

ARISTA

NetVisor OS Installation and Software Setup Guide

Arista Networks

www.arista.com

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Glossary

Glossary of NetVisor UNUM and NetVisor OS Terms

To review the Glossary, refer to the online [document](#).

Introduction

This document covers the deployment of NetVisor OS on Dell Open Networking switches, Wedge switches, Edgecore switches, and NetVisor Freedom Series switches and also the process for readying for further configurations.

The main difference between NetVisor Freedom Series switches and Edgecore or Dell switches is the day-0 software installation procedure. While the Freedom Series switches come with NetVisor OS pre-loaded and pre-licensed, the other switches require additional steps to install NetVisor OS and apply proper licenses. See the subsequent sections in this guide for details.

Additionally, for more detailed information on NetVisor OS and the feature configurations, refer to other documents available on [Pluribus Networks](#) website.

Hardware Installation

Refer to the hardware installation guides of your platform of choice from the hardware manufacturer to complete the following hardware installation procedures:

- 1) Understanding Safety Considerations
- 2) Unpacking the Switch
- 3) Rack Mounting the Switch
- 4) Powering up the Switch

The steps described in this section prepare the hardware for NetVisor OS installation.

Dell Hardware Installation

Refer to the hardware installation procedures for Dell Open Networking switches described in the [Dell Platform Getting Started Guides](#).

NetVisor Networks Freedom Series Hardware Installation

Refer to the hardware installation guides [here](#) and follow the procedure mentioned in the document to complete the hardware installation.

Note: The serial port settings required to access the device via the console port are:

- Baud rate - 115200
 - Data bits - 8
 - Stop bits - 1
 - Parity - n
-

Installing NetVisor OS on Dell and Edgecore Switches

This section describes the procedure for installing NetVisor OS on Wedge, Edgecore, and Dell Open Networking switches. For the installation procedure for NetVisor Freedom series switches, see the [Upgrading NetVisor OS Software for Freedom Series Switches](#).

The Open Network Install Environment (ONIE) is an open source initiative that defines an open *install environment* for bare metal network switches like Dell Open Networking and Edgecore. Download an ONIE compatible NetVisor OS image from Pluribus Networks Cloud (PNC) at cloud.pluribusnetworks.com.

However, before you download the NetVisor OS image from PNC, you must retrieve the *unique switch identifiers*, which is required later to activate the switch license in PNC.

Obtaining the Switch Unique Identifiers for Dell Switches

For Dell switches, the unique identifier is represented by the *Service Tag*, which is a seven character identifier unique to the device.

When the network administrator connects to a Dell switch via console port for the first time (assuming that no other OS is already installed), the ONIE prompt is displayed. At the prompt type the command, `onie-syseeprom` and note down the Service Tag string as displayed below:

```
ONIE:/ # onie-syseeprom
TlvInfo Header:
  Id String:  TlvInfo
  Version:    1
  Total Length: 179
TLV Name      Code Len Value
-----
Part Number   0x22  6 09H9MN
Serial Number 0x23  20 CN09H9MN2829875P0037
Base MAC Address 0x24  6 14:18:77:25:5A:B9
Manufacture Date 0x25  19 05/25/2017 08:02:43
Device Version 0x26  1 1
Label Revision 0x27  3 A00
Platform Name  0x28  30 x86_64-dellemc_s4148f_c2338-r0
ONIE Version   0x29  10 3.33.1.1-4
MAC Addresses  0x2A  2 256
Manufacturer   0x2B  5 28298
Country Code   0x2C  2 CN
Vendor Name    0x2D  8 Dell EMC
Diag Version   0x2E  10 3.33.3.0-1
Service Tag   0x2F  7 5MP6XC2
Vendor Extension 0xFD  4 0x00 0x00 0x02 0xA2
Product Name   0x21  8 S4148-ON
CRC-32         0xFE  4 0x0CF1D9FF
Checksum is valid.
```

You can also find the service tag from the label of the packaging material as well. The service tag is also located on the device. See the examples (from the packaging label and the top cover of the device) in the figures below:



Figure - 1: Service Tag Location on the Packaging Label



Figure - 2: Service Tag Location on the Device

Obtaining the Switch Unique Identifiers for Edgecore Switches

For Edgecore switches, the unique identifier is represented by the *Serial Number*.

When the network administrator connects to an Edgecore switch via console for the first time (assuming that no other OS is already installed), the ONIE prompt is displayed.

