

## Deployment of New VM (Installation procedure)

### Configuration:

#### Example:

Name of the VM: ravi\_controller\_vm

CPU : 8

RAM: 16GB

Storage: 50GB

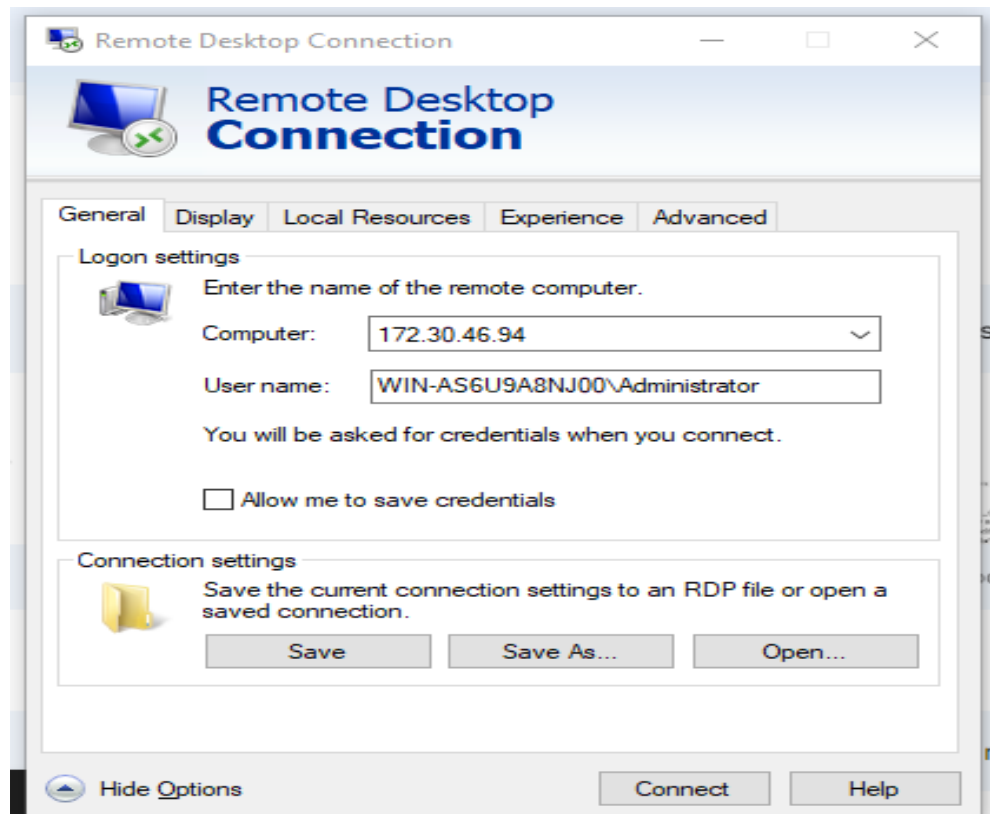
Additional Hard disk1: 50GB

Additional Hard disk2: 50GB

Additional Hard disk3: 50GB

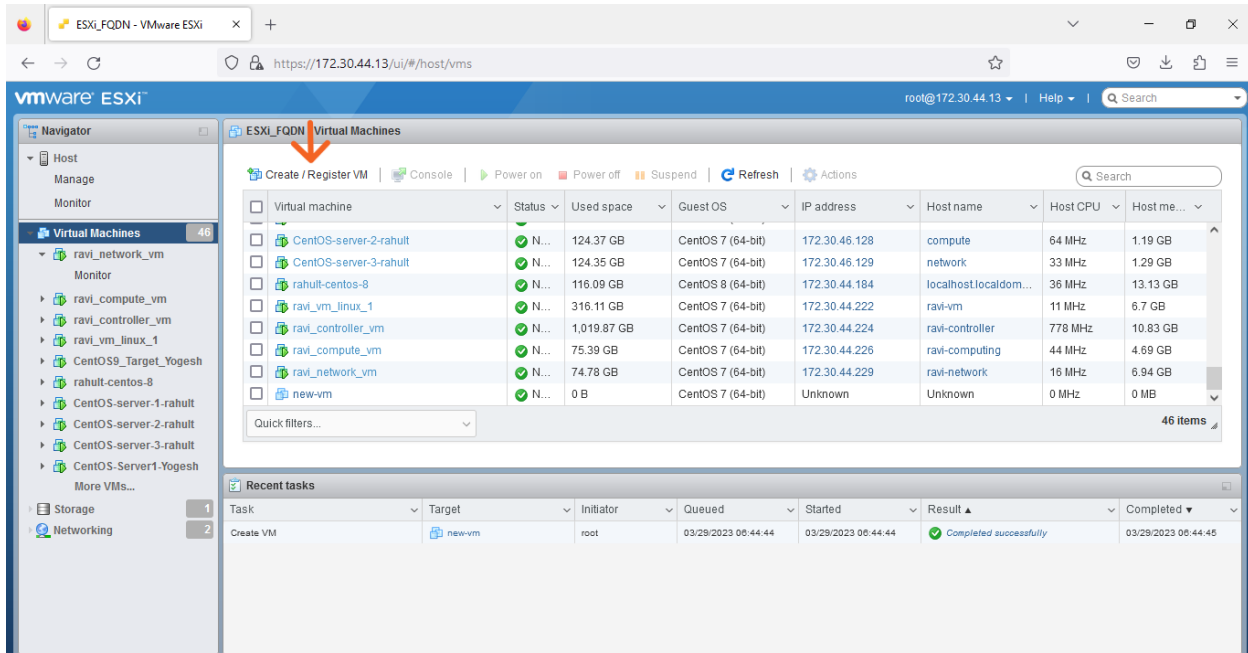
Step1: Open Remote Desktop Connection Application.

