OpenStack on VMware Workstation12.5 instructions

Version 3: 2020-01-27

These instructions will guide the student through deploying and configuring Openstack Virtual Machines in VMware Workstation 12.5.

Deploy OpenStack OVFs in VMware Workstation 12.5

Attributions:

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Portions of this document, in whole or part, were sourced from the OpenStack website at https://OpenStack.org

General information:

- Tested on a Dell Optiplex 980 i7-2600 @3.40GHz and 16 GB memory 64-bit OS
- Host PC must support virtualization
- Install VMware Workstation 12.5 on host PC
- You can use an email address to activate the Workstation 30 day trial
- The **Openstack_Mitaka_WS** username is **root** and the password is **P@ssword**
- The **Openstack_WS_client2** username is **student** and the password is **P@ssword**
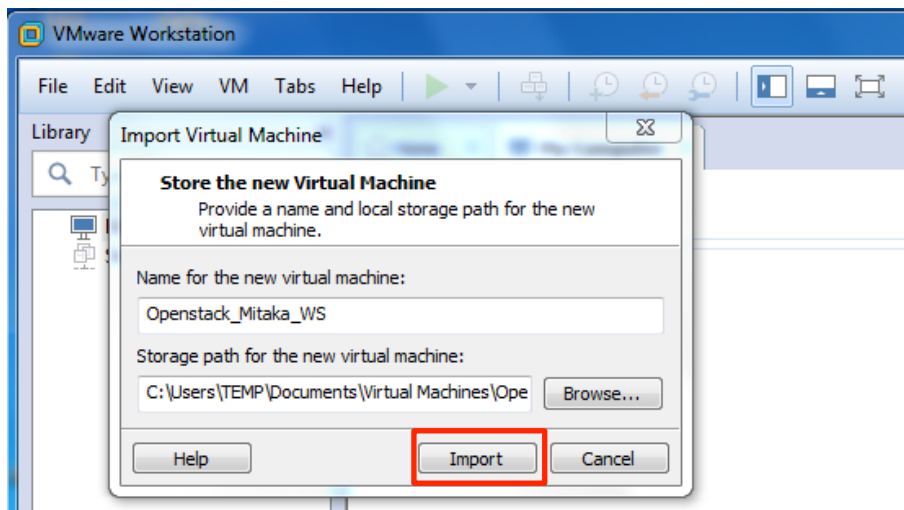- The **Openstack_WS_client2 root user** password is **P@ssword**
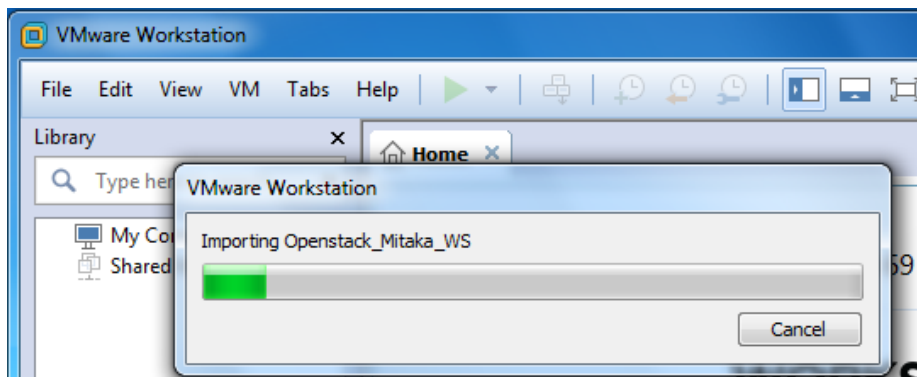
1. From the WS console, **select file>open>openstack_Mitaka_WS**

2. Change the storage path for the new virtual machine (if required) and click Import
   Note: If you change this default location, you may need to change the default
   location for virtual machines also (see step 5).

