Build up NFV IAAS

# 1.Director Installation

[root@director yum.repos.d]# cat local.repo

[rhel-server-rpms]

name=rhel-7-server-rpms

baseurl=file:///home/osp9\_media/rhel-7-server-rpms

enabled=1

gpgcheck=0

systemctl disable firewalld

systemctl stop firewalld

systemctl disable NetworkManager

systemctl stop NetworkManager

hostnamectl

yum install ntpd -y

task “127.127.1.0” as ntp server .

systemctl enable ntpd

systemctl start ntpd

yum install httpd

[root@director yum.repos.d]# cat http.repo

[rhel-7-server-rpms]

name=rhel-7-server-rpms

baseurl=http://172.23.85.106:8089/osp9\_media/rhel-7-server-rpms

enabled=1

gpgcheck=0

[rhel-7-server-openstack-9-rpms]

name=rhel-7-server-openstack-9-rpms

baseurl=http://172.23.85.106:8089/osp9\_media/rhel-7-server-openstack-9-rpms

enabled=1

gpgcheck=0

[rhel-7-server-openstack-9-director-rpms]

name=rhel-7-server-openstack-9-director-rpms

baseurl=http://172.23.85.106:8089/osp9\_media/rhel-7-server-openstack-9-director-rpms

enabled=1

gpgcheck=0

[rhel-7-server-rh-common-rpms]

name=rhel-7-server-rh-common-rpms

baseurl=http://172.23.85.106:8089/osp9\_media/rhel-7-server-rh-common-rpms

enabled=1

gpgcheck=0

[rhel-7-server-extras-rpms]

name=rhel-7-server-extras-rpms

baseurl=http://172.23.85.106:8089/osp9\_media/rhel-7-server-extras-rpms

enabled=1

gpgcheck=0

$ cd ~/images

$ for i in /usr/share/rhosp-director-images/overcloud-full-latest-9.0.tar /usr/share/rhosp-director-images/ironic-python-agent-latest-9.0.tar; do tar -xvf $i; done

modify overcloud-full.qcow2 file

$ ln -s overcloud-full-sriov.qcow2 overcloud-full.qcow2

$ openstack overcloud image upload --image-path /home/stack/images/

$ openstack baremetal import --json ~/ipmi\_nodes.json

[stack@director ~]$ openstack baremetal introspection bulk start

[stack@director ~]$ ironic node-list

+--------------------------------------+------+---------------+-------------+--------------------+-------------+

| UUID | Name | Instance UUID | Power State | Provisioning State | Maintenance |

+--------------------------------------+------+---------------+-------------+--------------------+-------------+

| 9806f252-c73d-4dd2-a971-f9574c142e1c | None | None | power off | available | False |

| af15efd3-b847-4d1e-8168-20239aaea414 | None | None | power off | available | False |

| 62488472-c362-4c22-a83b-86b79ceadea8 | None | None | power off | available | False |

| 7fcc66ad-3293-4440-aa74-2ea2f3a99a1d | None | None | power off | available | False |

| c708adf0-78df-4e09-865e-8d5948b7c94c | None | None | power off | available | False |

| fc527cd3-fafa-4b4f-849f-585f96622c86 | None | None | power off | available | False |

| 5d5481c9-c888-4dad-bc15-a22f18ba5540 | None | None | power off | available | False |

| da986dc1-7c15-466d-91e2-b2c805fa0681 | None | None | power off | available | False |

| 414dbfd7-777f-45a1-a798-d991076e721e | None | None | power off | available | False |

+--------------------------------------+------+---------------+-------------+--------------------+-------------+

ironic node-update 9806f252-c73d-4dd2-a971-f9574c142e1c add properties/capabilities='profile:control,boot\_option:local'

ironic node-update af15efd3-b847-4d1e-8168-20239aaea414 add properties/capabilities='profile:control,boot\_option:local'

ironic node-update 62488472-c362-4c22-a83b-86b79ceadea8 add properties/capabilities='profile:control,boot\_option:local'

ironic node-update 7fcc66ad-3293-4440-aa74-2ea2f3a99a1d add properties/capabilities='profile:compute,boot\_option:local'

ironic node-update c708adf0-78df-4e09-865e-8d5948b7c94c add properties/capabilities='profile:compute,boot\_option:local'

ironic node-update fc527cd3-fafa-4b4f-849f-585f96622c86 add properties/capabilities='profile:compute,boot\_option:local'

ironic node-update 5d5481c9-c888-4dad-bc15-a22f18ba5540 add properties/capabilities='profile:compute,boot\_option:local'

ironic node-update da986dc1-7c15-466d-91e2-b2c805fa0681 add properties/capabilities='profile:compute,boot\_option:local'

ironic node-update 414dbfd7-777f-45a1-a798-d991076e721e add properties/capabilities='profile:compute,boot\_option:local'

[stack@director ~]$ openstack overcloud profiles list

+--------------------------------------+-----------+-----------------+-----------------+-------------------+

| Node UUID | Node Name | Provision State | Current Profile | Possible Profiles |