*Note: Remote Desktop is a technology that allows the user on the computer to connect to a remote computer or the terminal server in a different location.*

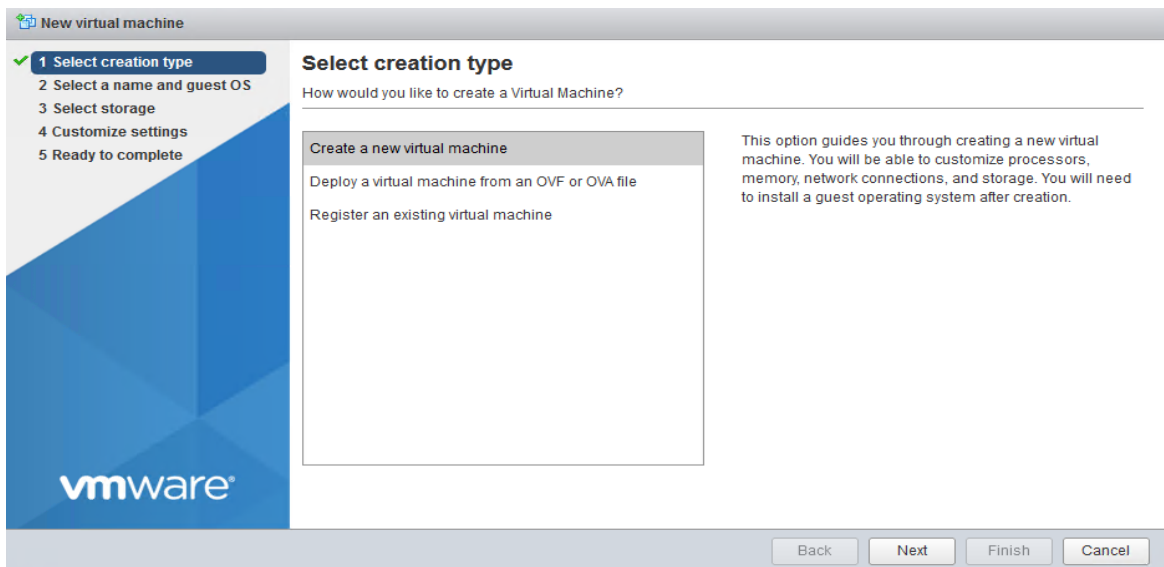




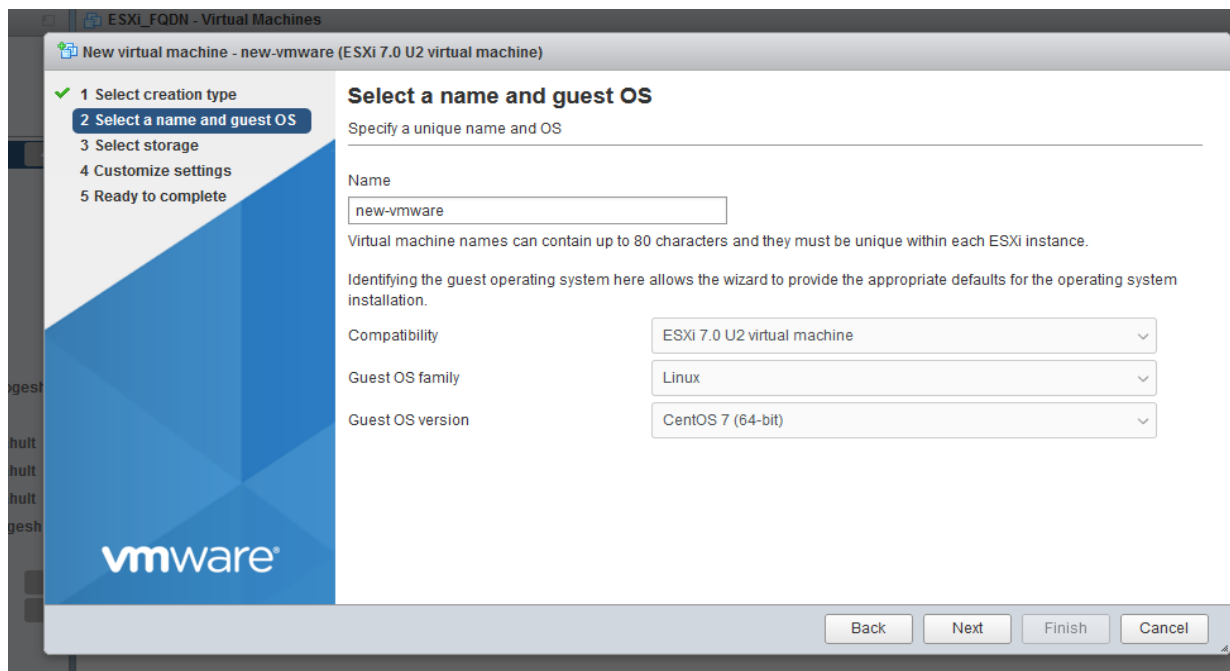
Step3: To create a new VM , Click on “**Create/ Register VM**” .



Step4: Select creation type: Select “**Create a new virtual machine**”. Press “Next”.



Step5: Mention the name of the VM that we want to create . Select the Guest OS family and Guest OS version. I chose Linux and CentOS 7(64 bit) respectively. Press “Next” to move forward.



New virtual machine - new-vmware (ESXi 7.0 U2 virtual machine)

1 Select creation type  
 2 Select a name and guest OS  
 3 Select storage  
 4 Customize settings  
 5 Ready to complete

### Select a name and guest OS

Specify a unique name and OS

Name

Virtual machine names can contain up to 80 characters and they must be unique within each ESXi instance.

Identifying the guest operating system here allows the wizard to provide the appropriate defaults for the operating system installation.

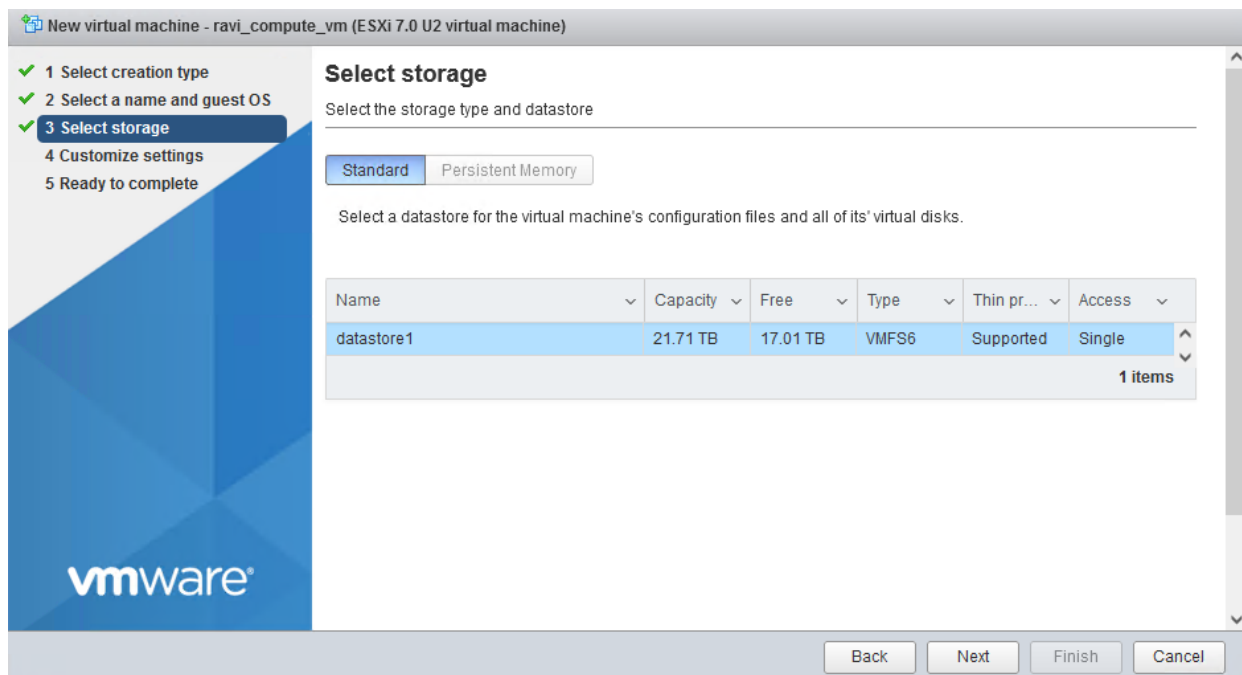
Compatibility

Guest OS family

Guest OS version

Back Next Finish Cancel

Step6: Select storage: Now we can see the available disk space in the virtual disk as shown in the below picture.



