Netsh diagnostic (diag) commands

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Netsh diagnostic (diag) commands

You can use the Netsh Network Diagnostics commands, or diag context, to administer and troubleshoot operating system and network service parameters from the command line. The command prompt for the Netsh diagnostic context is **netsh diag>**.

The following commands are available at the command prompt for the context (as distinguished from the Windows ServerB 2003 family command prompt). The Netsh Diag context is new to the Windows ServerB 2003 family. You cannot run Netsh Diag commands on a WindowsB 2000B Server.

You can run these commands from the Windows ServerB 2003 family command prompt or from the command prompt for the Netsh diagnostic context. For these commands to work at the Windows ServerB 2003 family command prompt, you must type **netsh diag** before typing commands and parameters as they appear in the syntax below. There might be functional differences between Netsh context commands on WindowsB 2000 and the Windows ServerB 2003 family.

For more information about **netsh**, see <u>Netsh overview</u> [http://technet.microsoft.com/en-us/library/61427fbd-de1f-4c8a-b613-321f7a3cca6a] and <u>Enter a netsh context</u> [http://technet.microsoft.com/en-us/library/d9b4eed7-f79b-4daf-8c22-ffd9428ddea5].

To view the command syntax, click a command:

- <u>connect ieproxy</u>
- <u>connect iphost</u>
- connect mail
- connect news
- <u>dump</u>
- <u>gui</u>
- ping
- ping adapter
- ping dhcp
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- ping gateway
- ping ieproxy
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- ping iphost
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- ping mail
- ping news
- ping wins
- show adapter
- show all
- show client
- show computer
- show dhcp
- show dns
- show gateway
- show ieproxy
- show ip
- show mail
- show modem
- show news
- show os
- <u>show test</u>
- show version
- show wins

connect ieproxy

Establishes, verifies, and then drops a TCP/IP connection with the proxy server specified in Internet Explorer.

Syntax

connect ieproxy

Parameters

none

Remarks

• If no proxy server is specified in Internet Explorer, the command generates output similar to the following:

```
Internet Explorer Proxy (Not Configured)
B B B B Not Configured
```

• If you have specified in Internet Explorer a proxy server named corpproxy with a port of 80, the command generates output similar to the following:

Copy Code

Copy Code

```
Internet Explorer Proxy (corpproxy)
B B B B IEProxyPort = 80
B B B IEProxy = corpproxy
B B B B Server appears to be running on port(s) [80]
```

connect iphost

Establishes, verifies, and then drops a TCP/IP connection to a specified host through a specified port.

Syntax

connect iphostHostPort

Parameters

Host

Specifies the IP address, NetBIOS name, or fully qualified domain name of the host to which you want to connect.

Port

Specifies the port through which you want to connect.

Examples

To connect to the host named microsoft.com through port 28, type:

connect iphost microsoft.com 28

connect mail

Establishes, verifies, and then drops a TCP/IP connection with the node specified as the mail server in the default Outlook Express profile of the current user.

Syntax

connect mail

Parameters

none

connect news

Establishes, verifies, and then drops a TCP/IP connection with the node specified as the news server in the default Outlook Express profile of the current user.

Syntax

connect news

Parameters

none

dump

Creates a script that contains the current configuration.

Syntax

dump

Parameters

none

Remarks

• If you save this script to a file, you can use it to restore altered configuration settings.

gui

Starts the network diagnostics tool in Help and Support Center.

Syntax

gui

Parameters

none

ping

Verifies connectivity with a specified remote host.

Syntax

pingHost

Parameters

Host

Specifies the IP address, NetBIOS name, or fully qualified domain name of the host with which you want to verify connectivity.

ping adapter

Verifies connectivity with computers and other devices (for example, routers) identified in the TCP/IP properties of the specified network adapter or adapters. Used without parameters, the **ping adapter** command verifies connectivity through all installed adapters.

