

LAPORAN
ADMINISTRASI DAN DESAIN JARINGAN



Dosen:

Baihaqi Siregar S.Si., MT.

Disusun Oleh:

Putri Laura Latersia Br L Tobing

(191402042)

Universitas Sumatera Utara

Fakultas Ilmu Komputer dan Teknologi Informasi

Teknologi Informasi

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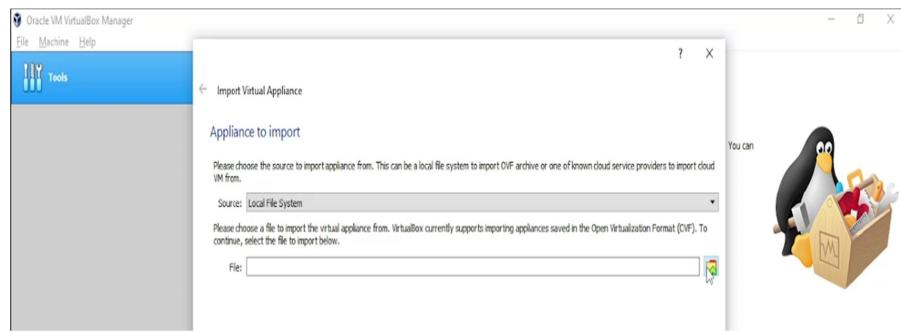
INSTALASASI

Buka link <https://github.com/GNS3/gns3-gui/release/> Kemudian download sesuai dengan yang ditandai.

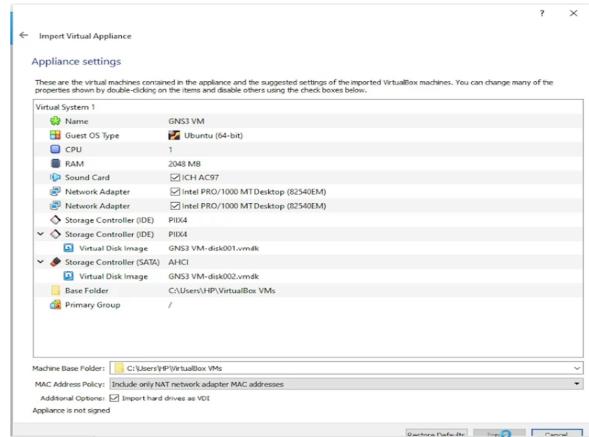
The screenshot shows a list of 18 assets. The two highlighted files are:

- GNS3.VM.VirtualBox.2.2.26.zip
- GNS3.VM.VMware.Workstation.2.2.26.zip

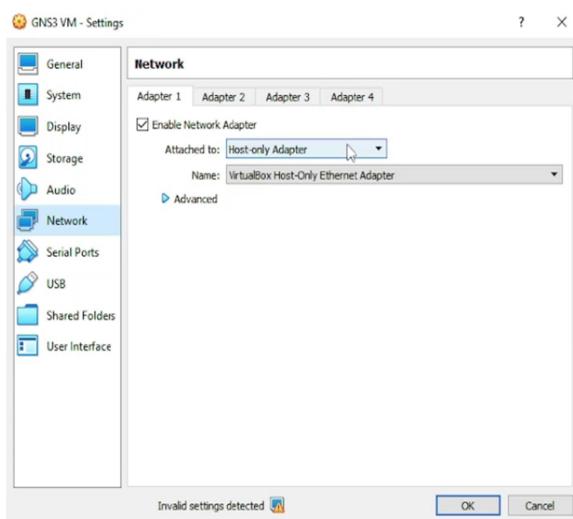
Extract file yang telah di download lalu input ke Oracle VM Vitual Box.



Import GNS3 dan tunggu hingga proses selesai.