New virtual machine - ravi\_compute\_vm (ESXi 7.0 U2 virtual machine)

1 Select creation type  
 2 Select a name and guest OS  
 3 Select storage  
 4 Customize settings  
 5 Ready to complete

### Select storage

Select the storage type and datastore

Standard Persistent Memory

Select a datastore for the virtual machine's configuration files and all of its' virtual disks.

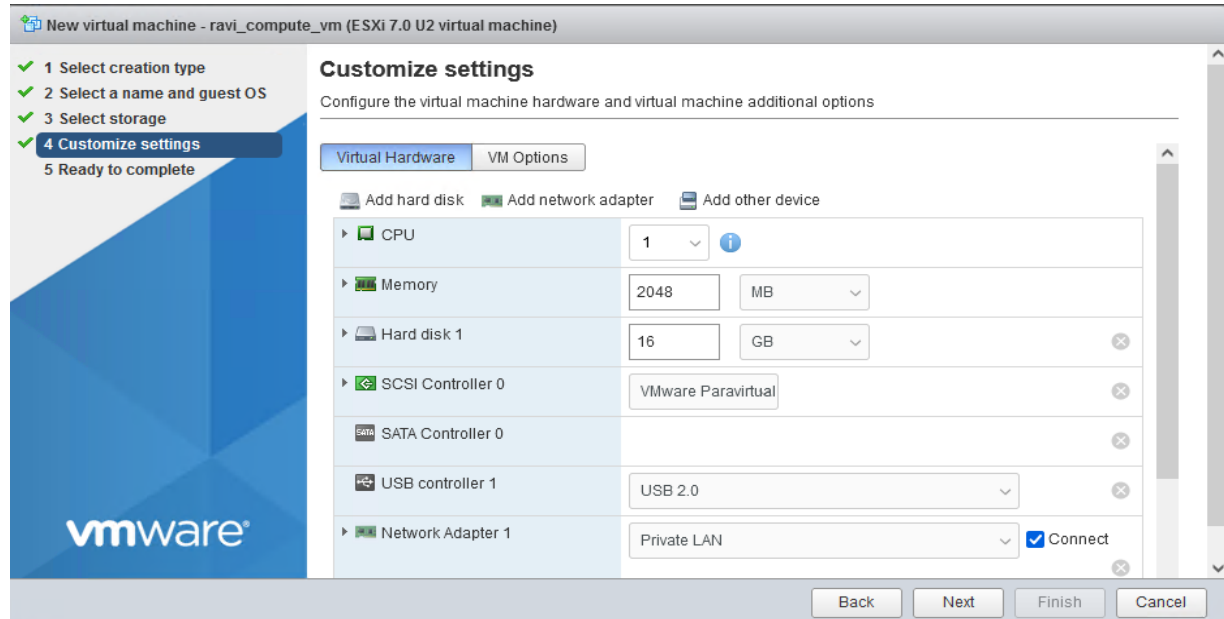
Name	Capacity	Free	Type	Thin pr...	Access
datastore1	21.71 TB	17.01 TB	VMFS6	Supported	Single

1 items

Back Next Finish Cancel

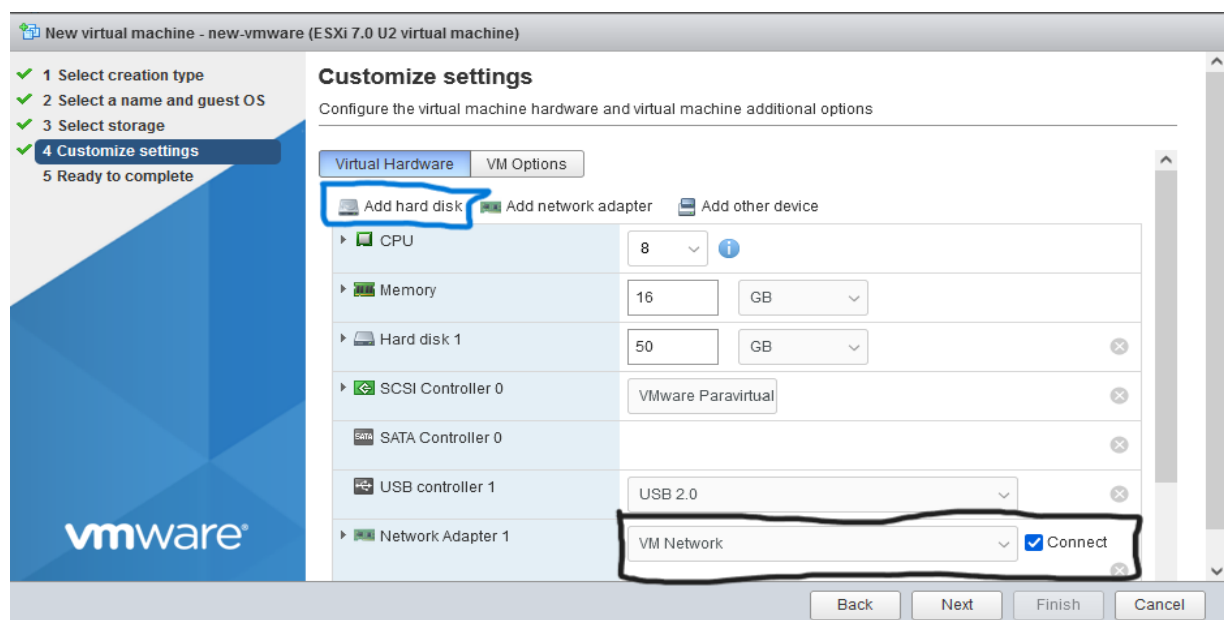
Press “Next”.

Step7: Customize Settings : The specifications of the virtual machine that we are creating can be given in this section. Specify CPU, RAM and storage.