+--------------------------------------+-----------+-----------------+-----------------+-------------------+

| 9806f252-c73d-4dd2-a971-f9574c142e1c | | available | control | |

| af15efd3-b847-4d1e-8168-20239aaea414 | | available | control | |

| 62488472-c362-4c22-a83b-86b79ceadea8 | | available | control | |

| 7fcc66ad-3293-4440-aa74-2ea2f3a99a1d | | available | compute | |

| c708adf0-78df-4e09-865e-8d5948b7c94c | | available | compute | |

| fc527cd3-fafa-4b4f-849f-585f96622c86 | | available | compute | |

| 5d5481c9-c888-4dad-bc15-a22f18ba5540 | | available | compute | |

| da986dc1-7c15-466d-91e2-b2c805fa0681 | | available | compute | |

| 414dbfd7-777f-45a1-a798-d991076e721e | | available | compute | |

+--------------------------------------+-----------+-----------------+-----------------+-------------------+

[stack@director swift-data]$ sudo grep admin\_password /etc/ironic-inspector/inspector.conf

# [keystone\_authtoken]/admin\_password for keystone authentication.

admin\_password=c4c213a854ba3e0cf9b58c0213a6c11e8416f18a

[stack@director swift-data]$ export IRONIC\_DISCOVERD\_PASSWORD=c4c213a854ba3e0cf9b58c0213a6c11e8416f18a

[stack@director swift-data]$ for node in $(ironic node-list | awk '!/UUID/ {print $2}'); do swift -U service:ironic -K $IRONIC\_DISCOVERD\_PASSWORD download ironic-inspector inspector\_data-$node; done

inspector\_data-9806f252-c73d-4dd2-a971-f9574c142e1c [auth 0.284s, headers 0.521s, total 0.522s, 0.136 MB/s]

inspector\_data-af15efd3-b847-4d1e-8168-20239aaea414 [auth 0.283s, headers 0.396s, total 0.396s, 0.284 MB/s]

inspector\_data-62488472-c362-4c22-a83b-86b79ceadea8 [auth 0.285s, headers 0.515s, total 0.515s, 0.141 MB/s]

inspector\_data-7fcc66ad-3293-4440-aa74-2ea2f3a99a1d [auth 0.286s, headers 0.395s, total 0.396s, 0.289 MB/s]

inspector\_data-c708adf0-78df-4e09-865e-8d5948b7c94c [auth 0.286s, headers 0.395s, total 0.413s, 0.253 MB/s]

inspector\_data-fc527cd3-fafa-4b4f-849f-585f96622c86 [auth 0.284s, headers 0.504s, total 0.504s, 0.143 MB/s]

inspector\_data-5d5481c9-c888-4dad-bc15-a22f18ba5540 [auth 0.284s, headers 0.404s, total 0.404s, 0.261 MB/s]

inspector\_data-da986dc1-7c15-466d-91e2-b2c805fa0681 [auth 0.283s, headers 0.390s, total 0.391s, 0.293 MB/s]

inspector\_data-414dbfd7-777f-45a1-a798-d991076e721e [auth 0.283s, headers 0.394s, total 0.394s, 0.283 MB/s]

set boot disk

ironic node-update 9806f252-c73d-4dd2-a971-f9574c142e1c add properties/root\_device='{"serial": "5000cca071225b78"}'

ironic node-update af15efd3-b847-4d1e-8168-20239aaea414 add properties/root\_device='{"serial": "5000cca071226f40"}'

ironic node-update 62488472-c362-4c22-a83b-86b79ceadea8 add properties/root\_device='{"serial": "5000cca07126b62c"}'

ironic node-update 7fcc66ad-3293-4440-aa74-2ea2f3a99a1d add properties/root\_device='{"serial": "5000cca071223abc"}'

ironic node-update c708adf0-78df-4e09-865e-8d5948b7c94c add properties/root\_device='{"serial": "5000cca071227290"}'

ironic node-update fc527cd3-fafa-4b4f-849f-585f96622c86 add properties/root\_device='{"serial": "5000cca07124d5f4"}'

ironic node-update 5d5481c9-c888-4dad-bc15-a22f18ba5540 add properties/root\_device='{"serial": "5000cca071226e10"}'

ironic node-update da986dc1-7c15-466d-91e2-b2c805fa0681 add properties/root\_device='{"serial": "5000cca071225278"}'

ironic node-update 414dbfd7-777f-45a1-a798-d991076e721e add properties/root\_device='{"serial": "5000cca0712270dc"}'

# change image

## change controller image

passwd root

add http.repo local.repo

yum install net-tools vim -y

## change compute image

modify /etc/default/grub

GRUB\_CMDLINE\_LINUX="console=tty0 console=ttyS0,115200n8 crashkernel=auto rhgb quiet intel\_iommu=on default\_hugepagesz=1G hugepagesz=1G hugepages=192 isolcpus=10-39"

modify /boot/grub2/grub.cfg

[stack@director images]$ glance image-create --disk-format qcow2 --container-format bare --file overcloud-full-nfv.qcow2 --is-protected True --progress --property kernel\_id=0dfec46c-e29b-4929-96ff-41d2d6fee836 --property ramdisk\_id=84103980-41bf-42fb-9526-26d2aa0c073d --name overcloud-full-nfv

[=============================>] 100%