3. Importing the VMs will take about 20 minutes to complete depending on host
   system configuration


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4. Repeat for **Openstack_WS_client2**
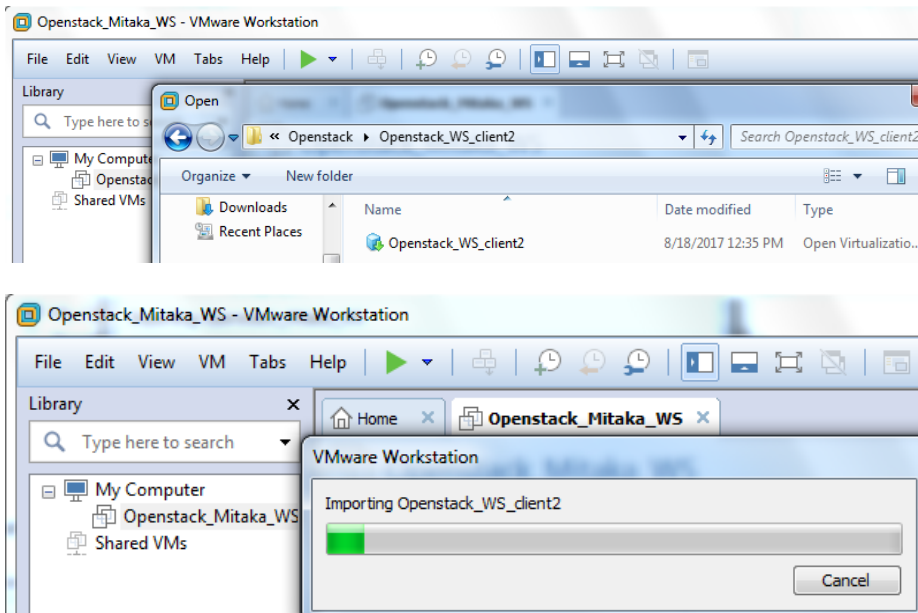
5. **Click on the OpenStack_Mitaka_WS** then **select edit>preferences from the toolbar menu**. If you changed the default location while deploying the OVF, then you may need to change this location also, which