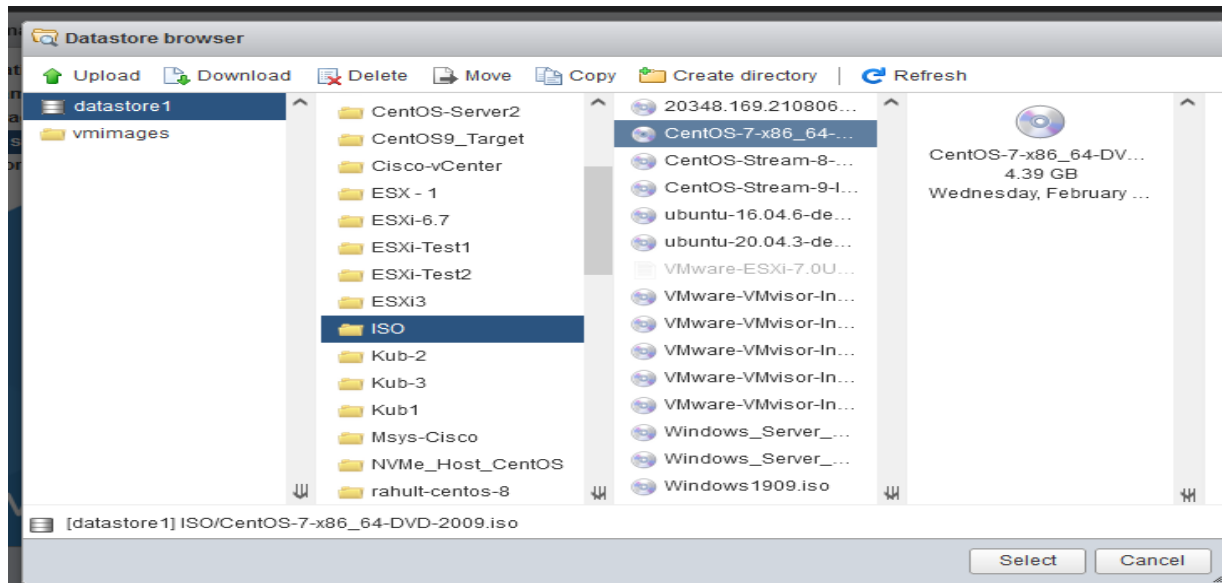


To add a new additional hard disk along with the main storage, click on Add Hard Disk, select “**New standard hard disk**” from the menu and indicate the capacity as shown in the image below.

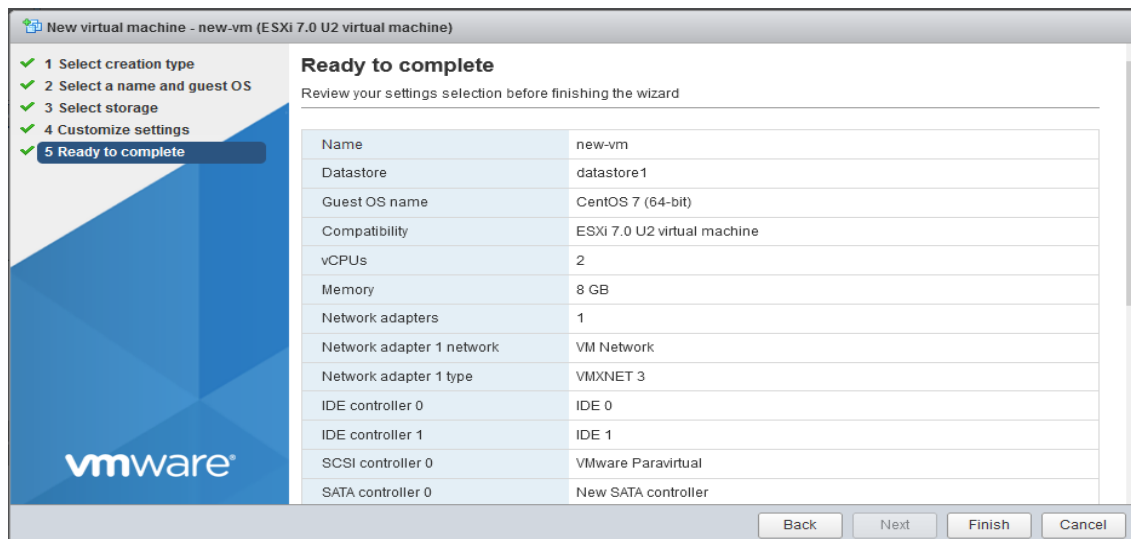
Now, change the Network Adapter 1 from Private LAN to VM Network and CD/DVD Drive 1 to ISO file.



Then upload the ISO file by clicking on the “**browse**” button(Select the file as shown in the below figure).Press “Next”.