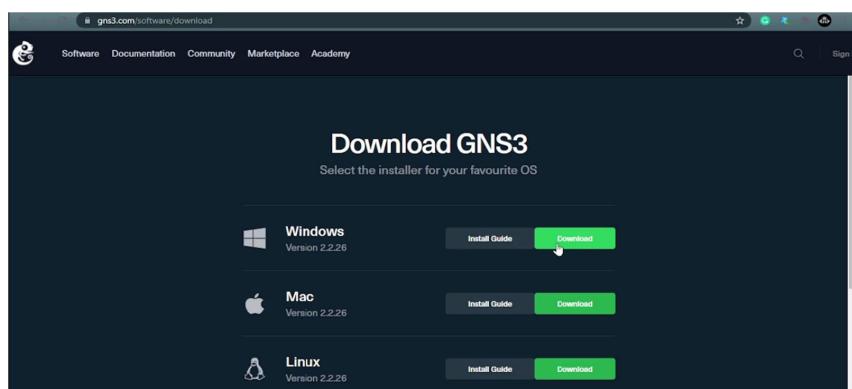


Lalu klik “Settings” Kemudian “Network” Ubah Adapter Attached To “Host only Adapter”

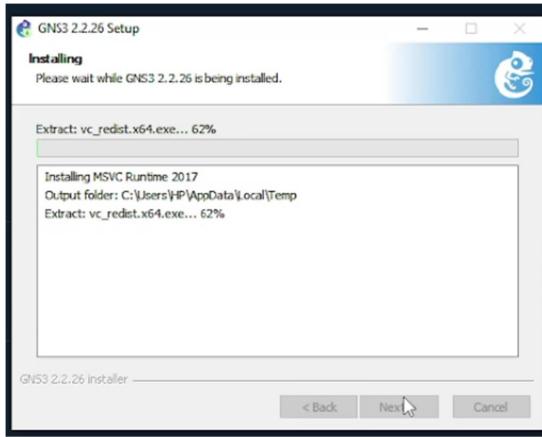


Download aplikasi GNS3 for window melalui link

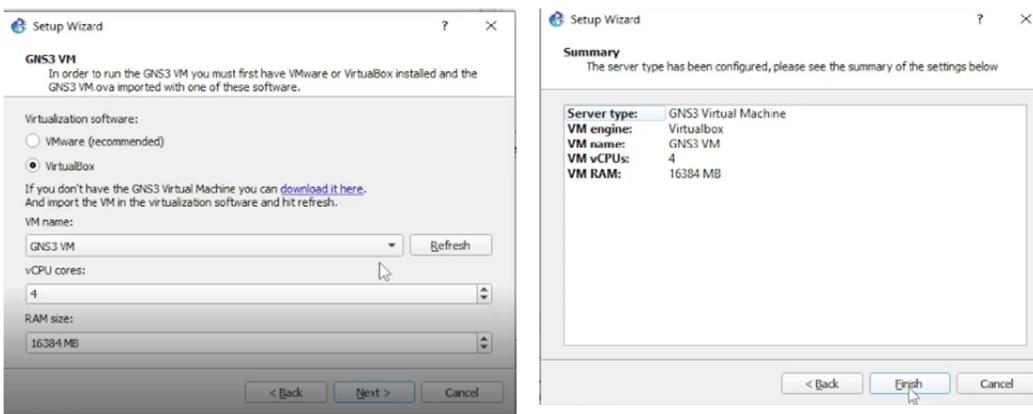
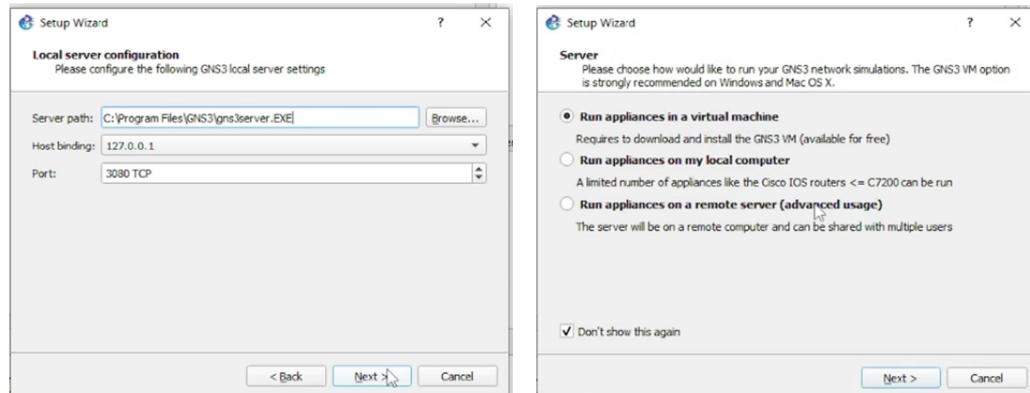
<https://www.gns3.com/software/download>

