# Configure yum.repo

vi /etc/yum.repos.d/ol8.repo

[main]

cachedir=/var/cache/yum/$basearch/$releasever

keepcache=0

debuglevel=2

logfile=/var/log/yum.log

exactarch=1

obsoletes=1

gpgcheck=1

plugins=1

installonly\_limit=3

reposdir=/etc/yum.repos.d/

[OracleLinux8\_OL8-baseos-x86\_64]

name=Oracle Linux 8 x86\_64 OL8-baseos-x86\_64

baseurl=http://repo-vn.vn.prod/repos/OracleLinux8/OL8-baseos-x86\_64

enabled=1

gpgcheck=0

[OracleLinux8\_OL8-appstream-x86\_64]

name=Oracle Linux 8 x86\_64 OL8-appstream-x86\_64

baseurl=http://repo-vn.vn.prod/repos/OracleLinux8/OL8-appstream-x86\_64

enabled=1

gpgcheck=0

[OracleLinux8\_OL8-addons-x86\_64]

name=Oracle Linux 8 x86\_64 OL8-addons-x86\_64

baseurl=http://repo-vn.vn.prod/repos/OracleLinux8/OL8-addons-x86\_64

enabled=1

gpgcheck=0

[OracleLinux8\_OL8-uek6-x86\_64]

name=Oracle Linux 8 x86\_64 OL8-uek6-x86\_64

baseurl=http://repo-vn.vn.prod/repos/OracleLinux8/OL8-uek6-x86\_64

enabled=1

gpgcheck=0

[OracleLinux8\_OL8-epel-x86\_64]

name=Oracle Linux 8 x86\_64 OL8-epel-x86\_64

baseurl=http://repo-vn.vn.prod/repos/OracleLinux8/OL8-epel-x86\_64

enabled=1

gpgcheck=0

127.0.0.1 localhost localhost.localdomain localhost4 localhost4.localdomain4

192.168.56.107 ol7-19.localdomain ol7-19

# Upgrade all pakages except kmod, docker-ce, oracle linux-release

dnf clean metadata

dnf update --exclude=kmod\* --exclude=docker-ce\* --exclude=oraclelinux-release-el\* -y

# Install common pakages

dnf install bc fontconfig-devel ksh nc bind-utils nfs-utils make net-tools openssh-clients rlwrap expect git autofs parted mlocate chrony lvm2 xfsprogs btrfs-progs rsync python3 python3-configshell python3-rtslib python3-six python3-lxml targetcli smartmontools sysstat unzip -y

# Install pakages required by Oracle

dnf install --assumeyes binutils elfutils-libelf elfutils-libelf-devel glibc glibc-devel gcc gcc-c++ libaio libaio-devel libXrender libXrender-devel libX11 libXau libXi libXtst libgcc librdmacm-devel libstdc++ libstdc++-devel libxcb libnsl libnsl.i686 libnsl2 libnsl2.i686 unixODBC --allowerasing

# Set mountpoints NFS for oracle server

mkdir -p /u04

chmod 777 /u04

sudo -u root mount -t nfs -o rw,bg,hard,nointr,rsize=32768,wsize=32768,tcp,actimeo=0,vers=3,timeo=600,suid,nolock 10.19.205.202:/DBBACKUP /u04

vi /etc/fstab

10.19.205.202:/DBBACKUP /u04 nfs rw,bg,hard,nointr,rsize=32768,wsize=32768,tcp,vers=3,timeo=600,actimeo=0 0 0

check mount point

stat /u04/FILE\_RESTORE/ORACLE\_SOFT/OPatch\_12.2.0.1.29\_p6880880\_190000\_Linux-x86-64.zip

# Reboot server

# Create directory for software

mkdir -p /u01/softs

chmod 755 /u01/softs

# Create directory for software extract

mkdir -p /u01/softs/oracle\_database

mkdir -p /u01/softs/oracle\_grid\_home

mkdir -p /u01/softs/oracle\_PSU

# Start and enable NTP

systemctl start chronyd

systemctl enable chronyd

# Stop and disable firewalld

systemctl stop firewalld

systemctl disable firewalld

# Set timezone

timedatectl set-timezone Asia/Ho\_Chi\_Minh

# Add host to /etc/hosts

# Unarchive software from nfs to local

unzip /u04/FILE\_RESTORE/ORACLE\_SOFT/LINUX.X64\_193000\_db\_home.zip -d /u01/softs/oracle\_database/

unzip /u04/FILE\_RESTORE/ORACLE\_SOFT/LINUX.X64\_193000\_grid\_home.zip -d /u01/softs/oracle\_grid\_home/

unzip /u04/FILE\_RESTORE/ORACLE\_SOFT/GI\_RU\_19.15.0.0.0\_p33803476\_190000\_Linux-x86-64.zip -d /u01/softs/oracle\_PSU/

unzip -o /u04/FILE\_RESTORE/ORACLE\_SOFT/DB\_RU\_19.15.0.0.0\_p33806152\_190000\_Linux-x86-64.zip -d /u01/softs/oracle\_PSU/

unzip -o /u04/FILE\_RESTORE/ORACLE\_SOFT/OJVM\_RU\_19.15.0.0.0\_p33808367\_190000\_Linux-x86-64.zip -d /u01/softs/oracle\_PSU/

unzip -o /u04/FILE\_RESTORE/ORACLE\_SOFT/p30159782\_193000OCWRU\_Generic.zip -d /u01/softs/oracle\_PSU/

unzip -o /u04/FILE\_RESTORE/ORACLE\_SOFT/OPatch\_12.2.0.1.29\_p6880880\_190000\_Linux-x86-64.zip -d /u01/softs/