Syntax

ping adapter [{IndexNumber | FullAdapterName | PartialAdapterName}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to verify connectivity. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

Remarks

- This command verifies connectivity with all computers and other devices configured in the TCP/IP properties for each network adapter you specify. For example, if you have a network adapter whose TCP/IP properties are configured with IP addresses for a preferred DNS server, a default gateway, and a DHCP server, **ping adapter** verifies connectivity with each of these devices.
- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To verify connectivity with all computers and other devices configured in the TCP/IP properties for each network adapter, type:

ping adapter

To verify connectivity with all computers and other devices configured in the TCP/IP properties for each network adapter with an index number of 2, type:

ping adapter 2

To verify connectivity with all computers and other devices configured in the TCP/IP properties for each network adapter with "net" at the beginning of its name, type:

ping adapter net*

ping dhcp

Verifies connectivity with the Dynamic Host Configuration Protocol (DHCP) servers configured in the TCP/IP properties for the specified adapter or adapters. Used without parameters, the **ping dhcp** command verifies connectivity with DHCP servers through all installed adapters.

Syntax

ping dhcp [{IndexNumber | FullAdapterName | PartialAdapterName}]

Parameters

{IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to verify connectivity. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To verify connectivity with the DHCP server configured in the TCP/IP properties for each network adapter, type:

ping dhcp

To verify connectivity with the DHCP server configured in the TCP/IP properties for the network adapter with an index number of 2, type:

ping dhcp 2

To verify connectivity with the DHCP server configured in the TCP/IP properties for each network adapter with "net" at the beginning of its name, type:

ping dhcp net*

ping dns

Verifies connectivity with the Domain Name System (DNS) servers configured in the TCP/IP properties for the specified adapter or adapters. Used without parameters, the **ping dns** command verifies connectivity with DNS servers through all installed adapters.

Syntax

ping dns [{ IndexNumber | FullAdapterName | PartialAdapterName}]

Parameters

{ IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to verify connectivity. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose

names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To verify connectivity with the DNS server configured in the TCP/IP properties for each network adapter, type:

ping dns

To verify connectivity with the DNS server configured in the TCP/IP properties for the network adapter with an index number of 2, type:

ping dns 2

To verify connectivity with the DNS server configured in the TCP/IP properties for each network adapter with "net" at the beginning of its name, type:

ping dns net*

ping gateway

Verifies connectivity with the default gateway servers configured in the TCP/IP properties for the specified adapter or adapters. Used without parameters, the **ping gateway** command verifies connectivity through all installed adapters.

Syntax

ping gateway [{IndexNumber | FullAdapterName | PartialAdapterName}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to verify connectivity. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To verify connectivity with the gateway server configured in the TCP/IP properties for each network adapter, type:

ping gateway

To verify connectivity with the gateway server configured in the TCP/IP properties for the network adapter with an index number of 2, type:

ping gateway 2

To verify connectivity with the gateway server configured in the TCP/IP properties for each network adapter with "net" at the beginning of its name:

ping gateway net*

ping ieproxy

Verifies connectivity with the Web server proxy for Internet Explorer.

Syntax

ping ieproxy

Parameters

none

ping ip

Verifies connectivity with all IP addresses for the specified adapter or adapters. Used without parameters, the **ping ip** command verifies connectivity through all installed adapters.

Syntax

ping ip [{IndexNumber | FullAdapterName | PartialAdapterName}]

Parameters

{ IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to verify connectivity. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To verify connectivity with each network adapter, type:

ping ip

To verify connectivity with the network adapter with an index number of 2, type:

ping ip 2

To verify connectivity with each network adapter with "net" at the beginning of its name, type:

ping ip net*

ping iphost

Verifies connectivity with a remote or local host.

Syntax

ping iphostNode

Parameters

Node

Specifies a host by its IP address, its NetBIOS name, or its fully qualified domain name.

Examples

To verify connectivity with the local host (at the loopback address of 127.0.0.1), type:

ping iphost 127.0.0.1

To verify connectivity with the host microsoft.com, type:

ping iphost microsoft.com

ping loopback

Verifies connectivity with the local host loopback address (127.0.0.1).