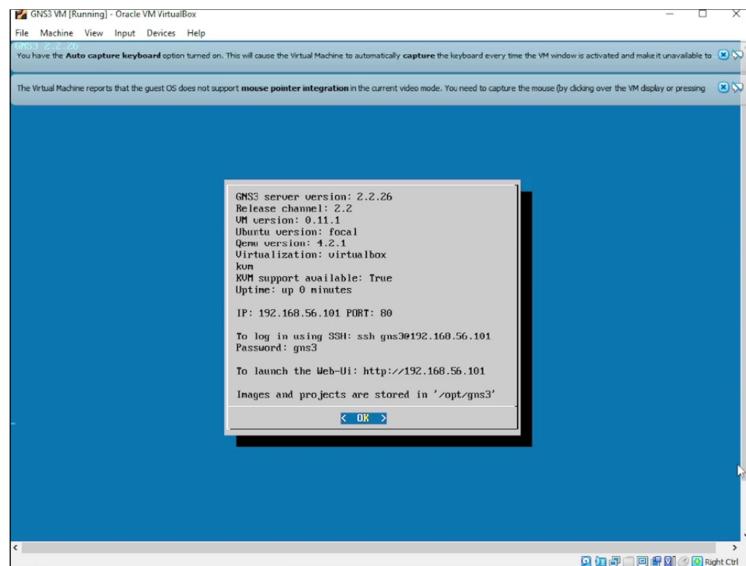


Install dan tunggu hingga selesai

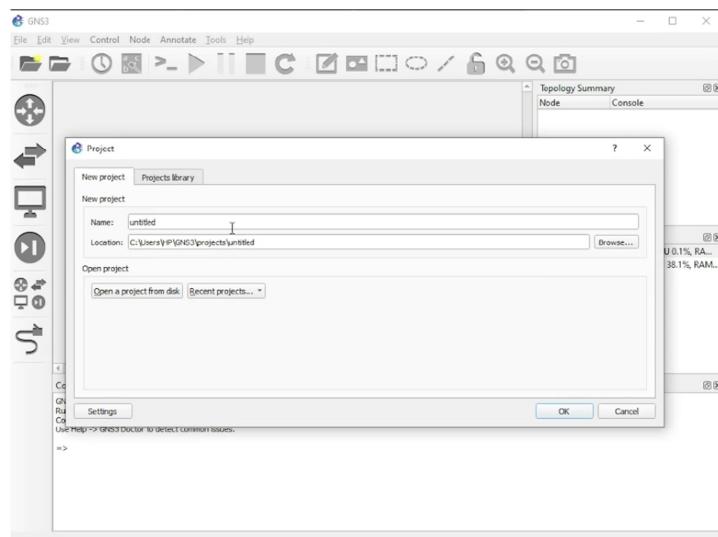


Setup Wizard, ubah setting sesuai dengan gambar

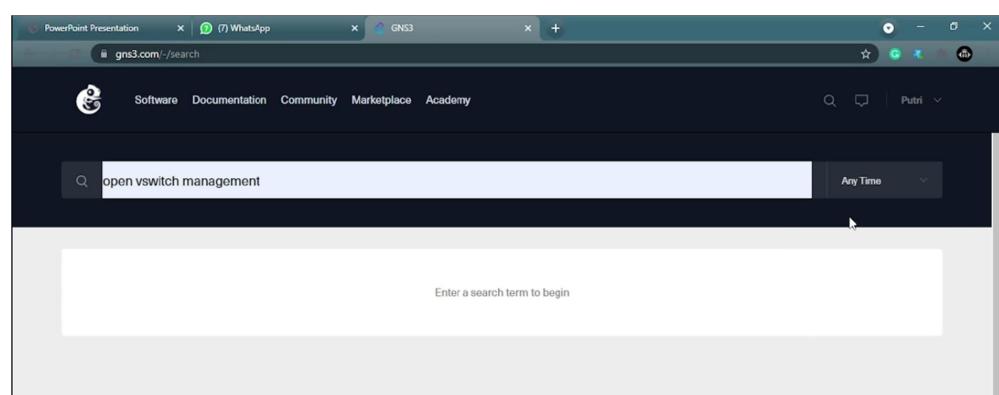




Buat project baru



Buka Link <https://www.gns3.com/marketplace/featured>



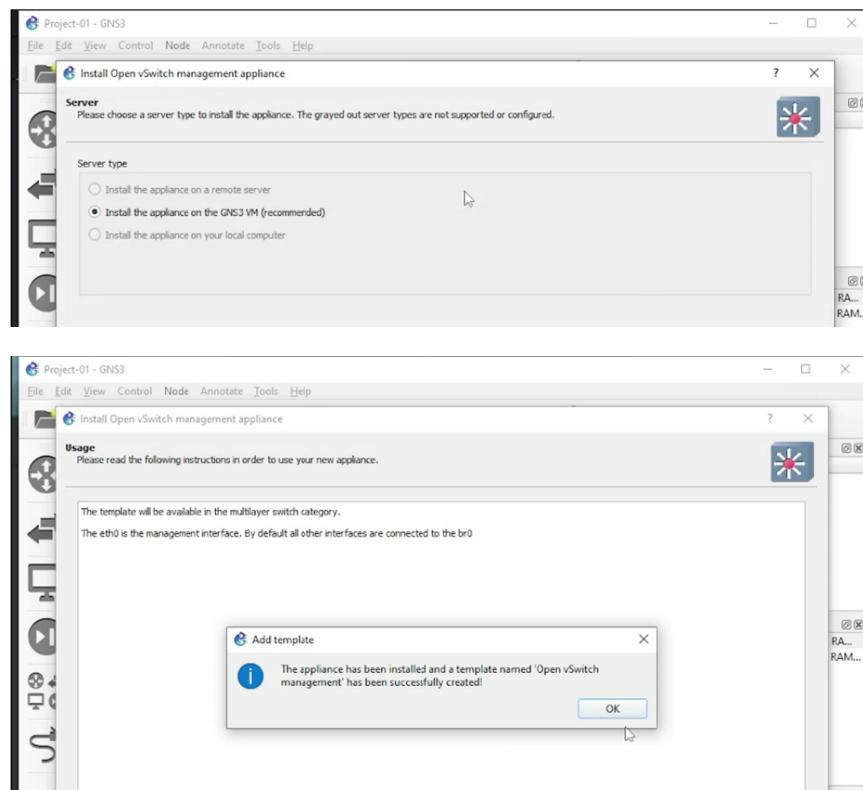
Download Open vSwitch Management

The screenshot shows a web browser displaying the GNS3 Marketplace. A specific appliance, "Open vSwitch