would probably be the same location that you deployed the OVF file to. The other settings can usually be left at their default settings for now. This should change the default location for both of the VMs.
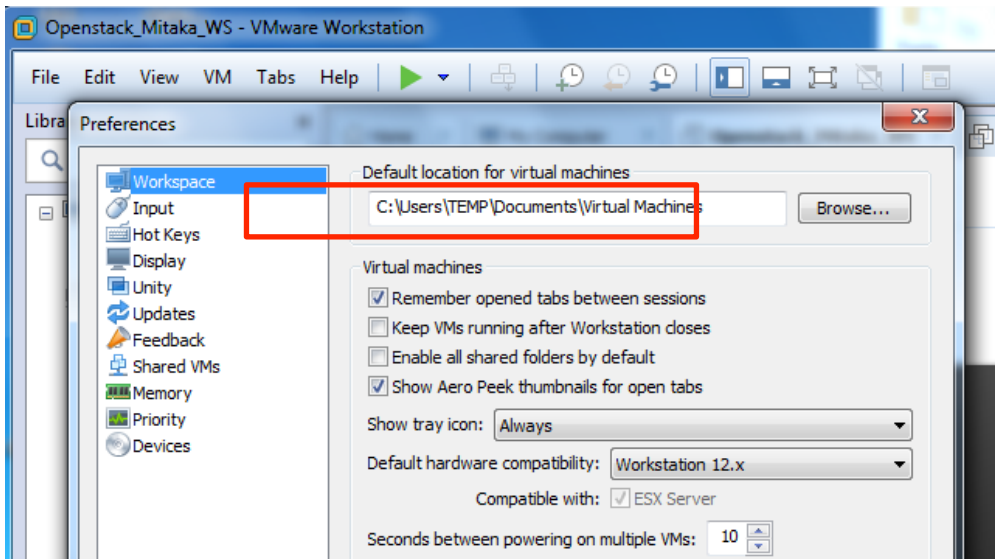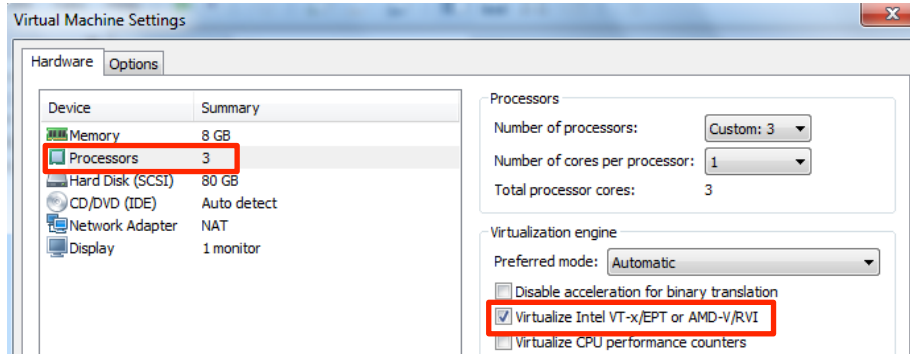
6. Select the OpenStack_Mitaka_WS VM and click on edit virtual machine settings
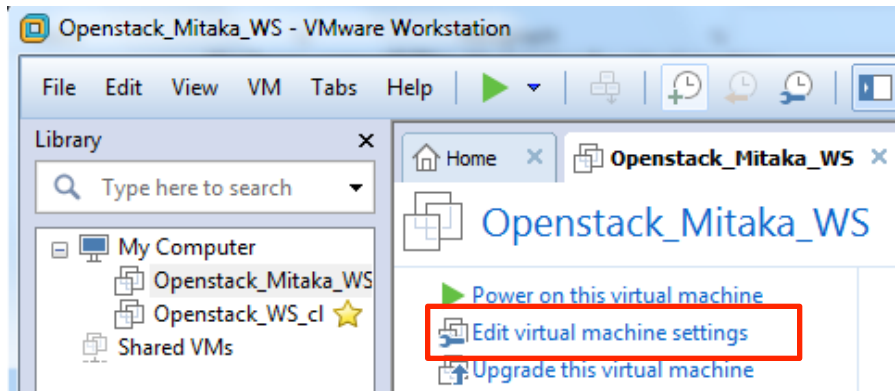