Syntax

ping loopback

Parameters

none

ping mail

Verifies connectivity with the mail server configured in the default Outlook Express profile of the current user.

Syntax

ping mail

Parameters

none

ping news

Verifies connectivity with the mail server configured in the default Outlook Express profile of the current user.

Syntax

ping news

Parameters

none

ping wins

Verifies connectivity with the preferred and alternate Windows Internet Name Service (WINS) servers for the specified network adapter or adapters. Used without parameters, **ping wins** verifies connectivity through all installed adapters.

Syntax

ping wins [{ IndexNumber | FullAdapterName | PartialAdapterName}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to verify connectivity. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To verify connectivity with the WINS servers whose IP addresses are configured in the TCP/IP properties of each installed adapter, type:

ping wins

To verify connectivity with the WINS servers whose IP addresses are configured in the TCP/IP properties of each installed adapter with an index number number of 2, type:

ping wins 2

show adapter

Shows information about the specified logical adapter or adapters. Used without parameters, the **show adapter** command shows information about all adapters defined for this server.

Syntax

Parameters

{ IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to show information. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- This command lists each adapter by index number in square brackets followed by the name of the adapter as it is registered. Typical output from this command follows: Network Adapters
 - 1. [00000001] 3Com 3C920 Integrated Fast Ethernet Controller (3C905C-TX Compatible)
 - 2. [0000002] RAS Async Adapter
 - 3. [0000003] WAN Miniport (L2TP)
 - 4. [0000004] WAN Miniport (PPTP)
 - 5. [0000005] WAN Miniport (PPPOE)
 - 6. [0000006] Direct Parallel
 - 7. [0000007] WAN Miniport (IP)
 - 8. [0000008] WAN Miniport (Network Monitor)

Examples

To display the logical adapters defined on the computer, type:

show adapter

show all

Lists all network objects defined for the local server. Used without parameters, the **show all** command lists overview configuration information for the following hardware and software components: Default Outlook Express Mail, Default Outlook Express News, Internet Explorer Web Proxy, Loopback, Computer System, Operating System, Version, Modems, Network Adapters, and Network Clients.

Syntax

```
show all [{/v | /p}]
```

Parameters

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

• The output from this command can be lengthy and includes configuration information for mail, news, and proxy servers. It lists information for the TCP/IP loopback address and details about the computer, the operating system, and all network adapters and clients.

show client

Lists all network clients defined for the specified adapter or adapters. Used without parameters, **show client** lists clients for all installed adapters.

Syntax

show client [{IndexNumber | FullAdapterName | PartialAdapterName}] [{/v | /p}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to list clients. The IndexNumber parameter specifies the

adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To list all network clients defined for all network adapters in the host, type:

show client

To list all fields with non-null values for all network clients defined for adapter number 2, type:

show client 2 /p

show computer

Lists Windows Management Interface (WMI) details for the server. Used without parameters, the **show computer** command lists the NetBIOS name of the local computer.

Syntax

show computer $[{/v | /p}]$

Parameters

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Examples

To list all non-null WMI interface parameters for the server:

show computer /p

show dhcp

Lists all DHCP servers defined for the specified adapter. Used without parameters, the **show dhcp** command lists the servers defined for all installed adapters.

Syntax

show dhcp {IndexNumber | FullAdapterName | PartialAdapterName} [{/v | /p}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to list servers. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

• You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.

• If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To list details of all DHCP servers defined for all network adapters, type:

show dhcp /v

To list details of any DHCP servers defined for network adapter 2, type:

show dhcp 2

show dns

Lists all DNS servers defined for a specified adapter. Used without parameters, the **show dns** command lists servers defined for all installed adapters.

Syntax

show dns [{IndexNumber | FullAdapterName | PartialAdapterName}] [{/v | /p}]

Parameters

{ IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to list servers. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To list all non-null details of all DNS servers defined for all network adapters, type:

show dns /p

To list any DNS servers defined for network adapter 2, type:

show dns 2

show gateway

Lists all Internet gateways defined for the specified adapter or adapters. Used without parameters, the **show gateway** command lists gateways defined for all installed adapters.

