

RELEASE NOTES:



Web OS™ 10.0

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NORTEL
NETWORKS™

4655 Great America Parkway
Santa Clara, CA 95054
Phone 1-800-4Nortel
www.nortelnetworks.com

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Release Notes

These *Web OS 10.0 Release Notes* provide the latest information regarding your Nortel Networks Alteon Web Switch running Web OS 10.0 software. This document modifies information found in the complete documentation:

- *Web OS 10.0 Command Reference* (part number 212778-A)
- *Web OS 10.0 Application Guide* (part number 212777-A)
- *Web OS Switch Software BBI Quick Guide* (part number 213164-A)

Please keep this information with your product manuals.

Documentation Errata

Web OS 10.0 BBI Not Supported on Alteon AD3 and Alteon 180e Platforms

The Web OS Browser-Based Interface (BBI) is not installed or supported on the Alteon AD3 and Alteon 180e Web switch platforms.

- The Web OS 10.0 Documentation CD (part number 212780-A) contains a link to the *Web OS Switch Software BBI Quick Guide* (part number 213164-A). Users of Alteon AD3 or Alteon 180e platforms should disregard this link. On page 9 of this *Quick Guide*, the first bullet under the Requirements heading should be revised to read: “Alteon 184 or Alteon AD4, or Alteon 700 series Web switches.”
- The *Web OS 10.0 Command Reference* (part number 212778-A) contains information about the `/cfg/sys/http enable|disable` command in Table 6-2 on page 171. This command enables or disables HTTP access to the Browser Based Interface. Users of the Alteon AD3 or Alteon 180e platforms should ignore this command.

New Features and Supported Platforms

Web OS 10.0 features are supported on the following Alteon Web switches:

Feature	Alteon Web Switches AD3/180e	Alteon Web Switches AD4/184
Vlan-based default gateway	No	Yes
Vlan Filtering	No	Yes
Multiple Instances of Spanning Tree	Yes	Yes
Layer 7 deny filters	No	Yes
Increase real server support to 1024	No	Yes
SYN Attack Detection/Protection	Yes	Yes
Reporting Classification Manager: SYSLOG and SNMP	No	Yes
Reporting Classification Manager: Ability to filter SYSLOG based on severity	No	Yes
Reporting Classification Manager: SNMP traps defined for VRRP state changes	No	Yes
Reporting Classification Manager: SNMP traps defined for failed login	No	Yes
Selectable Hash Parameters	Yes	Yes
Layer 4 DNS Load Balancing (UDP and TCP ports)	Yes	Yes
L7 DNS Load Balancing	Yes	Yes
Enhanced DNS Health Check	Yes	Yes
TCP Rate Limiting	Yes	Yes
Hash on any HTTP header	Yes	Yes
Increase support of 16 rport to vport	No	Yes
Increased number of scripted health check to 16	No	Yes
Descriptive names for filters	Yes	Yes
OSPF	No	Yes

Feature	Alteon Web Switches AD3/180e	Alteon Web Switches AD4/184
LDAP health check	Yes	Yes
Streaming Cache Redirection	Yes	Yes
L7 Parsing of RTSP SLB	Yes	Yes
ARP health check	Yes	Yes
Telnet client	Yes	Yes
Increase logging buffer	Yes	Yes
Support of OPER command on Web OS Browser-based Interface and SNMP	No	Yes
Enhanced Web OS Browser-based Interface support	No	Yes
Configurable prompt name	Yes	Yes
Bandwidth management	No	Yes

Installing Web OS 10.0

Web OS 10.0 software can be installed in one of the following two ways:

- “TFTP Upgrade”
- “Direct Serial Upgrade”

The TFTP software installation is the preferred method of upgrading switch software. This is because TFTP software downloads retain the switch configuration throughout the upgrade process.

TFTP Upgrade

Use the following procedure to upgrade the software on your Alteon Web switch:

1. **Be sure that your Web switch is currently running Web OS 9.0.**

NOTE – You can upgrade to Web OS 10.0 from Web OS 9.0 only. If running Web OS software prior to version 9.0, obtain and follow the upgrade instructions found in the *Web OS 9.0 Release Notes* (part 050145A). The switch must be running Web OS 9.0 prior to continuing with the upgrade.

