo External Virtual Switch	Untagged

Network Adapter

A virtual network adapter (also known as virtual NIC) is a virtualized version of a physical network adapter and is used to provide network connectivity to virtual servers.

General Settings	
IP Addresses	192.168.128.39 fe80::5fad:aec3:65d8:c5ae
Legacy	False
Name	Network Adapter
Switch Name	Demo External Virtual Switch
Switch Identifier	20c6e793-8f6b-4dad-b7e6-ab5420066929
Hardware Acceleration	
Virtual Machine Queue	True
IPSec Task Offloading	True
IPsec Offload Maximum Security Associations	512
SR-IOV Enabled	False
Bandwidth	
Enable Bandwidth Management	False
VLAN Settings	
Mode	Untagged
Advanced	
Device Naming	False
DHCP Guard	False
Dynamic MAC Address	True
MAC Address	00-15-5D-83-71-03
MAC Address Spoofing	False
NIC Teaming	False
Port Mirroring Mode	None
Protected Network	True
Router Advertisement Guard	False
Resource Pool	
Resource Pool Name	

Processor

A virtual processor is a software representation of a processor created by the Hyper-V Server hypervisor that allows a virtual machine (VM) to access a physical core on the host computer's CPU.

General Settings		
Virtual Processor Count	1	
Virtual Machine Reserve (%)	0	
Virtual Machine Limit (%)	100	
Relative Weight	100	
Advanced		
Enable Nested Virtualization	False	
Host Resource Protection Enabled	False	
Compatability		
Compatibility For Older Operating Systems	False	
Allow Migration To Different Processor Versions	False	
₩ NUMA		
Hardware Threads Per Core	0	
Maximum Number Of Processors	1	
Maximum NUMA Nodes Per Socket	1	
Maximum Memory Per NUMA Node (MB)	3,582	
Performance Monitoring Hardware		
Perfmon IPT Enabled	False	
Perfmon LBR Enabled	False	
Perfmon PEBS Enabled	False	
Perfmon PMU Enabled	False	
• Resource Pool		
Resource Pool Name	Primordial	

Replication

Hyper-V Server replication improves resilience by replicating virtual machines from one Hyper-V host server to another.

General Settings		
Replication Mode	Extended Replica	
Primary Server	HYPER-V-HOST-2.contoso.com	
Replica Server Name	hvreplica2k25.contoso.com	
Current Replica Server Name	HYPER-V-HOST-1.contoso.com	
Replica Server Port	443	
Security		
Authentication Type	Certificate	
Certificate Thumbprint	7887EB90897EAE84E8800A331555977AA910986F	
Allowed Primary Server	*	
Status		
Replication State	Replicating	
Replication Health	Critical	
Last Replication Time	Monday, January 20, 2025 1:11:54 PM	
Automatic Resynchronization		
Automatic Resynchronize Enabled	True	
Start Interval	18:30:00	
End Interval	06:00:00	
Extended Replication		
Extended Replication Enabled	False	
Advanced		
Bypass Proxy Server	False	
Compression Enabled	True	
Replicated Disks	Hard Drive on SCSI controller number 0 at location 0	
Excluded Disks		
Replicate Host KVP Items	True	
Replication Frequency	5 minutes	

Security

Provides information about the security settings for the virtual machine.

Cours Poot			
Secure Boot			
Secure Boot Enabled	True		
Secure Boot Template	Microsoft Windows		
Secure Boot Template Identifier	1734c6e8-3154-4dda-ba5f-a874cc483422		
Encryption Support			
Enable Trusted Platform Module	False		
Encryption State And Migration Traffic	False		
Advanced			
Shielding Enabled	False		
Virtualization Based Security Opted Out	False		

Virtual Storage Area Networks

Virtual Storage Area Networks (SANs) virtualize workloads that require direct access to SAN logical unit numbers (LUNs).

1 Virtual Storage Area Netwo	rks
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Name	Description
Demo Virtual Storage Area Network	This is a demo virtual storage area network.

Virtual Switches

A virtual switch is a software-based layer-2 Ethernet network switch available in Hyper-V Server.

	1	Virtual	Switches
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Name	Туре	External Interface	VLAN
Demo External Virtual Switch	External	Intel(R) 82574L Gigabit Network Connection #2	VLAN 2

Demo External Virtual Switch

A virtual switch is a software-based layer-2 Ethernet network switch available in Hyper-V Server.

General Settings		
Switch Type	External	
Description	This is a demo external virtual switch.	
Identifier	20c6e793-8f6b-4dad-b7e6-ab5420066929	
External Interface Name	Intel(R) 82574L Gigabit Network Connection #2	
Allow Management Operating System Access	True	
SR-IOV Enabled	False	

Advanced	vanced				
Bandwidth Reservation Mode	Absolute				
Default Flow Minimum Bandwidth (Bits Per Second)	100,000,000				
Default Flow Minimum Bandwidth (Weight)	0				
Load Balancing Algorithm	Not Applicable				
Packet Direct Enabled	False				

Virtual Switch Embedded Teaming	
Embedded Teaming Enabled	False

₹ VLAN		
VLAN Identification Enabled	True	
VLAN Identifier	2	

1 Connected Virtual Machines

Name	Generation	Guest Operating System	State
■ 2K25-VM-DEMO	2	Windows Server 2025 Datacenter	Running

Extensions

Hyper-V virtual extensions provide the ability for independent software vendors (ISVs) to extend the built-in switch functionality.

2 Virtual Switch Extensions

Name	Туре	Enabled	Version
Microsoft NDIS Capture	Monitoring	True	10.0.26100.1
Microsoft Windows Filtering Platform	Filter	False	10.0.26100.1882

Version History

The version history displays the changes that have been made to the documentation of this item over time - either automatically when a change has been detected, or manually by users of the system.

_		
# <).	11	versions

Version	Username	Date	Time	Description
1.10	CONTOSO\sysadmin	Thursday, February 13, 2025	3:06 PM	Updated by XIA Configuration Client Data
1.09	CONTOSO\sysadmin	Thursday, February 13, 2025	2:55 PM	Added item general information
1.08	CONTOSO\sysadmin	Thursday, February 13, 2025	2:34 PM	Updated by XIA Configuration Client Data
1.07	CONTOSO\sysadmin	Thursday, February 13, 2025	2:22 PM	Updated by XIA Configuration Client Data
1.06	CONTOSO\sysadmin	Thursday, February 13, 2025	2:15 PM	Updated by XIA Configuration Client Data
1.05	CONTOSO\sysadmin	Thursday, February 13, 2025	12:27 PM	Updated by XIA Configuration Client Data
1.04	CONTOSO\sysadmin	Thursday, February 13, 2025	12:08 PM	Updated by XIA Configuration Client Data
1.03	CONTOSO\sysadmin	Thursday, February 13, 2025	11:58 AM	Updated by XIA Configuration Client Data
1.02	CONTOSO\sysadmin	Friday, February 7, 2025	4:04 PM	Updated by XIA Configuration Client Data
1.01	CONTOSO\sysadmin	Friday, January 3, 2025	5:20 PM	Updated by XIA Configuration Client Data
1.00	CONTOSO\sysadmin	Friday, January 3, 2025	5:20 PM	Item created.