At the prompt type the command, `onie-syseeprom` and note down the Serial Number string as displayed:

```
ONIE:/ # onie-syseeprom
TlvInfo Header:
  Id String:  TlvInfo
  Version:    1
  Total Length: 168
TLV Name      Code Len Value
-----
Manufacture Date 0x25 19 06/30/2016 15:04:19
Diag Version     0x2E 7 2.0.1.5
Label Revision   0x27 4 R01J
Platform Name    0x28 27 x86_64-accton_as5712_54x-r0
ONIE Version     0x29 13 2015.11.00.05
Manufacturer     0x2B 6 Accton
Country Code    0x2C 2 TW
Base MAC Address 0x24 6 CC:37:AB:F5:37:74
Serial Number 0x23 14 571254X1626007
Part Number     0x22 13 FP1ZZ5654001A
Product Name    0x21 15 5812-54X-O-AC-F
MAC Addresses   0x2A 2 74
Vendor Name     0x2D 8 Edgecore
CRC-32         0xFE 4 0xCB35E235
Checksum is valid.
```

Downloading NetVisor OS ONIE Image from Pluribus Networks Cloud

For a quick introduction on the services offered by Pluribus Networks Cloud (PNC), refer to the links:

- Getting started: <https://www.pluribusnetworks.com/get-started/>
- PN Cloud Overview video: <https://www.pluribusnetworks.com/resources/pluribus-networks-cloud-overview/>

NetVisor OS supports multiple online and offline installation methods. However, this sections describes the offline installation method with the assumption that the switches do not have access to the internet and PNC.

Note: For offline installation process, a USB drive is required to save both the NetVisor OS software and the license files.

Note: It is mandatory to save the license files to the USB stick along with NetVisor OS software. The installation process cannot be completed if you do not have the license files.

To download and install NetVisor OS:

1. Access the latest NetVisor OS ONIE software from PNC: click **DOWNLOADS** --> **CURRENT** in the left-hand menu panel (**Figure 3** below).
2. Download an image: click the Download button against the ONIE version that you would like to download (**Figure 3**) and save the image to the FAT formatted USB stick root folder:

Pluribus Networks Cloud Welcome

SOFTWARE

OPEN NETVISOR LINUX - 1ST TIME INSTALL → Click Current to access Netvisor images
 This image is used for newly purchased or RMA'd products that do not have ONVL installed.

→ Click to download ONIE Netvisor image

| Name | Version | Platform | Checksum | Documentation | Download |
|---------------------|-------------|----------|----------------------------------|---------------|----------|
| ONIE 6.1.0 HF2 | 6.1.0-18195 | ONVL | 9852e7b4753def25e68eb42e77d9af | | Download |
| ONIE 6.0.4 GA | 6.0.4-17029 | ONVL | 92e79d5db48f1db414cc77f41988397 | | Download |
| ONVL 5.2.1 ONIE HF2 | 5.2.1-15700 | ONVL | 761c7b2728195ef2ca5388289484c5ba | | Download |
| ONIE 5.1.0 HF5 | 5.1.0-15080 | ONVL | b682526c32e1e43da511b2a83c954468 | | Download |
| ONVL 6.0.0 ONIE HF1 | 6.0.0-16334 | ONVL | a7c1a25cfc85ca79ba09a2dc9180d4d | | Download |
| ONVL 5.2.0 ONIE GA | 5.2.0-15650 | ONVL | 8db785adFacF8d071e8270576cd99 | | Download |
| ONVL 5.1.1 ONIE GA | 5.1.1-15300 | ONVL | 4669fa83e1c51b348cc478e956d9f67 | | Download |
| ONVL 5.1.2 ONIE GA | 5.1.2-15459 | ONVL | 6eab3528b944ff88e61b7345189ff82 | | Download |
| ONVL 5.1.0 ONIE HF3 | 5.1.0-15027 | ONVL | 6c834ec8fee822a081471f1cd54238 | | Download |
| ONVL 3.0.0 HF1 ONIE | 3.0.0-12817 | ONVL | 38888935f44b5f1e108d864fc2ccf12 | | Download |

OPEN NETVISOR LINUX - UPGRADES
 This represents the most current, generally available version of ONVL. In order stay current on any new features, bug fixes and product enhancements, Pluribus recommends that you install this version of ONVL.

| Name | Version | Platform | Checksum | Documentation | Download |
|--|-------------|----------|---------------------------------|---------------|----------|
| ONVL 6.1.0 HF2 (Upgrades from 3.1.1 and earlier) | 6.1.0-18195 | ONVL | c81fd18ac1189e12ca676369fca62e | | Download |
| ONVL 6.1.0 HF2 (Upgrades from 5.0.0 and later) | 6.1.0-18195 | ONVL | 817a659161f74242f1d38cab69fb7c2 | | Download |
| ONVL 6.0.4 GA (Upgrades from 3.1.1 and earlier) | 6.0.4-17029 | ONVL | 858b019b9f70c1794c8ff2a6c53fcc8 | | Download |
| ONVL 6.0.4 GA (Upgrades from 5.0.0 and later) | 6.0.4-17029 | ONVL | 6eab35c128c8146848c4a89f5c89b | | Download |
| ONVL 5.2.0 HF1 (Upgrades from 5.0.0 and later) | 5.2.0-15652 | ONVL | 515884c7b7af4768db864fc8e5ad57 | | Download |

Figure 3 - Pluribus Networks Cloud Software Download Page

Note: Ensure that the USB stick is of FAT32 format.