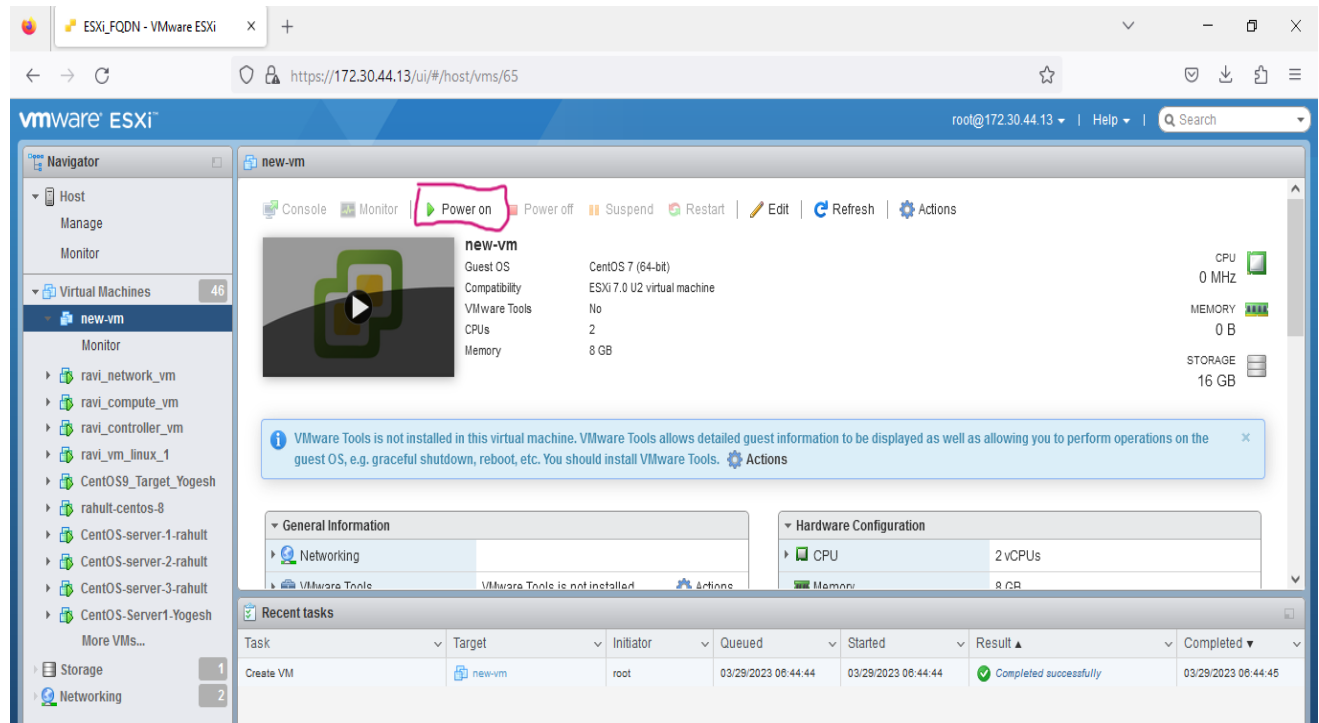


step8:Review your settings: Verify the specifications mentioned till now and proceed for the further steps.

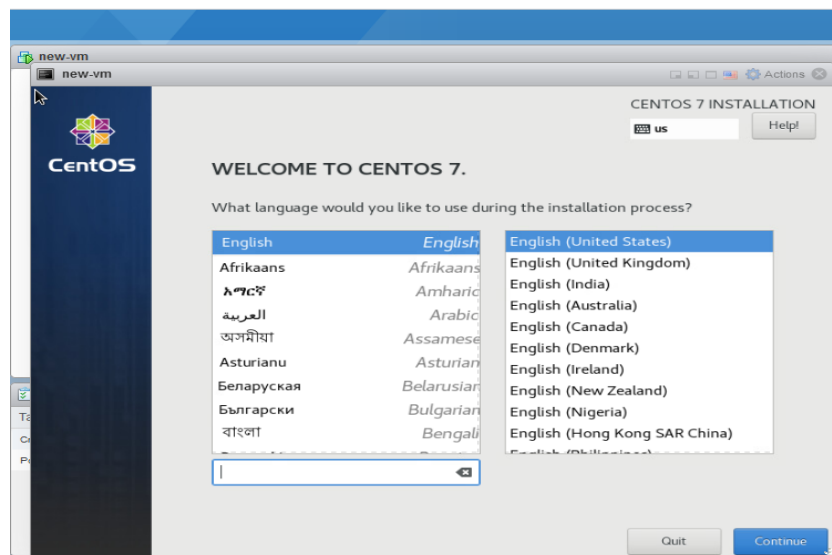


After verification, click the finish button.

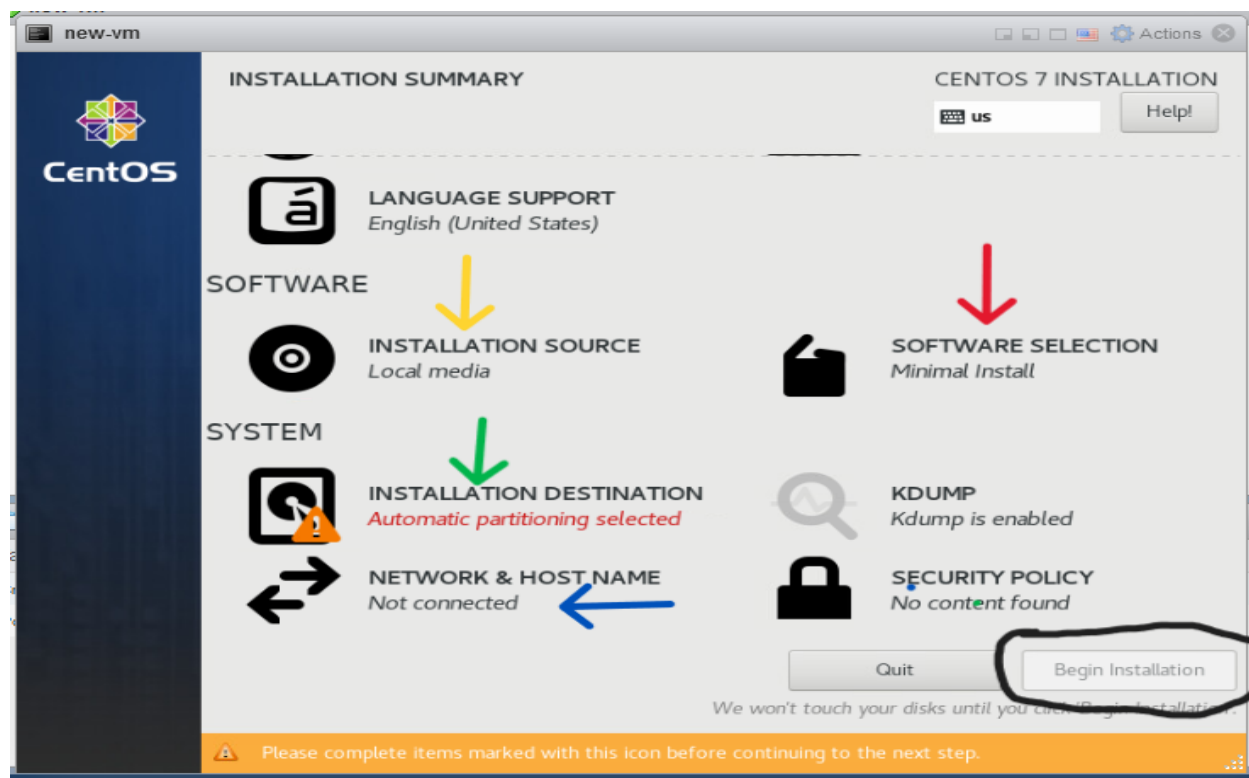
Step 9: A new virtual machine is created now. Press the “Power on” button as shown in the below image to start the VM.