with management interface", is highlighted. It features a teal icon with a white 3D cube. Below the icon, the title "Open vSwitch with management interface" is displayed, followed by the subtitle "Open vSwitch". A small note indicates it was posted by Julien Duponchelle on December 9, 2016. A prominent green "Download" button is centered at the bottom of the listing.

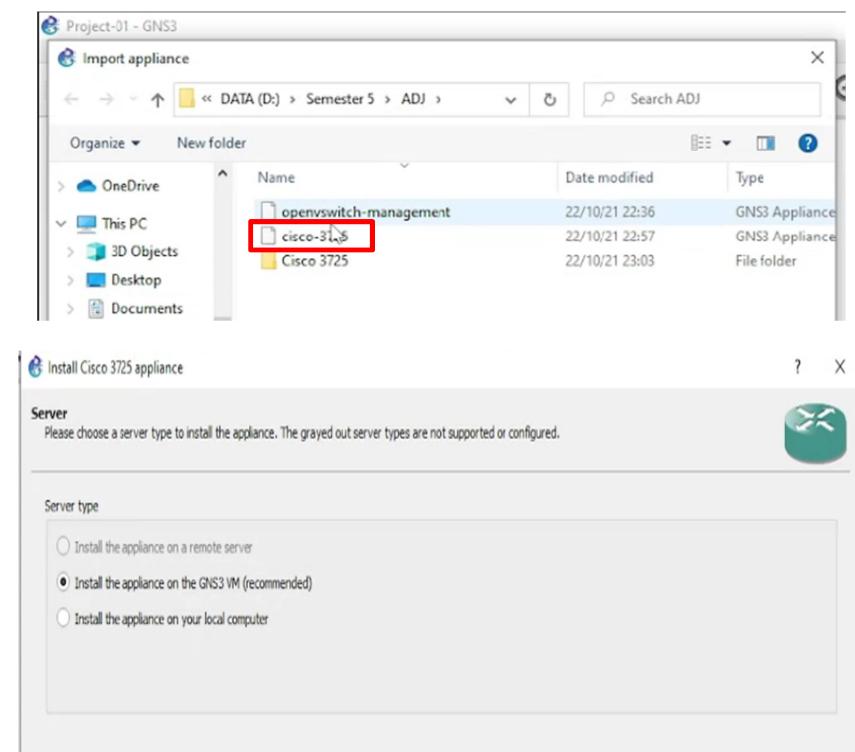
Import Appliance dengan langkah-langkah sebagai berikut