Note: Release notes are also available for download from the **Documentation** column. It is recommended that you download and review the release notes before you begin the ONIE installation process.

- Verify the MD5 checksum of the downloaded NetVisor image against the MD5 checksum obtained from the cloud:

Pluribus Networks Cloud Welcome

SOFTWARE

OPEN NETVISOR LINUX - 1ST TIME INSTALL
This image is used for newly purchased or RMA'd products that do not have ONVL installed.

| Name | Version | Platform | Checksum | Documentation | Download |
|---------------------|-------------|----------|----------------------------------|---------------|----------|
| ONIE 6.1.0 HF2 | 6.1.0-18195 | ONVL | 8052e7b4753def25e088eb42e77d5daf | | Download |
| ONIE 6.0.4 GA | 6.0.4-17029 | ONVL | 92e79d5db48f1db414cc77f43988397 | | Download |
| ONVL 5.2.1 ONIE HF2 | 5.2.1-15700 | ONVL | 761c7b278195ef2ca518828484c1ba | | Download |
| ONIE 5.1.0 HF5 | 5.1.0-15080 | ONVL | b682526c32e1e43de511b2e83c95468 | | Download |
| ONVL 6.0.0 ONIE HF1 | 6.0.0-16334 | ONVL | a7c1a25cfc85cca790a09a2dc5918d4d | | Download |
| ONVL 5.2.0 ONIE GA | 5.2.0-15650 | ONVL | 8db785d8facf86d271e8270576cd99 | | Download |
| ONVL 5.1.1 ONIE GA | 5.1.1-15300 | ONVL | 4669fa83e1c51b348cc478e956d9f67 | | Download |
| ONVL 5.1.2 ONIE GA | 5.1.2-15459 | ONVL | deab3528b944ff8e61b745189ff82 | | Download |
| ONVL 5.1.0 ONIE HF3 | 5.1.0-15027 | ONVL | 6c8f4ec3fe822a801471f1cd54218 | | Download |
| ONVL 3.0.0 HF1 ONIE | 3.0.0-12817 | ONVL | 38888835f485f1e108d864fc2ccf12 | | Download |

OPEN NETVISOR LINUX - UPGRADES
This represents the most current, generally available version of ONVL. In order stay current on any new features, bug fixes and product enhancements, Pluribus recommends that you install this version of ONVL.

| Name | Version | Platform | Checksum | Documentation | Download |
|--|-------------|----------|----------------------------------|---------------|----------|
| ONVL 6.1.0 HF2 (Upgrades from 3.1.1 and earlier) | 6.1.0-18195 | ONVL | c01fd18ac1189e12ca0763699f0ca2e | | Download |
| ONVL 6.1.0 HF2 (Upgrades from 5.0.0 and later) | 6.1.0-18195 | ONVL | 817a659161f74242f1d38cab69fb7c2 | | Download |
| ONVL 6.0.4 GA (Upgrades from 3.1.1 and earlier) | 6.0.4-17029 | ONVL | 85a8019a9f70c1794c8ff72akc53fcc8 | | Download |
| ONVL 6.0.4 GA (Upgrades from 5.0.0 and later) | 6.0.4-17029 | ONVL | 6edba31c128c8b1468d8c4a89f5c89b | | Download |
| ONVL 5.2.0 HF1 (Upgrades from 5.0.0 and later) | 5.2.0-15652 | ONVL | 515884c1fb7af4768db864fc8e45ad57 | | Download |