7. Enable virtualize Intel VT-x/EPT or AMD-V/RVI (only required for the Openstack_Mitaka_WS VM)
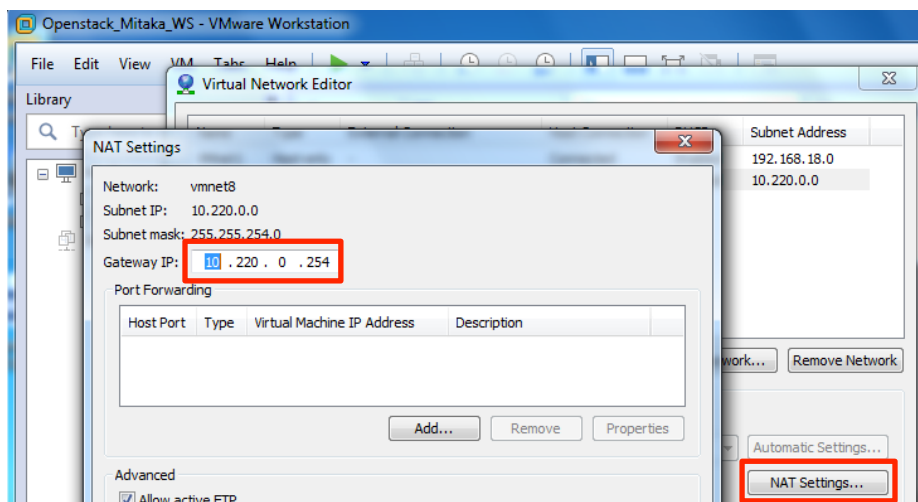
8. **Select edit>Virtual Network Editor from the workstation toolbar menu. Click on the VMnet8 virtual NIC** and select change settings and **change the Subnet IP: to 10.220.0.0** and **Subnet mask: to 255.255.254.0**. Open NAT Settings… (shown on next page).
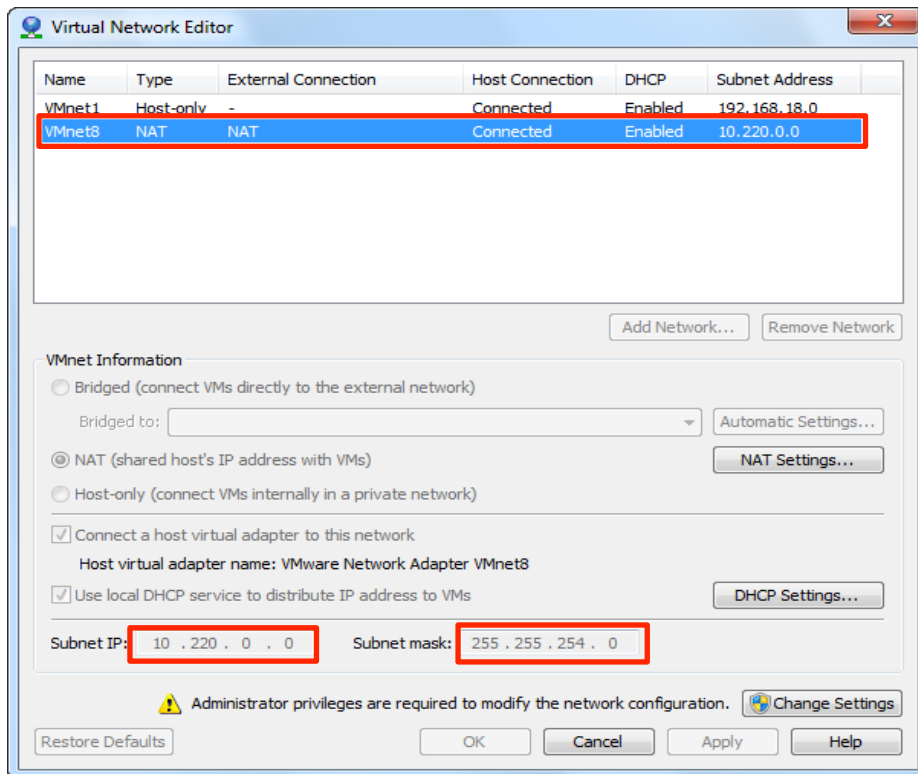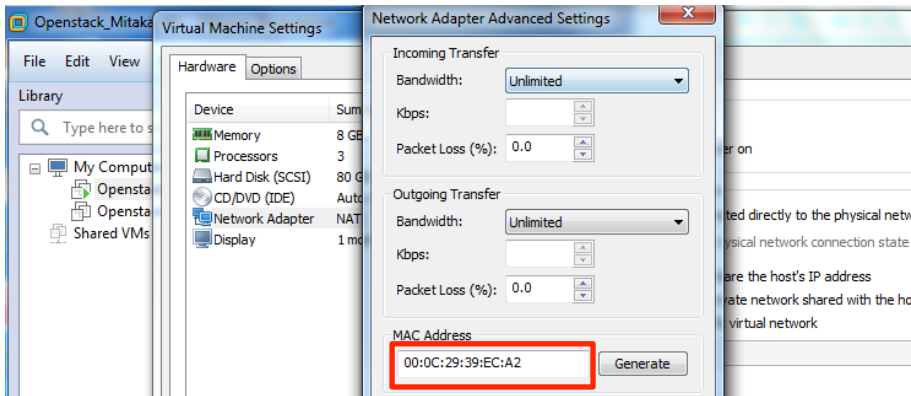