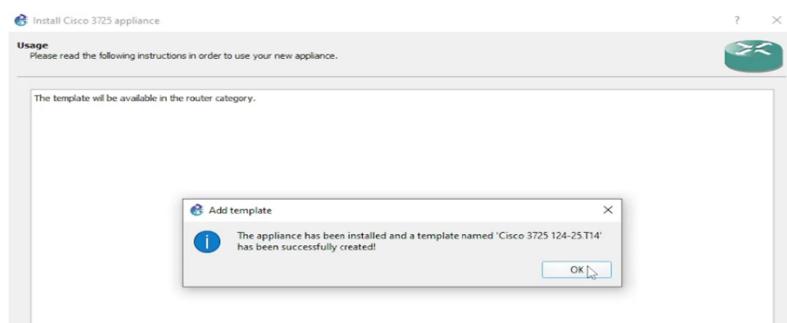
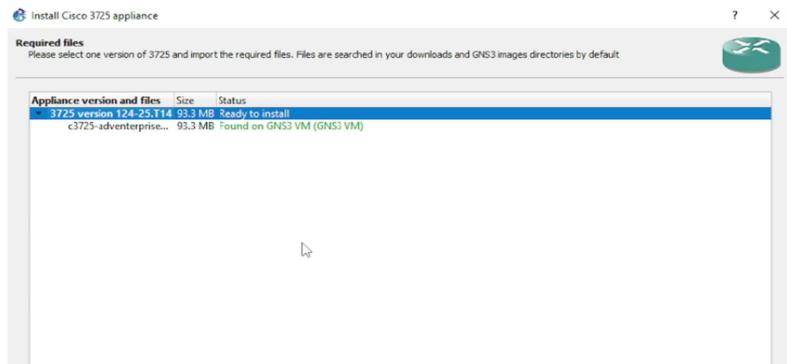
The image consists of three vertically stacked screenshots of the GNS3 application interface:

- Screenshot 1:** Shows the "File" menu open with the "Import appliance" option selected. The main workspace shows a "Topology Summary" and a "Servers Summary" panel indicating two active VMs: "GNS3 VM" and "LAPTOP-01LCKUVQ".
- Screenshot 2:** Shows the "New template" dialog box. The "Import an appliance file (.gns3ap extension)" radio button is selected. The right side of the dialog displays memory configuration options: RAM 1024 MB, RAM 2048 MB, and RAM 4096 MB.
- Screenshot 3:** Shows the "Import appliance" file selection dialog. The "Downloads" folder is selected, and a list of files is shown. The file "openvswitch-management.gns3ap" is highlighted with a red box, indicating it is the selected file for import.



Kemudian import appliance untuk “Cisco”





Langkah Instalisasi GNS3 Selesai. Lakukan pengecekan.

Dynamips OS router template configuration

Cisco 3725 124-25.T14

- General
- Memories and disks
- Slots**
- Advanced
- Usage

Adapters

- slot 0: GT96100-PE
- slot 1:
- slot 2:
- slot 3:
- slot 4:
- slot 5:
- slot 6:

WICs

- wic 0:
- wic 1:
- wic 2:

GNS3 VM preferences

- Enable the GNS3 VM
- Virtualization engine: VirtualBox
- VM name: GNS3 VM
- Port: 80
- vCPUs: 4
- RAM: 16384 MB
- Action when closing GNS3:
 - Keep the GNS3 VM running
 - Suspend the GNS3 VM
 - Stop the GNS3 VM