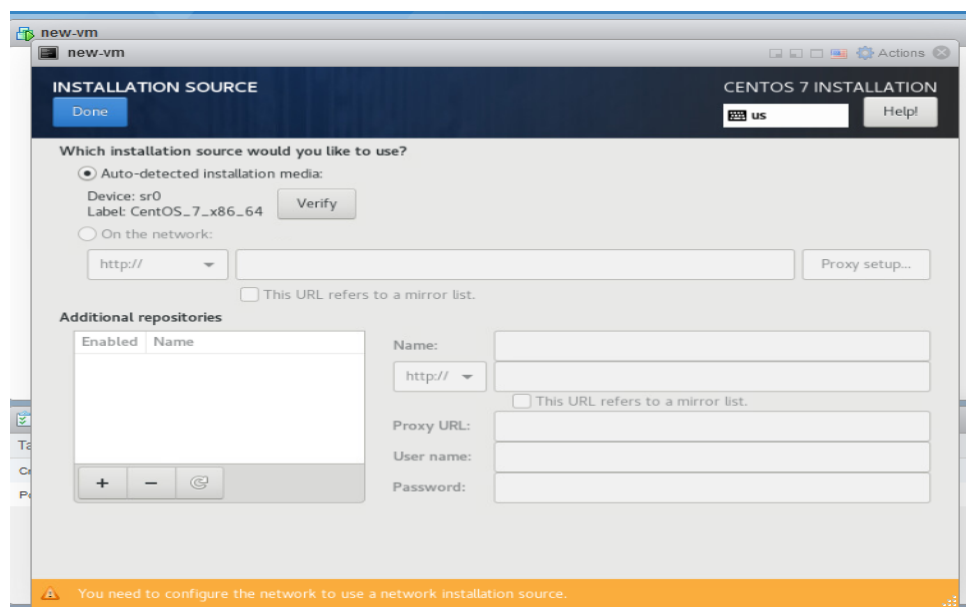
Now, select the language to use during the installation process and continue.



Step 10: Installation Summary:

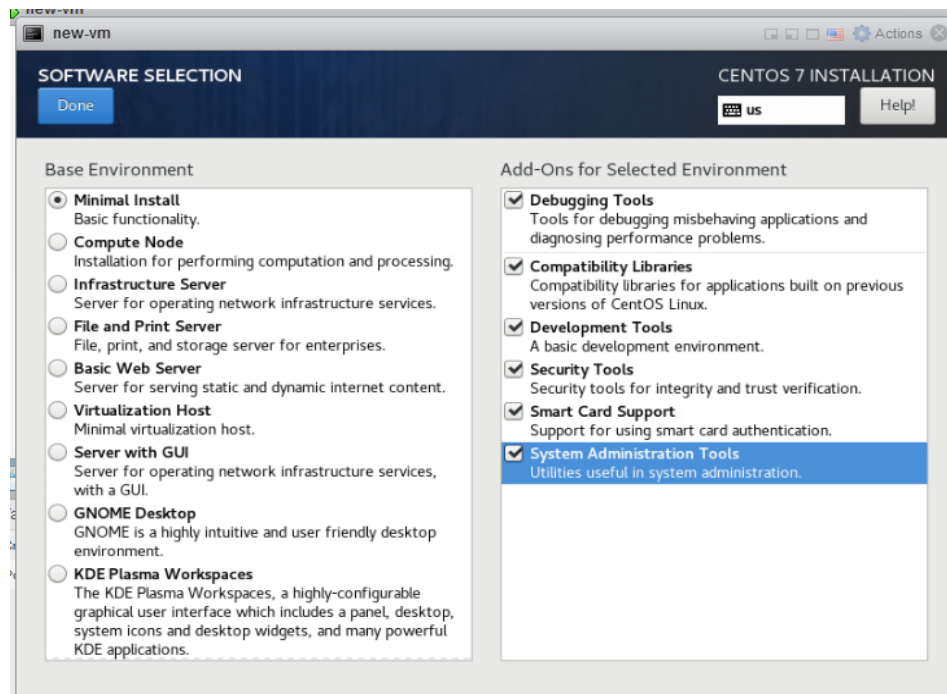


Click on “Installation source” on the installation summary page. Do not make any changes. Just press “Done”. (indication: Yellow color arrow in the above image)

