KVM INSTALL

yum install qemu-kvm qemu-img virt-manager libvirt libvirt-python libvirt-client virt-install virt-viewer brigdge-utils

yum install pciutils

systemctl mask firewalld

systemctl stop firewalld

systemctl stop NetworkManager

systemctl disable NetworkManager

yum -y erase NetworkManager

lsmod | grep kvm

systemctl start libvirtd

systemctl enable libvirtd

chkconfig libvirtd on

test install

virsh -c qemu:///system list

NETWORKING

chkconfig NetworkManager off

chkconfig network on

service NetworkManager stop

echo "net.ipv4.ip\_forward = 1"|sudo tee /etc/sysctl.d/99-ipforward.conf

sysctl -p /etc/sysctl.d/99-ipforward.

/etc/sysctl.conf

net.bridge.bridge-nf-call-ip6tables = 0

net.bridge.bridge-nf-call-iptables = 0

net.bridge.bridge-nf-call-arptables = 0

sysctl -p

modprobe 8021q

vi /etc/sysconfig/modules/8021q.modules

!/bin/sh

exec /sbin/modprobe 8021q >/dev/null 2>&1

chmod +x /etc/sysconfig/modules/8021q.modules

SIMPLE BRIDGE

ifcfg-br0

DEVICE="br0"

TYPE=Bridge

DELAY=0

ONBOOT="yes"

BOOTPROTO=static

IPADDR=219.0.211.4

NETMASK=255.255.255.0

GATEWAY=219.0.211.1

DNS1=8.8.8.8

PEERDNS="yes"

NM\_CONTROLLED=no

BONDED BRIDGED VLAN SETUP

ifcfg-ens2f0

DEVICE="ens2f0"

ONBOOT="no"

MASTER="bond1"

SLAVE="yes"

ifcfg-ens2f1

DEVICE="ens2f1"

ONBOOT="no"

MASTER="bond1"

SLAVE="yes"

ifcfg-bond1

DEVICE="bond1"

ONBOOT="yes"

BONDING\_OPTS=

#BRIDGE="br904"

NM\_CONTROLLED=no

ifcfg-bond1.904

DEVICE=bond1.904

BOOTPROTO=none

ONBOOT="yes"

VLAN=yes

NM\_CONTROLLED=no

BRIDGE=br904

ifcfg-br904

DEVICE="br904"

TYPE=Bridge

DELAY=0

ONBOOT="yes"

BOOTPROTO=static

NM\_CONTROLLED=no

service network restart

VM CONFIG

/etc/sysconfig/network-scripts/ifcfg-vlan904

DEVICE=vlan904

TYPE=Ethernet

BOOTPROTO=none

HWADDR=52:54:00:44:78:7a

IPADDR=219.0.203.43

NETMASK=255.255.255.0

IPV6INIT=no

MTU=1500

NM\_CONTROLLED=no

ONBOOT=yes

NETWORK TROUBLESHOOTING

brctl show

brctl showmacs

ensure all interface are up

ip a

ethtool <interface name>

VCONFIG INSTALL (Note this is not a persistent configuration)

yum install epel-release

yum install vconfig

create vlan

vconfig add bond1 904

create bridge

brctl addbr br904

add vlan to bridge

brctl addif br904 bond1.904

bring up interfaces

ifup br904

ifup bond1.904

connect to virt-manager

virt-manager -c qemu+ssh://root@10.200.211.4/system?socket=/var/run/libvirt/libvirt-sock

YUM UBSTALLS

net-utils