Figure 4 - Pluribus Network Cloud Software Download - MD5 Checksum

Activating a Switch from Pluribus Networks Cloud

To activate a switch,

1. Click the **ACTIVATIONS** option on the left-hand side menu panel as shown in the **Figure 5** below:

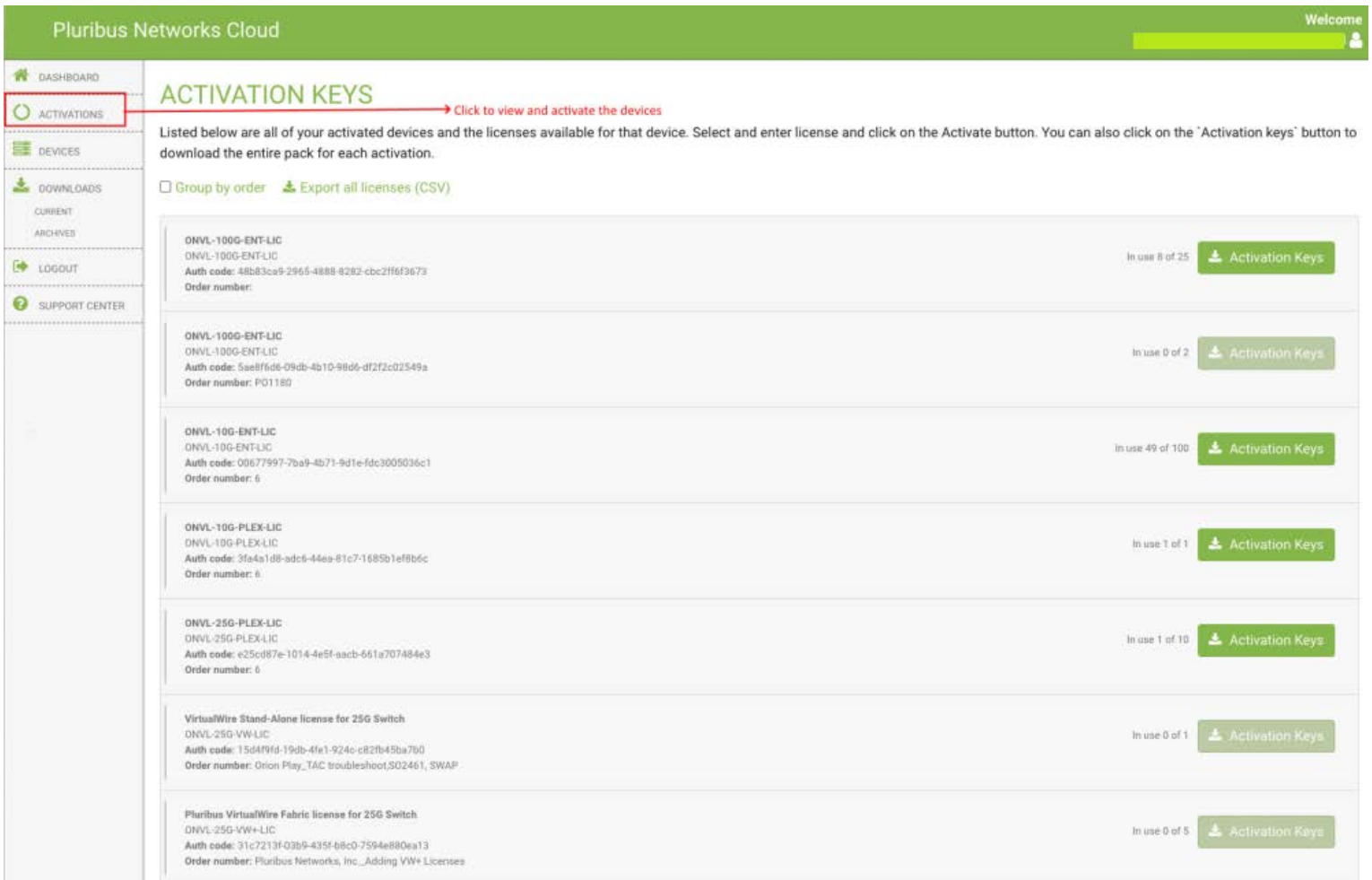


Figure 5 - Pluribus Network Cloud Software Activation Keys

2. Enter the device ID and click the **Activate** button (Figure 6):

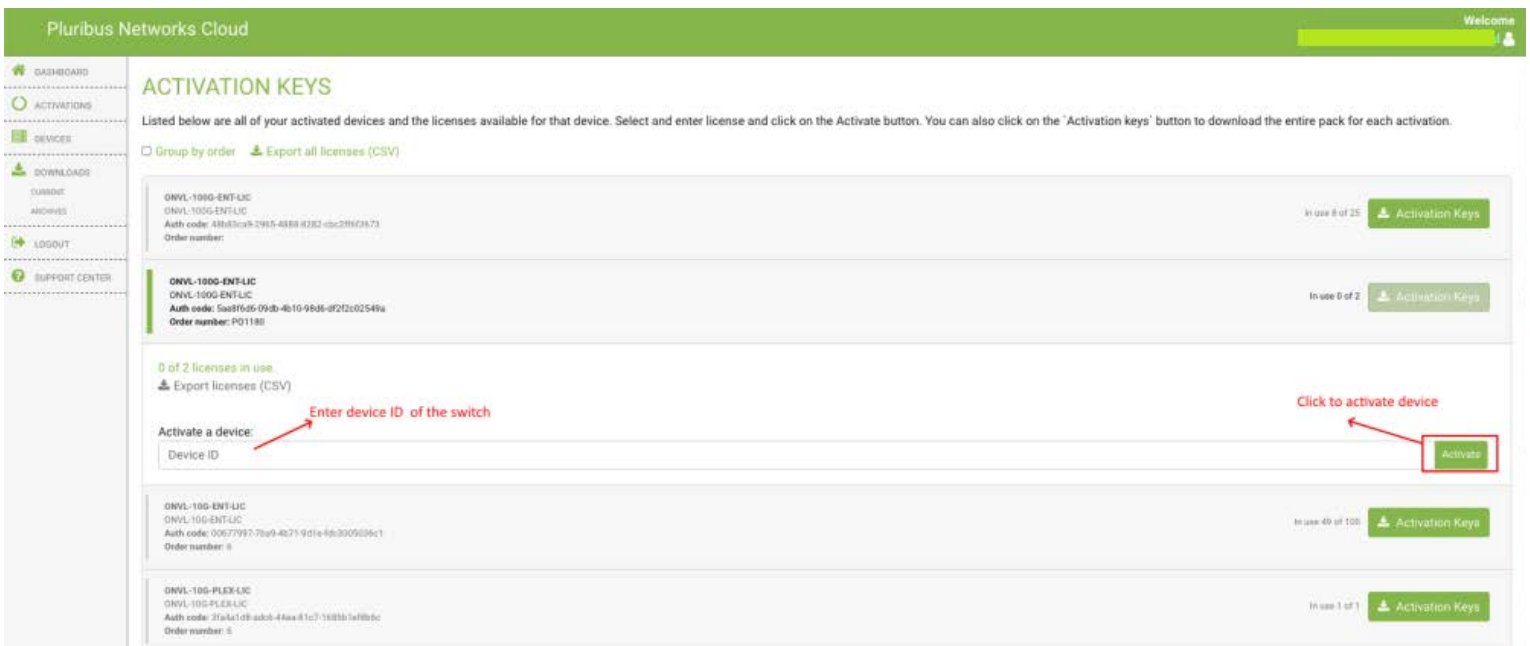


Figure 6 - Pluribus Network Cloud Software Activation Keys - Service Tag or Serial Number

Note: You can activate multiple switches with single *onvl-activation-keys* file if the same license type is used, for example, all switches activated using ONVL-25G-PLEX-LIC can use same *onvl-activation-keys* file downloaded by clicking on ONVL-25G-PLEX-LIC's ACTIVATION KEYS link.