9. **Click on NAT Settings** and change the Gateway IP: address to **10.220.0.254**

10. Go back to **edit virtual machine settings** and **click on Network Adapter NAT** in the left pane. **Then click on Advanced** In the right pane. **Record the MAC Address**, yours will be different. You will have to power cycle the VM to populate the MAC address.

11. Power on the Openstack_Mitaka_WS and **Edit the /etc/sysconfig/network-scripts/ifcfg-ens160** and **change the HWADDR** to match the MAC address from the previous step. Repeat for the Openstack_WS_client2. (Don't use the HWADDR in the screenshot!)
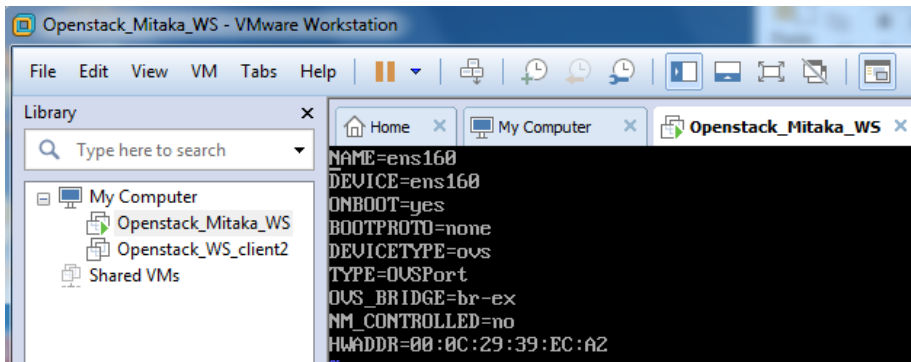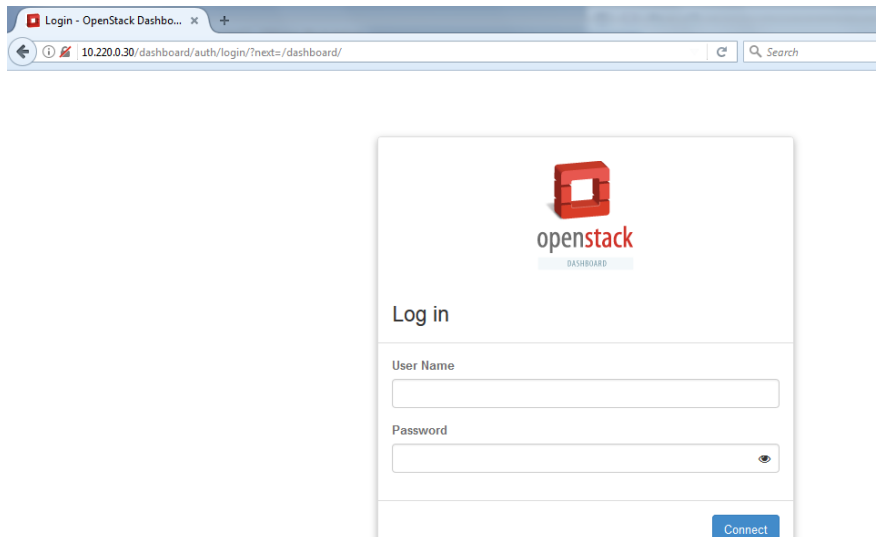

12. Set both VMs to Custom: Specific virtual network **VMnet8 (NAT)**
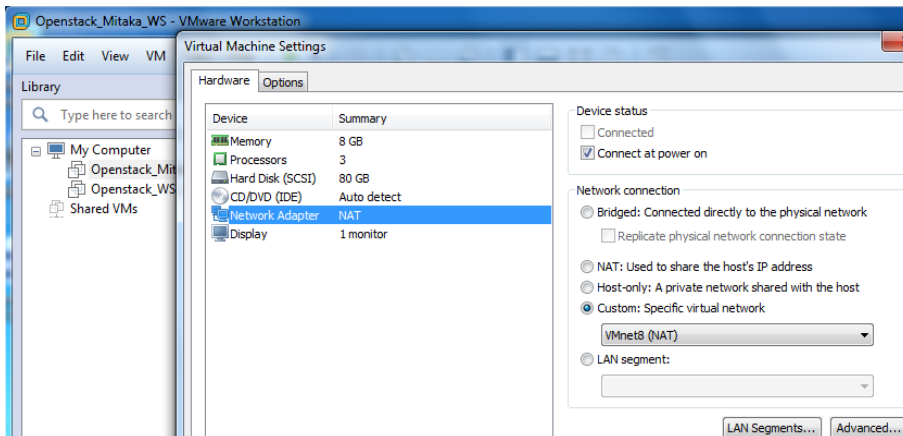
13. **Open a web browser on the host PC** and **navigate to 10.220.0.30**. You should see the OpenStack Log in page.