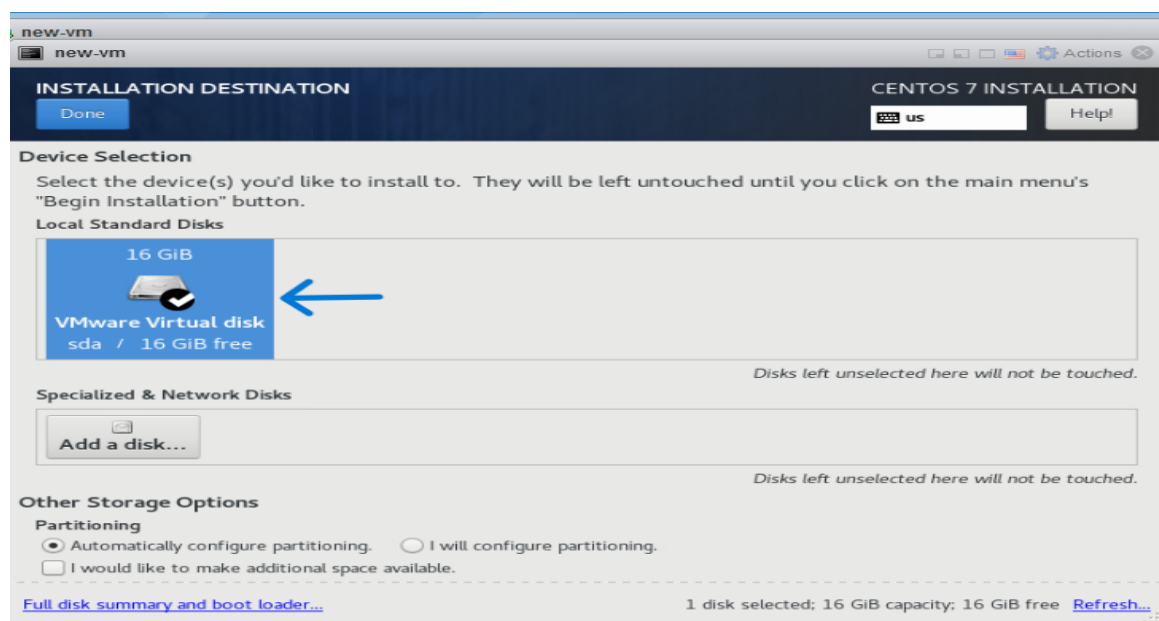




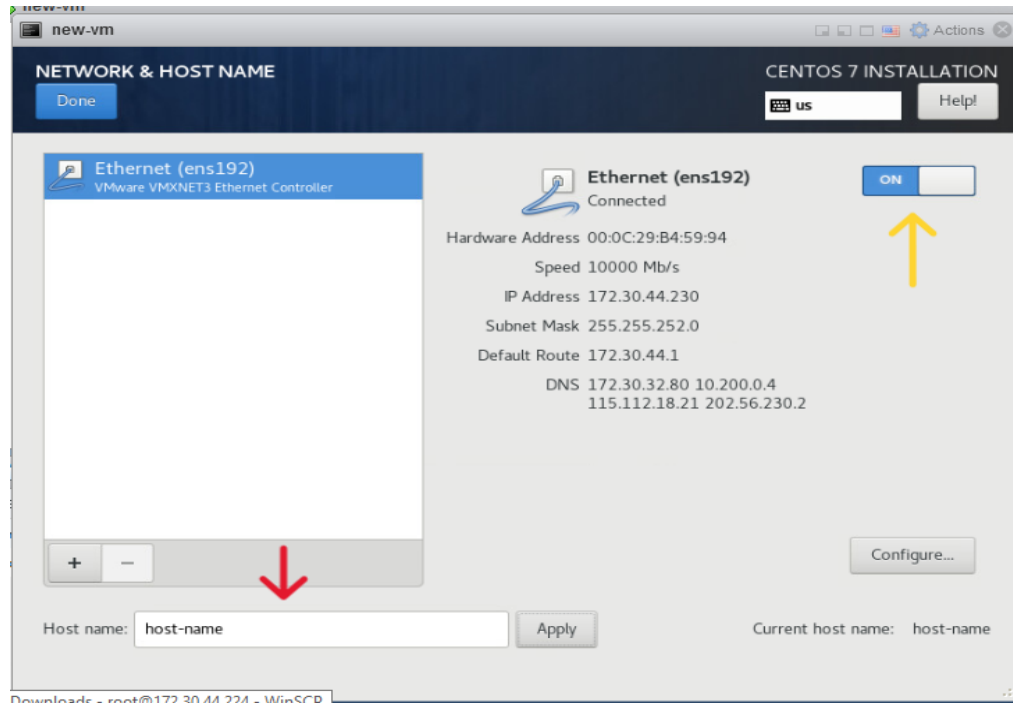
Click on “Selection source” on the installation summary page. Select all the options in “Add-Ons for selected environment” as shown in the below figure. (indication: Red arrow mark)



Now press the “Installation Destination” button in the installation summary page. Select the first VMWare Virtual Disk as shown in the below figure and click “done”. (indication: Green arrow mark)

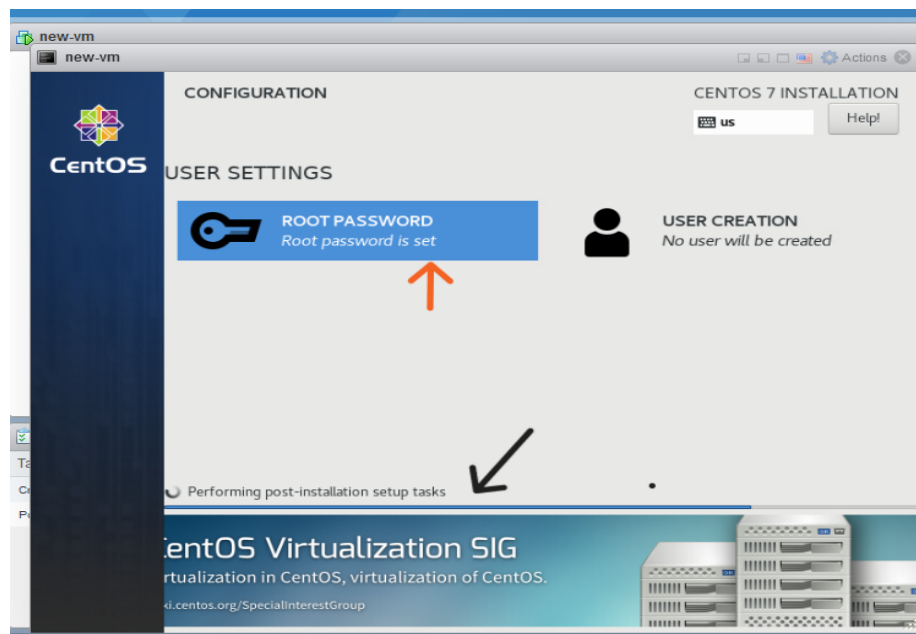


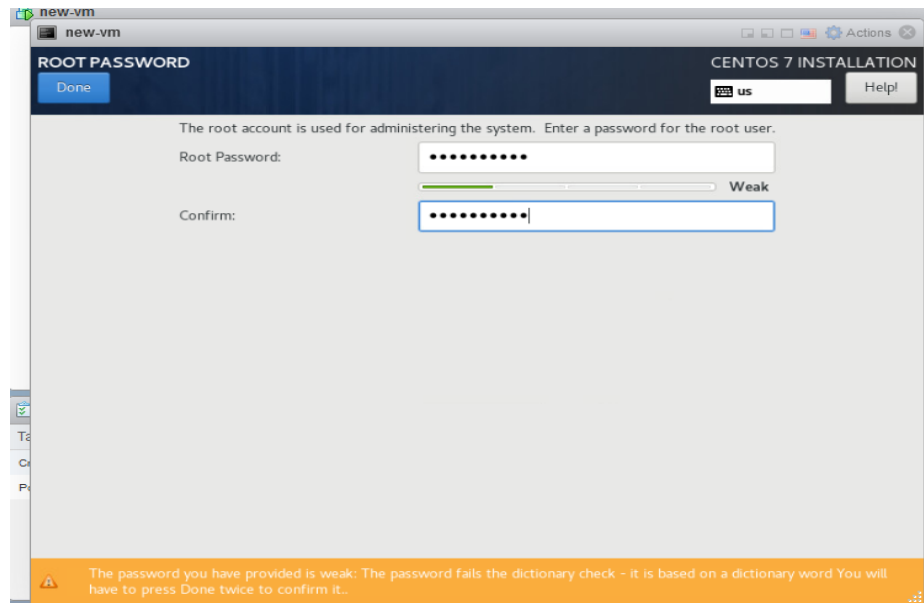
Finally, click the option “Network and hostname”. Turn on the network and can change the hostname as indicated in the below image.