3. Once the switch is activated, download the *Activation Keys* file and copy to the same USB stick root folder where you saved the NetVisor OS ONIE image. To download the activation key(s) for the switch(es) activated using the same license type, click the button as shown in Figure below.

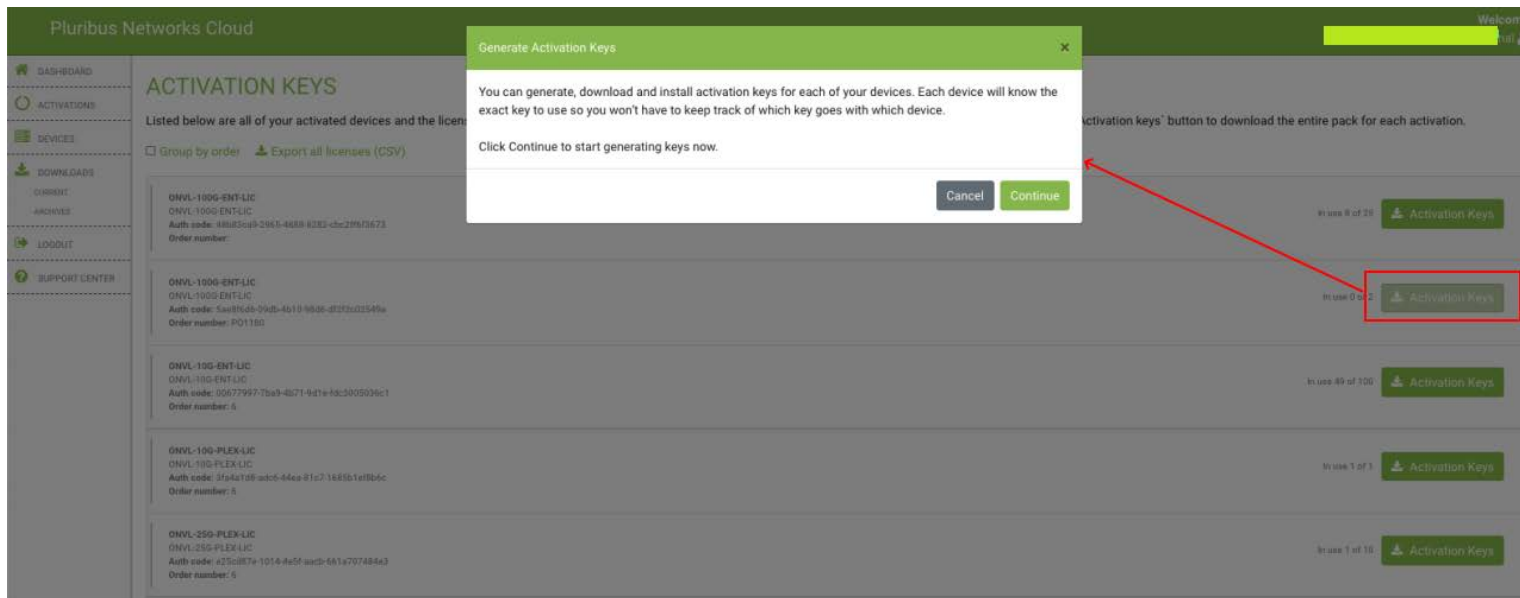


Figure 7 - Pluribus Network Cloud - Downloading Activation Keys

Offline Installation of NetVisor OS ONIE Image and Switch Activation

Before you start the offline installation of NetVisor OS ONIE image, ensure that:

- The switch is not connected to the Internet (if necessary, disconnect the management port).
- There is no previously installed Network OS on the switch.
- You are connected to the switch via serial console. For details on connecting to serial console, see the *Using the Serial Console Port for Initial Configuration* section in the *NetVisor OS Configuration Guide*.