2. **Backup the current Web OS 9.0 configuration to a file (optional, but recommended).**

You may obtain a configuration backup either through a TFTP configuration upload to a file or by copying the contents of the configuration dump to a file.

```

>> # /cfg/ptcfg
Enter hostname or IP address of TFTP server:
Enter name of file on TFTP server:
```

3. **Upgrade the boot image on the switch.**

Perform a TFTP download of the boot image software code onto the switch.

```

>> # /boot/gtimg
Enter name of switch software image to be replaced
["image1"|"image2"|"boot"]: boot
Enter hostname or IP address of TFTP server:
Enter name of file on TFTP server:
```

4. Upgrade image1 or image2 on the switch.

Perform a TFTP download of the Web OS 10.0 software code onto the switch.

```
>> # /boot/gtimg
Enter name of switch software image to be replaced
["image1"|"image2"|"boot"]: <image#>
Enter hostname or IP address of TFTP server:
Enter name of file on TFTP server:
```

5. (Optional) Select the new Web OS 10.0 image for use upon reboot, and reset the switch.

```
>> Boot Options# image
Currently set to use switch software "image1" on next boot.
Specify new image to use ["image1"/"image2"]: <image#>
>> Boot Options# reset
```

Direct Serial Upgrade

You can perform a serial download of the new switch software if you are upgrading to Web OS 10.0 directly from any image. However, serial download will reset the switch configuration back to its factory defaults for AD3 /180e Web switches only.

This procedure requires the following:

- A computer running terminal emulation software
- A standard serial cable with a male DB9 connector (see your switch hardware installation guide for specifics)
- A *binary* switch firmware image (*not* the `tftp` file used for TFTP download)

Use the following procedure to perform a serial upgrade.

1. **Using the serial cable, connect the computer to the switch Console port.**
2. **Make sure that the new binary firmware file is available on the computer.**
3. **Start your terminal emulation software and set the communication parameters:**

Parameter	Value
Baud Rate	9600
Data Bits	8
Parity	None
Stop Bits	1

4. **Turn on the switch power and press <Shift-F> while the switch is first attempting to boot.**

When performed correctly, the following message appears:

```
AceSwitch BootMon 2.0.1.15
To download to target use xmodem at 57600 baud
```

5. **Reconfigure your terminal emulation software for the following parameters:**

Parameter	Value
Baud Rate	57,600
Data Bits	8
Parity	None
Stop Bits	1

6. **Set the file transfer mode to Xmodem.**
7. **Transfer the binary firmware image file to the switch.**

This process can take three or four minutes to complete. When finished, the message “done” will appear on your terminal.

8. **Disconnect the terminal emulation session and reconfigure your terminal emulation software for normal switch connection parameters:**

Parameter	Value
Baud Rate	9600
Data Bits	8
Parity	None
Stop Bits	1

9. **Reconnect the terminal session to the switch.**
10. **Turn the switch power off, and then back on again.**

The switch should now boot normally.

Downgrading from Web OS 10.0

If your Web switch is not working properly after you install Web OS 10.0, then follow this procedure to remove Web OS 10.0 software and downgrade to an earlier version of the software.

NOTE – Downgrading from Web OS 10.0 to earlier versions without following this procedure will result in configuration loss.

1. **Backup the current Web OS 10.0 configuration to a file.**
2. **Perform a TFTP download of the Web OS 9.0 software code onto the switch.**

NOTE – It is not required to download the Web OS 9.0 boot image back on the switch.

3. **Reset the switch to its factory defaults.**
4. **Select the new Web OS 9.0 image for use upon reboot, and reset the switch.**
5. **Get the desired switch configuration.**
 - To restore the Web OS 9.0 configuration to the original settings prior to the upgrade, you can use the configuration backup created during the upgrade procedure.
 - To use the configuration for Web OS 10.0, get the configuration file created in [Step 1](#) above. Any Web OS 10.0-specific configurations will be lost when you downgrade the software. An error message may appear on your display.

NOTE – If you have saved the switch configuration to a TFTP server, temporarily add one IP interface to reach the TFTP server. If the TFTP server is on the same subnet, use `ping` to test the connection. If the TFTP server is on another subnet, add a default gateway to the other network. These settings are overwritten once you have loaded the configuration file.