Note: The OpenStack Horizon View Dashboard must be active to see this page. If the Mitaka VM has been running for several minutes then there should be no problem. To verify it is ready run the command **openstack-status | grep openstack-dashbord** on the Mitaka terminal and look for active. If the status is not active, then wait a couple minutes and run the command again.

14. **Open another web browser from the openstack_WS_client2** and the OpenStack log in page should open as the home page.

    Note: There is a link on the toolbar menu for the OpenStack dashboard.
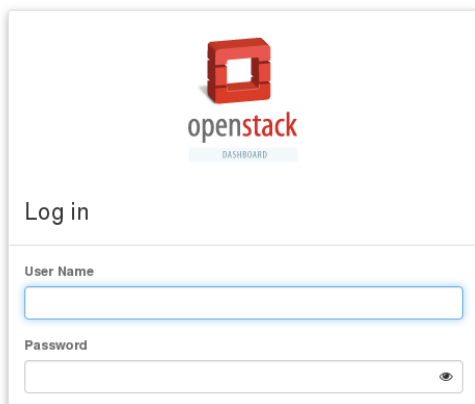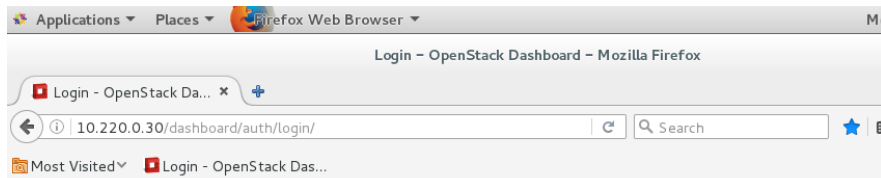
15. Take a snapshot of the base install for both VMs (both VMs should be powered off first).

    Note: This step is critical because you want a known starting point for each lab. If you don't do this step and someone completes a lab, you'll have to manually undo everything they did and possibly recovery the used disk space.
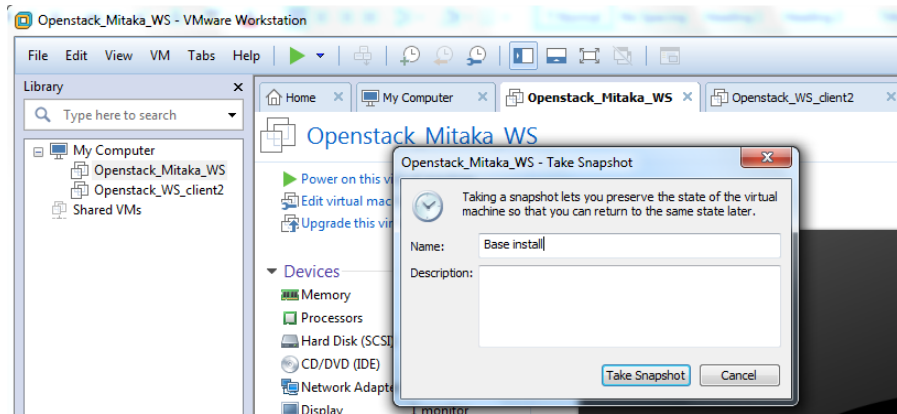
16. Optionally, you can set the VM to automatically revert to the snapshot whenever the VM is shutdown (highly recommended).