

# Adding and Connecting Nodes

By Christian Najera

1. While EVE-NG machine is running, open a web browser and navigate to EVE-NG address on your local network. You should see a login form. The default username is **admin**, and the password should be **eve**. Create a new lab, and you will be directed to the topology workspace. Here you can add the devices we previously uploaded to the topology. This is where creative and engineering meet, the user is free to design, implement, and test their network and systems.
2. Click on add a node on the top left side and choose a device previously loaded. A node configuration popup will appear, and the values need to be changed based on the device type you are trying to add. See example on next page:

# EDIT NODE

Template  
Cisco vIOS Switch

ID  
2

Image  
viosl2-adventerprisek9-m.ssa.high\_iron\_20200929

Name/prefix  
Switch-2

Icon  
Switch-2D-L3-Generic-5.svg

UUID  
c45b0d8e-e7df-45a1-b3c0-9db6500246e3

CPU Limit

2 CPU RAM (MB)  
1 1024

Ethernets  
8

3 QEMU Version QEMU Arch QEMU Nic  
2.4.0 x86\_64 tpl(e1000)

4 QEMU custom options  
-machine type=pc,accel=kvm -serial mon:stdio -nographic -no-user-config -nodefaults

Startup configuration  
None

Delay (s)  
0

Console  
telnet

Left  
294

Top  
417

**Save** **Cancel**

There are four fields of focus.

1. Our node name, which we can change as we see fit.
2. The hardware specification, which might need to change depending on the node being configured.
3. The QEMU version, which may need to change depending on the node being configured.
4. QEMU custom options, which typically stays default, however, can be changed based on lab objectives.

Everything else typically stays as is. For the sake of this lab, we will configure nodes for windows server 2022, windows 10 pro, our cisco switches, our cisco routers, and our ASA V firewalls.

#### **FOR WINDOWS SERVER NODES:**

- Add node on top left, select windows server. Name it as you like. Dedicate it at least 4 vCPU. 8192MB of RAM, and set it to launch with QEMU version 5.2.0. No custom options are necessary at this time.

#### **FOR WINDOWS 10 PC NODES:**

- Add node on top left, select windows pro/windows pc. Name it as you like. Dedicate at least 2 vCPU, 8192 RAM, and set it to launch with QEMU 5.2.0. No custom options are necessary at this time.

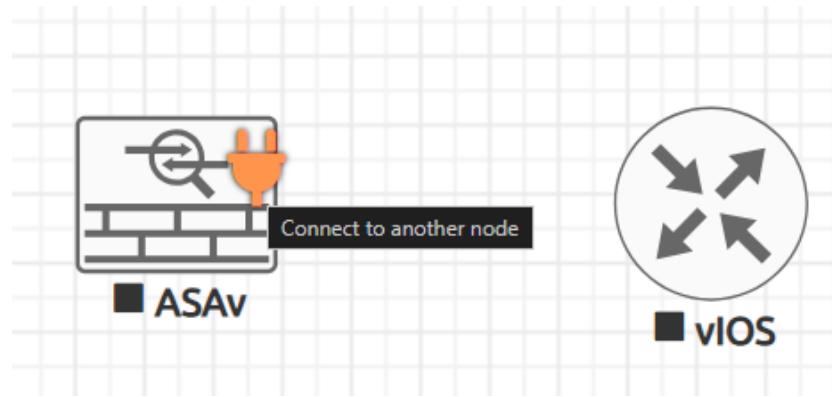
#### **FOR CISCO SWITCH OR ROUTER NODE:**

- Add node on top left, select Cisco vIOS switch or router. Name it as you like. Dedicate at least 1 vCPU, 1024 RAM, and default QEMU version. No custom options are necessary at this time.

#### **FOR ASA V Firewall:**

- Add node on top left, select Cisco ASA V. Name it as you like, dedicate it at least 1 vCPU, 2048 RAM, and default QEMU version. No custom options are necessary at this time.

3. To make connections, nodes must be turned off. Simply hover your pointer over a node to reveal an orange pronged plug image. Click and drag it over the node you want to make the connection to. Choose the starting and ending interface and you're done making the "physical" connection.



## ADD CONNECTION BETWEEN ASAv AND vIOS

ASAv

Source ID: 11  
Source Name: ASAv  
type - Node

Choose Interface for ASAv

Gi0/0

vIOS

Choose Interface for vIOS

Gi0/0

Destination ID: 16  
Destination Name: vIOS  
type - Node

Save Cancel