Feature Configuration Notes

This section describes configuration notes and limitations for the Web OS 10.0 software.

Reconfiguring from a Telnet Client

To configure your switch from a Telnet client, it is recommended to use the `getcfg` (get configuration) command instead of copying and pasting a large configuration. The Telnet daemon cannot handle a large amount of data and your switch will appear to be suspended. You can however, open another Telnet client window to verify if your switch is still operational.

Port Mirroring

- ICMP packets sent to and from a switch address are not mirrored (such as the IP interface or the virtual IP address of the switch). Similarly, packets sent during the 3-way handshake are also not mirrored for configurations involving port mirroring and L7 URL server load balancing or delayed binding.
- Packets are mirrored after switch processing. Packets from a client port destined for the virtual IP address will show the real server IP address at the monitoring port.

SNMP Traps Defined for VRRP State Changes

An SNMP trap is generated if authentication fails when the password defined under `/cfg/vrrp/if <number>/passwd` does not match. The SNMP trap is not generated when the admin passwords on the two switches do not match, but the switches will fail to synchronize.

Layer 7 Deny Filter

- Checks the first frame in the URL request only.
- Supports a single Layer 7 deny filter per port.
- Enable DAM or proxy IP address.
- Do not configure Layer 7 deny filter with Layer 3 binding, including WAP load balancing that requires Layer 3 binding.
- Do not sync configuration between two switches if the peer switch is configured for L7 deny filter.

Detecting SYN attacks

SYN Attacks are not detected on port 21.

Layer 4 DNS Load Balancing

- Disable proxy IP address for UDP DNS server load balancing.
- Disable global server load balancing.

Layer 7 DNS Load Balancing

- DNS server load balancing zone transfer is not supported.
- DNS server load balancing is not supported with global server load balancing.

EMS Support

EMS allows you to configure up to 8 rports instead of the supported 16 rports.

OSPF Support

Minimize the number of LSAs in the OSPF area if the Link State Database is close to its maximum capacity of 2K routes or the OSPF routing table is close to its maximum capacity of 1K routes. Verify the total number of LSAs with the command `/info/ospf/dbase/dbsum` and `/info/stat/route`. To minimize the LSAs or the OSPF routes:

- Create a stub area to ensure that external routes are not propagated in that area.
- Use hierarchical routing if it is a flat network, by dividing it into a number of areas and configuring appropriate route summarization between areas.

LDAP Health Check

LDAP health checks supports anonymous bind only.

Web Cache Redirection on RTSP

- Disable real ports proxy IP.
- Disable port-based bandwidth management.
- Disable proxy for the RTSP WCR redirection filter.
- Enable VMA and DAM.

Pattern Match for L7 Parsing of RTSP strings

- Disable proxy IP.
- Disable global server load balancing.

Using the DIFF FLASH Command

To make the CLI more intuitive in the Web OS 10.0 software, some of the configuration menus in Web OS 9.0 have been reorganized. For example, [Figure 1](#) shows the menu changes in the `/cfg/slb` menu.

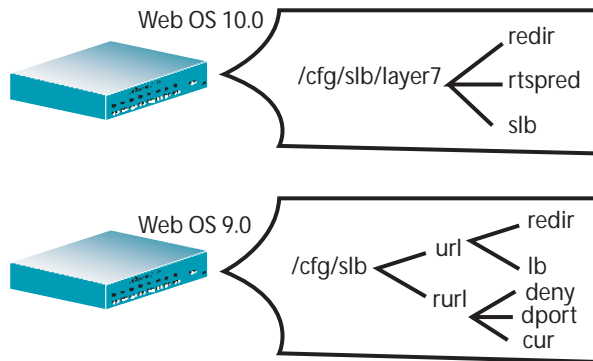


Figure 1 Menu changes in Web OS 10.0 versus Web OS 9.0

You will notice some discrepancies if you perform the `diff flash` command *immediately* after you upgrade to Web OS 10.0. To ensure the previous configurations are saved, make some minor configuration changes and then perform an `apply` and `save`.

Others

- Filters per VLAN does not support NAT.
- Avoid adding large amount of static routes when the routing table is full.
- Avoid performing the `diff` command if you are running a large configuration with extensive routes, such as OSPF.

Late-Breaking News and Support

Web access: <http://www.nortelnetworks.com/cs>

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