Syntax

show gateway [{IndexNumber | FullAdapterName | PartialAdapterName}] [{/v | /p}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to list gateways. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To list all available details about all Internet gateways defined for all adapters, type:

show gateway /v

To list all non-null values available for any gateways defined for network adapter 3, type:

show gateway 3 /p

show ieproxy

Lists Internet Explorer proxy servers defined for the specified adapter or adapters. Used without parameters, **show ieproxy** lists the servers for all installed adapters.

Syntax

show ieproxy [{IndexNumber | FullAdapterName | PartialAdapterName}] [{/v | /p}]

Parameters

{ IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to list servers. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, you must type an asterisk at the end of the parameter. If the sequence of characters is must appear at the end of the name, you must type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, you must type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, you must type an asterisk at the beginning of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To list all Internet Explorer proxy servers defined for all network adapters in the server, type:

show ieproxy

show ip

Shows information about the specified adapter or adapters for which TCP/IP is enabled. Used without parameters, the **show ip** command shows information for all installed adapters.

Syntax

show ip [{IndexNumber | FullAdapterName | PartialAdapterName}] [{/v | /p}]

Parameters

{ IndexNumber| FullAdapterName| PartialAdapterName}

Specifies the adapter or adapters for which you want to show information. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters must appear at the end of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.

Examples

To list the index number, name, and TCP/IP address for all adapters for which TCP/IP is enabled, type:

show ip

show mail

Shows the Outlook Express mail server specified for the local computer. Used without parameters, the **show mail** command lists overview configuration information for Default Outlook Express Mail.

Syntax

show mail $[{/v | /p}]$

Parameters

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Examples

To display the mail server configured for the local computer, type:

show mail

show modem

Lists details about the specified modem device or devices configured on the local computer. Used without parameters, **show modem** lists details about all modem devices.

Syntax

show modem [{IndexNumber | FullModemName | PartialModemName}] [{/v | /p}]

Parameters

{ IndexNumber| FullModemName| PartialModemName}

Specifies the modem device or devices for which you want to list details. The *IndexNumber* parameter specifies the device by its index number. The *FullModemName* parameter specifies the device by its name as registered in the operating system. The *PartialModemName* specifies the device or devices whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the end of the parameter. If the sequence of characters can appear at the end of the parameter. If the sequence of characters can appear at the end of the parameter. If the sequence of characters can appear at the end of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Examples

To show all details, even those with null values, about all modem devices configured on the local computer, type:

show modem /v

To show the name and index number of all modem devices configured on the local computer with "dialup" at the beginning of their names, type:

show modem dialup*

show news

Displays configuration information for the news server defined for the local computer. Used without parameters, the **show news** command lists overview configuration information for Default Outlook Express News.

Syntax

show news [{/v | /p}]

Parameters

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Examples

To display the name and the TCP/IP address of the news server, type:

show news

show os

Displays information about the operating system running on the local computer.

Syntax

show os [/v]

Parameters

/v

Specifies that fields with a null value should appear.

Remarks

• Information shown by this command is collected by the WMI provider win32_operatingsystem.

show test

Shows all network objects defined for the local computer and verifies connectivity with each object using the **ping** command. Used without parameters, the **show test** command lists overview configuration information for the following hardware and software components: Default Outlook Express Mail, Default Outlook Express News, Internet Explorer Web Proxy, Loopback, Computer System, Operating System, Version, Modems, Network Adapters, and Network Clients. In addition, connectivity is verified with the Loopback adapter and all IP addresses configured as a client option in the TCP/IP properties of each network adapter.