GNS3 Doctor

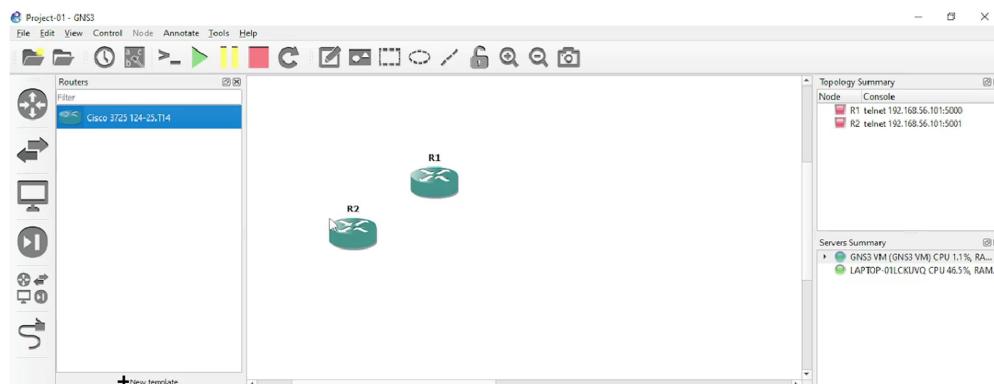
This will list potential problems in your GNS3 installation:

Starting checks...

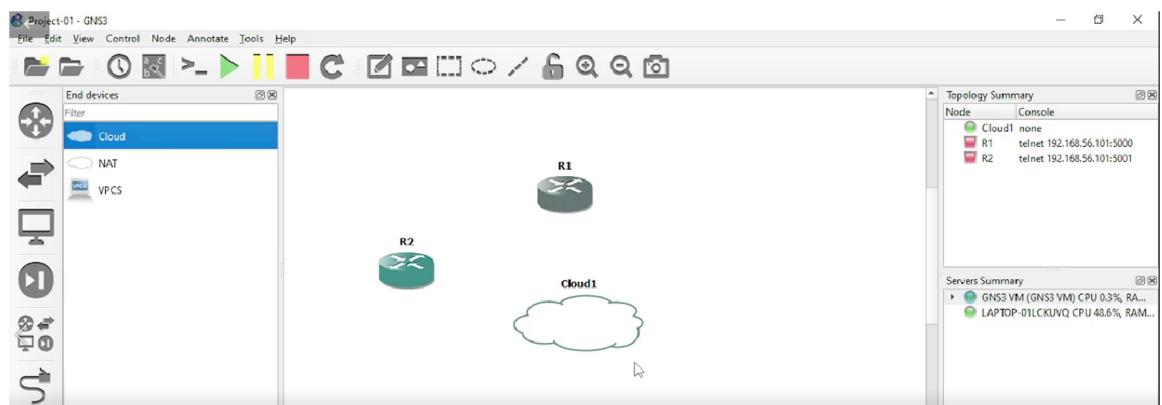
- Check if processor is 64 bit... **OK**
- Checking if AVG software is not installed... **OK**
- Checking for stable GNS3 version... **OK**
- Check if dynamips has the correct permission... **OK**
- Checking if experimental features are not enabled... **OK**
- Checking for amount of free virtual memory... **OK**
- Check if gns3 is not installed twice... **OK**
- Checking if the local server is enabled... **OK**
- Check if the RPF service is running (required to use Ethernet NIOs)... **OK**
- Check if ubridge has the correct permission... **OK**
- Checking if vmrun is installed... **OK**

WARNING The `vmrun` executable could not be found, VMware VMs cannot be used.