To install the offline image for NetVisor OS ONIE:

1. Rename the NetVisor OS ONIE image and Activation Keys file saved on the USB drive root folder:
 - Rename the file named *onie-installer-<version-number>* to ***onie-installer***
 - Rename the Activation Keys file *onvl-activation-keys.dms* to ***onvl-activation-keys***
2. Initiate the NetVisor OS installation and switch activation process:

Plug in the USB drive (having the two renamed files) into the switch and reboot it. While the switch is booting up, select *ONIE -> Install OS* grub menu if switch does not automatically boot into ONIE Install menu. After booting into Install OS grub menu, the switch automatically detects the software image on the USB drive and starts the installation process.

Note: The switch reboots twice during the installation process and one more time after activation.

The progress of the installation can be monitored using the serial console:

```
[...]
Extracting stagel image
./btrfs.initrtd.img
./grub.cfg
./install.sh
./vmlinuz-4.2.0-27-generic
Provisioning fresh box
Netvisor Installer: platform: aquarius
Creating new Netvisor partition /dev/sda4 ...
Warning: The kernel is still using the old partition table.
The new table will be used at the next reboot.
The operation has completed successfully.
Error: /dev/sda4: unrecognised disk label
mke2fs 1.42.13 (17-May-2015)
Discarding device blocks: done
Creating filesystem with 7750353 4k blocks and 1937712 inodes
Filesystem UUID: 92cbbdd1-ffd8-4f91-ab89-e683b6258395
Superblock backups stored on blocks:
    32768, 98304, 163840, 229376, 294912, 819200, 884736, 1605632, 2654208

Allocating group tables: done
Writing inode tables: done
Creating journal (32768 blocks): done
Writing superblocks and filesystem accounting information: done

sed: /netvisor_mnt/etc/default/grub: No such file or directory
Installing for i386-pc platform.
Installation finished. No error reported.
Netvisor stage-1 installation Successful
Rebooting into stage-1 to complete stage-2 installation
ONIE: NOS install successful: http://sandy.pluribusnetworks.com/artifactory/releases/nvOS/6.0.0 GA/nvOS-6.0.0-6000016331-onvl.pkg
ONIE: Rebooting...
```

After the reboot, the switch comes up with Netvisor-stage1 as shown below:

GNU GRUB version 2.02-beta2+e4a1fe391

```
*Netvisor-stage1
ONIE
```

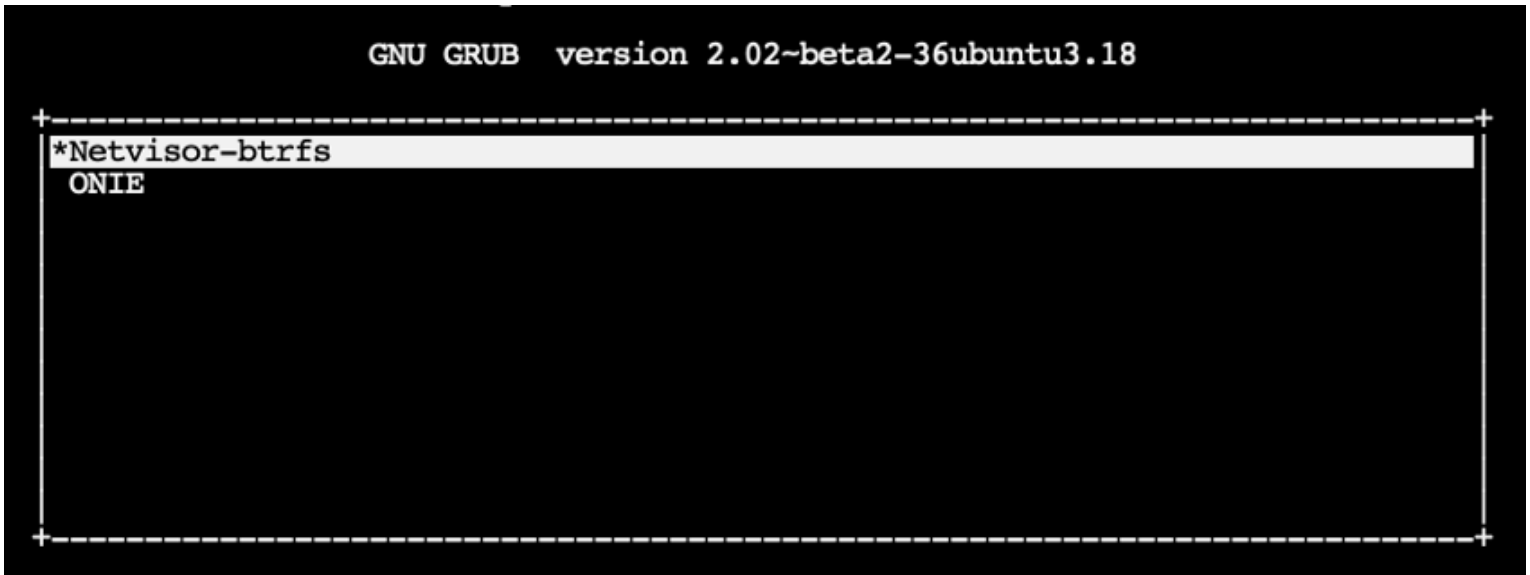
At the completion of stage1, the switch prints the following messages and restarts again:

```
[...]
Setting up getty
Generating GRUB config
/init: line 393: can't create /netvisor-mnt/etc/mtab: nonexistent directory
Setting up netvisor initial config
Installing GRUB
mkdir: can't create directory '/netvisor-mnt/sys': File exists
mkdir: can't create directory '/netvisor-mnt/dev': File exists
mkdir: can't create directory '/netvisor-mnt/proc': File exists
mount: mounting none on /netvisor-mnt/dev/pts failed: No such file or directory
Installing for i386-pc platform.
Installation finished. No error reported.
Current default time zone: 'America/Los_Angeles'
Local time is now:      Sun Apr 19 15:33:23 PDT 2020.
Universal Time is now:  Sun Apr 19 22:33:23 UTC 2020.
Updating initramfs ...
update-initramfs: Generating /boot/initrd.img-4.15.0-36-generic
Resetting the grubenv file
Netvisor installation completed

Rebalancing Btrfs block tree
[ 116.597985] BTRFS info (device sda4): relocating block group 6455033856 flags 5
[ 116.617053] BTRFS info (device sda4): relocating block group 5381292032 flags 5
[ 116.637495] BTRFS info (device sda4): relocating block group 4307550208 flags 5
[ 116.655937] BTRFS info (device sda4): relocating block group 3233808384 flags 5
[ 116.670648] BTRFS info (device sda4): relocating block group 2160066560 flags 5
Done, had to relocate 5 out of 9 chunks
Done, had to relocate 0 out of 4 chunks
umount: can't umount /netvisor-mnt/dev/pts: No such file or directory
mount: mounting UUID=92cbbdd1-ffd8-4f91-ab89-e68[ 117.656681] sd 4:0:0:0: [sda] Synchronizing SCSI cache
3b6258395 on /netvisor_mnt failed: No such file [ 117.669433] reboot: Restarting system
or directory
se[ 117.673993] reboot: machine restart
```

Next, the switch boots up, ready to be activated. NetVisor gets the license key from the USB drive and

activates it at the end of this step:



After NetVisor is installed successfully, the *onvl-activation-keys* file in the USB is auto-detected and the switch is activated.

At the end of the activation process the switch reboots one last time:

The below messages are printed on the console after a successful activation:

```
[..]
AUTO-PROVISION: onvl-discover: onvl-activation-keys found: /dev/sdb1
AUTO-PROVISION: Extracting initial bundle.
AUTO-PROVISION: Decrypting signed bundle.
AUTO-PROVISION: Extracting signed bundle.
AUTO-PROVISION: Verifying package signature.
AUTO-PROVISION: Extracting packages.
AUTO-PROVISION: pkgs ready
AUTO-PROVISION: onvl-installer: checking for device installer -
8WWMX42/onvl-activation-keys...
AUTO-PROVISION: onvl-installer: executing device installer - 8WWMX42/onvlactivation-
keys...
AUTO-PROVISION: [INSTALLED]
Running Acceptance Tests...
test passed comment
Total Memory: OK 7.78G
Switch device: OK orion found
[GREEN] switch successfully initialized.
serial number: 1550ST9100083
hostid: 900011c
device id: 8WWMX42
Reboot required.
```

After NetVisor OS is installed and the switch is activated, wait for a while until the login prompt appears and then log into the serial console using the following credentials:

```
Username: network-admin
Password: admin
```

Now, you are prompted to read and accept the EULA agreement and setup the switch parameters such as switch name, management IP, password, DNS IP etc.

Once these configurations are done, connect the mgmt port of the switch to your mgmt network if you have not connect it previously or disconnected it. Then you can SSH into the switches using the username network-admin and the new password you set.

Upgrading NetVisor OS Software for Freedom Series Switches

The NetVisor Freedom series switch always comes pre-loaded with NetVisor OS software. However it is recommended to upgrade the NetVisor OS software to the latest release, which can be obtained from Pluribus Networks Cloud (PNC).