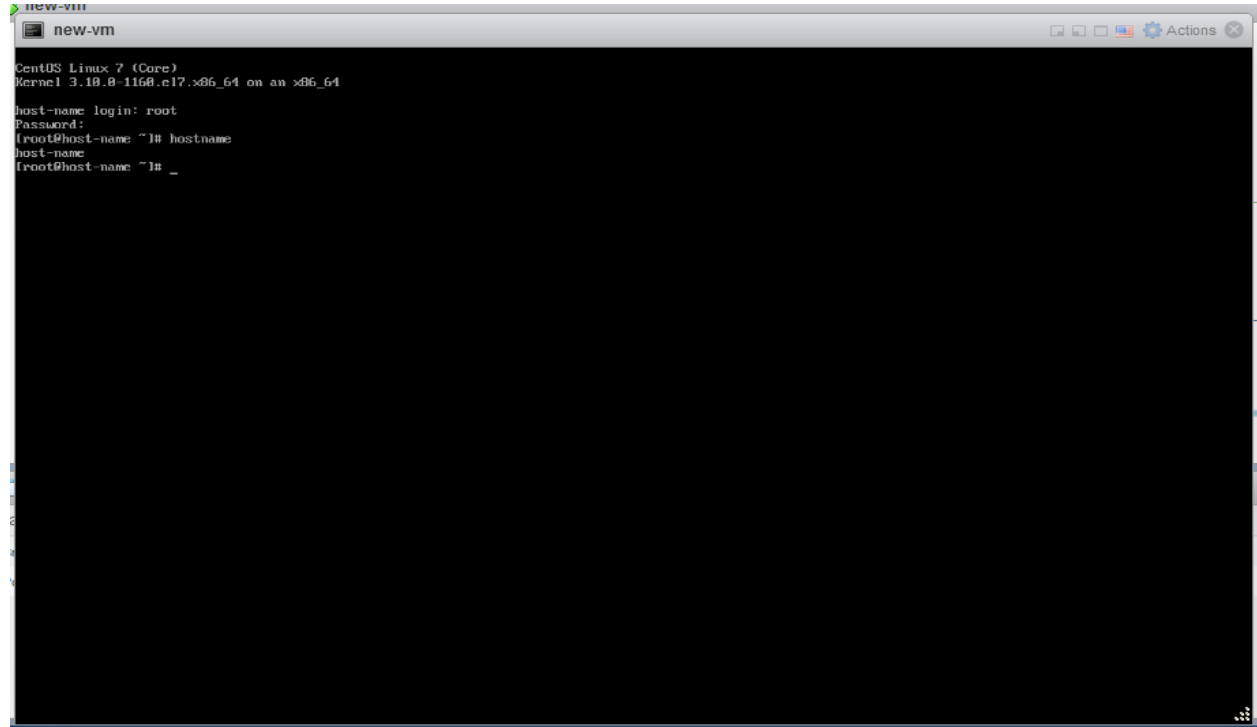
Press the “Begin Installation” button.

Step 11: Click on “Root Password” and set a password for further use.





The new virtual machine is ready for use now. Click on the console. Login into the virtual environment using set username and password. These can be observed in the below picture.

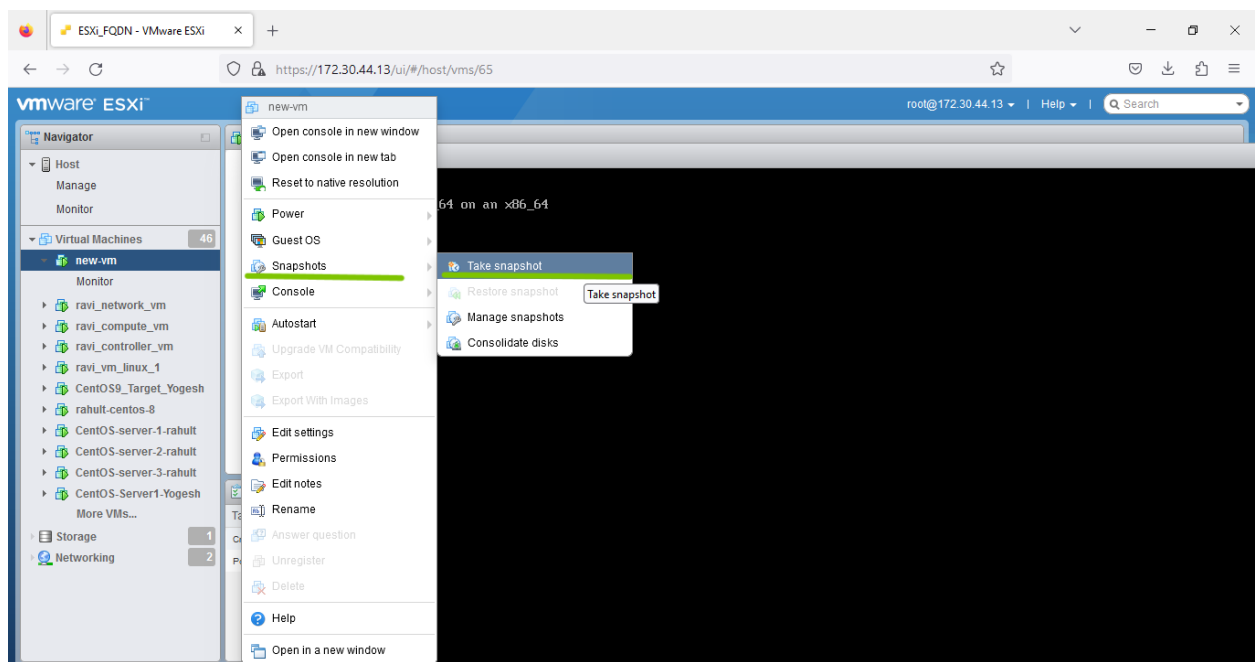


## Creating a snapshot:

### Steps:

- Open the console.
- Press right click on the top left of the console.
- Select “Snapshots”.
- Select “Take snapshot”
- Provide the name and describe the snapshot.
- Click on “Take Snapshot”.

*Note: Below two snaps follow up the above steps.*



Take snapshot for new-vm

Name	<input type="text" value="snap1"/>
Description	<input type="text" value="Snapshot one  "/>

☒ Snapshot the virtual machine's memory.
   
☐ Quiesce guest file system (needs VMware tools installed).

### Restoring a snapshot:

When a snapshot is used to restore the server, **the server will revert to exactly how it was at the time of the snapshot.**

Steps:

Open the console.

Go to the top left of the console and right click there.

Select "Snapshots".

Select "Manage snapshots".

Select the snapshot that you want to revert back and click on "Restore Snapshot".

Manage snapshots - new-vm

new-vm

- snap1

You are here

Name	snap1
Description	Snapshot one
Created	Wednesday, March 29, 2023, 06:59:00 -0700

**Note:** *We can see the actions that are done recently in the current VM at the bottom as shown in the below image.*

The screenshot displays the VMware ESXi web interface. The left sidebar shows the 'Navigator' with 'Virtual Machines' expanded, listing various VMs including 'new-vm'. The main panel shows the configuration for 'new-vm', including memory (8 GB) and storage (32.1 GB). Below the configuration, the 'Recent tasks' table lists several successful operations performed on the VM.

Task	Target	Initiator	Queued	Started	Result	Completed
Create Snapshot	new-vm	root	03/29/2023 06:59:00	03/29/2023 06:59:00	Completed successfully	03/29/2023 06:59:15
Power On VM	new-vm	root	03/29/2023 06:46:46	03/29/2023 06:46:46	Completed successfully	03/29/2023 06:46:48
Create VM	new-vm	root	03/29/2023 06:44:44	03/29/2023 06:44:44	Completed successfully	03/29/2023 06:44:46
Revert To Snapshot	new-vm	root	03/29/2023 06:59:58	03/29/2023 06:59:58	Completed successfully	03/29/2023 07:00:03