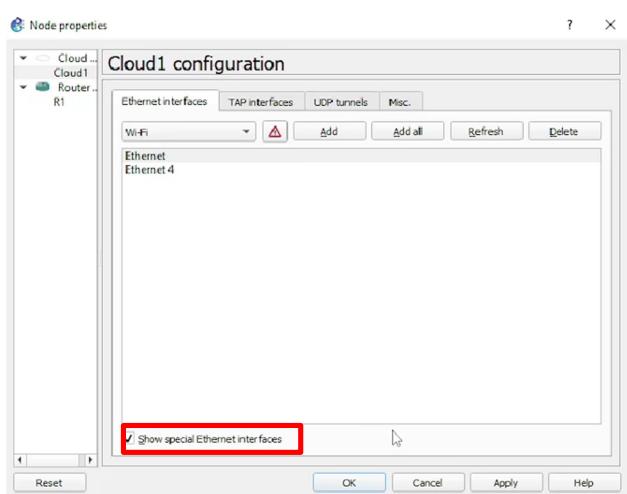
Membuat 2 Router (R1 dan R2) dengan cara drag and drop Router



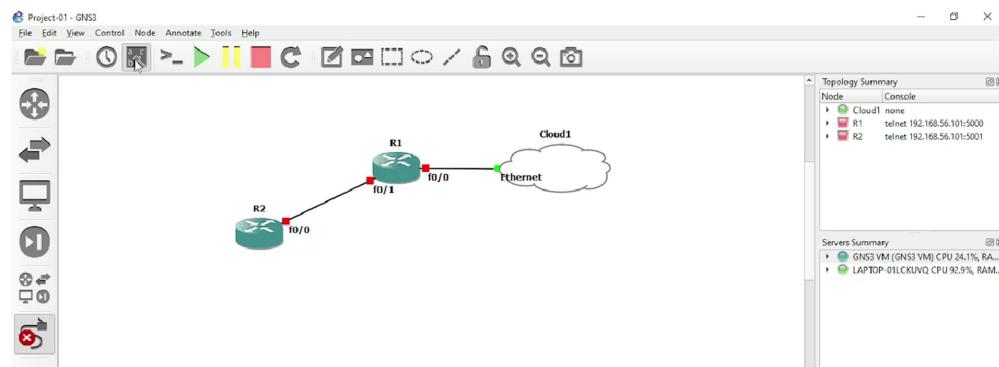
Klik bagian “End Devices” kemudia drag and drop Cloud dengan menggunakan server local computer



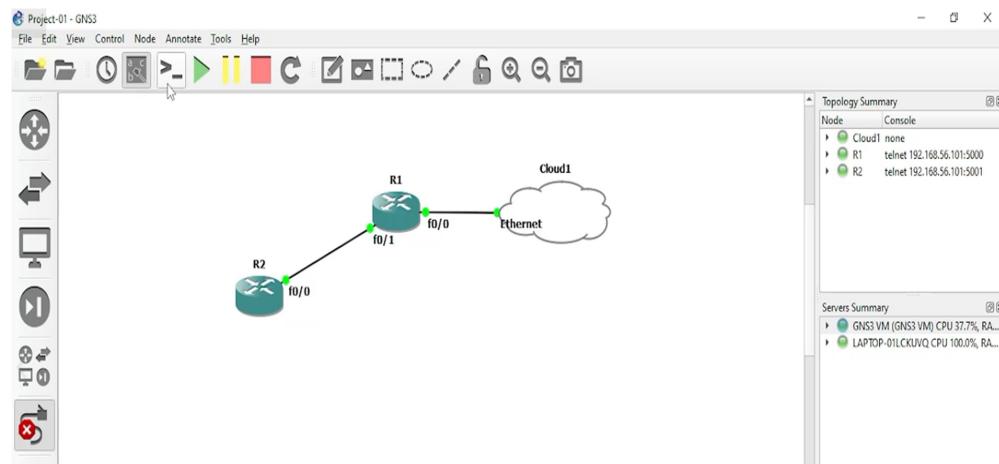
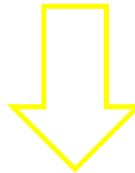
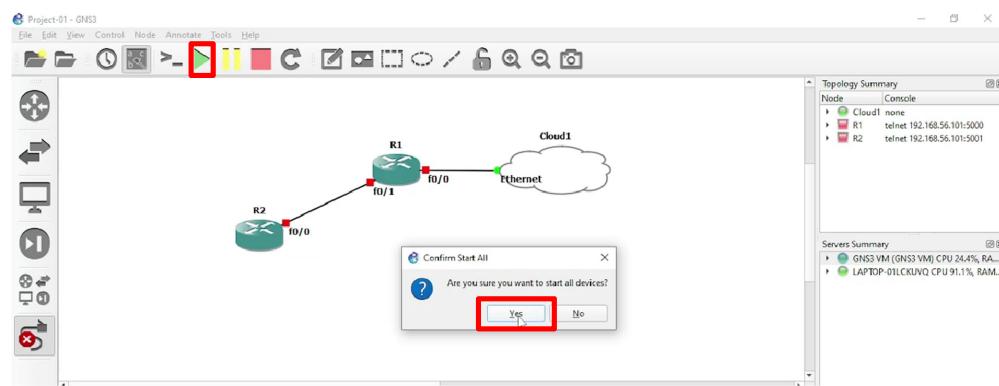
Lalu klik kanan pada cloud dan configure