For a quick introduction on the services offered by Pluribus Networks Cloud (PNC), refer to the following links:

- Getting started: <https://www.pluribusnetworks.com/get-started/>
- PN Cloud Overview video: <https://www.pluribusnetworks.com/resources/pluribus-networks-cloud-overview/>

Warning: If you are upgrading from NetVisor OS version 3.0.4 or earlier to NetVisor OS version 5.x.x, 6.x.x, or 7.x.x, then, you must first upgrade to NetVisor OS version 3.1.1 before upgrading to a later release. The direct upgrade from version 3.0.4 or earlier to version 5.x.x/6.x.x/7.x.x is not supported.

Follow the steps described here to download and upgrade the NetVisor OS software on Freedom series switches:

- 1) Access the latest NetVisor OS software from PNC: click **DOWNLOADS** --> **CURRENT** in the left-hand menu panel (see Figure 9). For upgrade images scroll down to the **OPEN NETVISOR LINUX - UPGRADES** section on the page.
- 2) Click the Download button to download an image (see Figure):

The screenshot shows the Pluribus Networks Cloud interface. On the left is a navigation menu with options: DASHBOARD, DEVELOPER PORTAL, ASSETS, ACTIVATIONS, DOWNLOADS, and LOGOUT. The main content area is titled 'OPEN NETVISOR LINUX - UPGRADES' and contains a table of software versions. The table has columns for Name, Version, Platform, Checksum, and Documentation. The first row is highlighted and has a red box around the 'MD5 Copy' label in the Checksum column. A red arrow points from the text 'MD5 of the image' to this label. Another red arrow points from the text 'Click to download' to the 'Download' button in the Documentation column of the same row. The table contains three rows of data:

| Name | Version | Platform | Checksum | Documentation |
|--|-------------|----------|----------------------------------|--------------------------|
| ONVL 5.1.3 HF2 (Upgrades from 5.0.0 and later) | 5.1.3-15507 | ONVL | MD5 Copy | Download |
| ONVL 5.1.2 GA (Upgrades from 3.1.1/earlier) | 5.1.2-15459 | ONVL | c51915ead29c9186a64caef6cfd445c2 | Download |
| ONVL 5.1.1 GA (Upgrades from 3.1.1/earlier) | 5.1.1-15300 | ONVL | MD5 | Download |

Figure 9 - Pluribus Network Cloud SoftwareUpgrades

- 3) Verify the MD5 checksum of the downloaded file against the MD5 value posted on the cloud (by hovering over the MD5 label, as shown in Figure 9).
- 4) After the image is downloaded, apply the following procedure to upgrade the software on the Freedom series switch:
 - o Enable SFTP from the CLI using the command:

```
(admin@netvisor) > admin-sftp-modify enable
sftp password:
confirm sftp password:
```

Note: The default SFTP username is *sftp* and the password can be changed using the `admin-sftp-modify` command:

- o Enable the shell access for the network-admin user using the command:

```
(admin@netvisor) > role-modify name network-admin shell
```

- o Go to the shell from the CLI by typing the command “`shell`” and going to the “`sftp`” folder:

```
(admin@Spine) > shell
admin@netvisor:~$ cd /sftp/import/
```

- o To exit the shell, type **exit** so that the prompt goes back to the **cli**
- o Copy the file to the `/sftp/import` folder on the switch
- o To upgrade the image, run the command:

```
(admin@Spine) > software-upgrade package <upgrade-image-name>
```

- o Check the status of the upgrade process using the command:

```
(admin@Spine) > software-upgrade-status-show
```

The switch reboots after the upgrade and comes back up with the new image.

- o Verify the license on the switch by using the command:

```
(admin@Spine) > software-license-show
```

Post Installation Configuration

After installation and activation is complete you can proceed to configure the switches for your network.

The [NetVisor Data Center Interconnect Validated Design Guide](#) provides a practical guide to create validated leaf-spine architectures.

The NetVisor OS [Configuration Guide](#) provides an authoritative guide to the many features of NetVisor OS. Basic knowledge of the management CLI is assumed; use the Configuration Guide to review CLI syntax and structure.

The overall procedure to configure NetVisor OS based on the Validated Design Guide is as follows:

- 1) Review the topology and design considerations
 - Redundancy requirements
 - IP and VLAN scheme
- 2) Completing the initial switch setup
 - Setup wizard runs automatically upon first login (default login/password: pluribus/admin)
 - Set the timezone
 - Other management interface parameters may need to be configured
 - Review NTP server information to be used for time sync
- 3) Creating the ONVL Fabric
 - fabric-create command or fabric-join command
 - fabric-show command

For more details on configuring the NetVisor OS features, see the [Configuration Guide](#).

Submitting a Service Request

For NetVisor OS software support, you can purchase optional support contracts from your partner, reseller, or Arista Networks.

Purchasing a support contract from a local partner is sometimes preferred due to geographical or language requirements.

Please contact your local partner to better understand the available service programs and pricing.

If you purchased a NetVisor FreedomCare maintenance agreement, you can contact Arista (Pluribus) Networks directly for support requirements.