Syntax

show test $[{/v | /p}]$

Parameters

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

• The output of this command can be lengthy and might require a few minutes to complete. The output includes configuration information for mail, news, and proxy servers as well as the results of attempts to verify connectivity to those servers using the **ping** command. This command lists information for and verifies connectivity with the TCP/IP loopback address. This command lists details about the computer and the operating system as well as all network adapters and clients. Connectivity is verified with network adapters and clients using the **ping** command, and the results are displayed.

Examples

To show all information available to the Netsh diagnostic context, type:

show test /v

show version

Shows the version of the operating system and, optionally, the version of Windows Management Infrastructure (WMI). Used without parameters, the **show version** command lists the version number of the operating system installed on the local computer.

Syntax

show version $[{/v | /p}]$

Parameters

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

• The first line of output for this command shows the version of the operating system. The second line shows the version of WMI. Typical output for this command follows:

```
Version (5.1.2416)
B B B B Version = 5.1.2416
B B B B BuildVersion = 2416.0000
```

Examples

To show the version of the operating system and WMI, including fields with a null value, type:

show version /v

show wins

Lists WINS servers for the specified adapter or adapters. Used without parameters, the **show wins** command lists servers for all installed adapters.

Syntax

show wins [{IndexNumber | FullAdapterName | PartialAdapterName}] [{/v | /p}]

Parameters

{ IndexNumber | FullAdapterName | PartialAdapterName }

Specifies the adapter or adapters for which you want to list servers. The *IndexNumber* parameter specifies the adapter by its index number. The *FullAdapterName* parameter specifies the adapter by its name as registered in the operating system. The *PartialAdapterName* parameter specifies the adapter or adapters whose names contain the sequence of characters specified in the parameter. If the sequence of characters must appear at the beginning of the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter. If the sequence of characters can appear anywhere in the name, type an asterisk at the beginning of the parameter and at the end of the parameter.

{ /v| /p}

Specifies whether fields with a null value should appear. The /v parameter specifies that the fields should appear. The /p parameter specifies that the fields should not appear.

Remarks

- You can use the **show adapter** command to display the index numbers and the full names of all logical adapters defined on the computer.
- If you specify an adapter by its index number, you do not need to type the leading zeroes.
- Typical output for this command is as follows:

```
Copy Code
```

Copy Code

```
WINS Servers
B B B 2. [0000002] 3Com 3C920 Integrated Fast Ethernet Controller (3C905C-TX Compatible)
B B B WINSPrimaryServer = 172.16.44.17
B B B B WINSSecondaryServer = 172.16.32.22
```

Examples

To list the WINS servers defined for all adapters on the server, type:

show wins

To list the WINS servers specified for the adapter with index number 2, type:

show wins 2

Formatting legend

В

Format	Meaning
Italic	Information that the user must supply
Bold	Elements that the user must type exactly as shown

Ellipsis ()	Parameter that can be repeated several times in a command line
Between brackets ([])	Optional items
Between braces ({}); choices separated by pipe (). Example: {even odd}	Set of choices from which the user must choose only one
Courier font	Code or program output

See Also

Concepts

Netsh commands for AAAA [http://technet.microsoft.com/en-us/library/9ffd261c-62e4-4f41-aa35-2790bd253477] Netsh commands for DHCP [http://technet.microsoft.com/en-us/library/df9ecef3-7d85-49e6-a2aa-ff84a5bd3a39] Netsh commands for Interface IP [http://technet.microsoft.com/en-us/library/b2c92af5-425a-4c0b-8604-7a8c4ac497e0]

<u>Netsh commands for remote access (ras)</u> [http://technet.microsoft.com/en-us/library/385abd50-e52d-4680-b011-417432c33503]

<u>Netsh commands for WINS</u> [http://technet.microsoft.com/en-us/library/670bdec4-fe5b-45f5-aeae-4b13021d2006] <u>Command-line reference A-Z</u> [http://technet.microsoft.com/en-us/library/552ed70a-208d-48c4-8da8-2e27b530eac7] <u>Command shell overview</u> [http://technet.microsoft.com/en-us/library/44500063-fdaf-4e4f-8dac-476c497a166f]

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