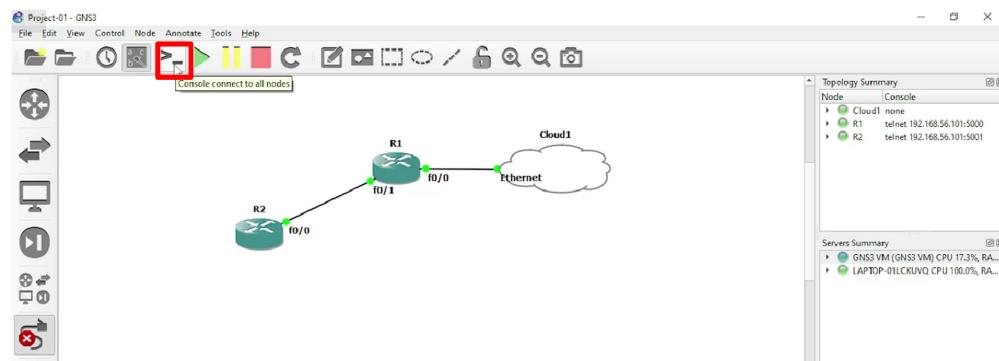
Add link untuk menghubungkan Router dan Cloud. R1 dihubungkan dengan Cloud dan R2 dihubungkan dengan R1



Klik Tombol Start untuk menjalankan semua device



Kemudian klik tombol console dibagian atas



Lakukan Configure

```
Mar 1 00:00:10.231: %LINK-5-CHANGED: Interface FastEthernet0/1, changed state to administratively down
Mar 1 00:00:10.235: %LINK-5-CHANGED: Interface FastEthernet0/0, changed state to administratively down
Mar 1 00:00:10.655: %SYS-5-RESTART: System restarted --
Cisco IOS Software, 3700 Software (C3725-ADVENTERPRISEK9-M), Version 12.4(15)T14
, RELEASE SOFTWARE (fc2)
Technical Support: http://www.cisco.com/techsupport
Copyright (c) 1986-2010 by Cisco Systems, Inc.
Compiled Tue Aug 17 12:08 by prod_rel_team
Mar 1 00:00:10.679: %SNMP-5-COLDSTART: SNMP agent on host R1 is undergoing a cold start
Mar 1 00:00:10.767: %CRYPTO-6-ISAKMP_ON_OFF: ISAKMP is OFF
Mar 1 00:00:10.767: %CRYPTO-6-GDOI_ON_OFF: GDOI is OFF
Mar 1 00:00:11.295: %LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/1, changed state to down
Mar 1 00:00:11.299: %LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to down
R1# configure terminal
Enter configuration commands, one per line. End with CNTL/Z.
R1(config)# interface FastEthernet0/0
R1(config-if)# ip address 192.168.1.123 255.255.255.0
R1(config-if)# no shutdown
R1(config-if)# e
Mar 1 00:02:18.547: %LINK-3-UPDOWN: Interface FastEthernet0/0, changed state to up
Mar 1 00:02:19.547: %LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
R1(config-if)# ex
R1(config)# ip route 0.0.0.0 0.0.0.0 192.168.1.249
R1(config)# end
R1#
Mar 1 00:03:04.879: %SYS-5-CONFIG_I: Configured from console by console
R1# ping 192.168.1.249
Type escape sequence to abort.
sending 5, 100-byte ICMP Echos to 192.168.1.249, timeout is 2 seconds:
.....
success rate is 0 percent (0/5)
R1#
```

The configuration terminal for router R1 is shown. The command 'ip address 192.168.1.123 255.255.255.0' is highlighted with a red box. The Solar-PuTTY logo and copyright information are visible at the bottom.