# Copy oracle\_pakage files to local

mkdir -p /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/cvuqdisk-1.0.10-1.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/ncurses-c++-libs-6.1-9.20180224.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/ncurses-devel-6.1-9.20180224.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/kmod-redhat-oracleasm-2.0.8-12.0.1.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/ksh-20120801-254.0.1.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oracleasmlib-2.0.17-1.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oracleasm-support-2.1.12-1.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oracle-database-preinstall-19c-1.0-2.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oraclelinux-release-el8-1.0-21.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oraclelinux-developer-release-el8-1.0-7.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/dnf-plugins-core-4.0.21-4.0.1.el8\_5.noarch.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/yum-utils-4.0.21-4.0.1.el8\_5.noarch.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oracle-instantclient-release-el8-1.0-1.el8.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/oracle-instantclient-basic-21.5.0.0.0-1.x86\_64.rpm /u01/softs/oracle\_package

cp /u04/FILE\_RESTORE/ORACLE\_SOFT/oracle\_package/python36-cx\_Oracle-8.2.1-1.el8.x86\_64.rpm /u01/softs/oracle\_package

# Add Groups

groupadd -g 54318 asmdba

groupadd -g 54319 asmoper

groupadd -g 54320 asmadmin

groupadd -g 54321 oinstall

groupadd -g 54322 dba

groupadd -g 54323 oper

# Add user oracle

useradd -u 1101 -g oinstall -G dba,oper,asmdba oracle

passwd oracle [Password1]

# Add user grid

useradd -u 1100 -g oinstall -G dba,asmadmin,asmdba,asmoper grid

passwd grid [Password1]

# Add Oracle user to sudoers

vi /etc/sudoers.d/oracle

oracle ALL=(ALL) NOPASSWD: ALL

# Add grid to sudoers

vi /etc/sudoers.d/grid

grid ALL=(ALL) NOPASSWD: ALL

# Generate and Config ssh-keys and authorized\_keys, add known\_hosts (RAC)

# Create Oracle directory

mkdir -p /u01/app/oracle/product/19.0.0/dbhome\_1

chown -R oracle:oinstall /u01/app

mkdir -p /u01/app/oraInventory

chown -R grid:oinstall /u01/app/oraInventory

chmod -R 774 /u01/app/oraInventory

# Change owner /u01

chown oracle:oinstall /u01

# Create Grid directory

mkdir -p /u01/app/grid

mkdir -p /u01/app/19.0.0/grid

chown -R grid:oinstall /u01/app/grid

chown -R grid:oinstall /u01/app/19.0.0

# Copy file to grid home

/usr/bin/rsync -av /u01/softs/oracle\_grid\_home/ /u01/app/19.0.0/grid

chown -R grid:oinstall /u01/app/19.0.0

# Copy file to Oracle home

/usr/bin/rsync -av /u01/softs/oracle\_database/ /u01/app/oracle/product/19.0.0/dbhome\_1

chown -R oracle:oinstall /u01/app/oracle/product/19.0.0

# Setting kernel

vi /etc/sysctl.conf

fs.file-max = 6815744

kernel.sem = 250 32000 100 128

kernel.shmmni = 4096

kernel.shmall = 1073741824

kernel.shmmax = 4398046511104

kernel.panic\_on\_oops = 1

net.core.rmem\_default = 262144

net.core.rmem\_max = 4194304

net.core.wmem\_default = 262144

net.core.wmem\_max = 1048576

net.ipv4.conf.all.rp\_filter = 2

net.ipv4.conf.default.rp\_filter = 2

fs.aio-max-nr = 1048576

net.ipv4.ip\_local\_port\_range = 9000 65500

/sbin/sysctl -p

# Hugepage

# Oracle recommended PAM config

vi /etc/pam.d/login

session required pam\_limits.so

# Oracle-recommended security limits

vi /etc/security/limits.d/99-oracle-limits.conf

grid soft nproc 16384

grid hard nproc 16384

grid soft nofile 4096

grid hard nofile 65536

grid soft stack 10240

grid hard stack 32768

grid soft memlock 14466355 (0.9 \* total mem in MB \* 1024)

grid hard memlock 14466355 (0.9 \* total mem in MB \* 1024)

oracle soft nproc 16384

oracle hard nproc 16384

oracle soft nofile 4096

oracle hard nofile 65536

oracle soft stack 10240

oracle hard stack 32768

oracle soft memlock 14466355 (0.9 \* total mem in MB \* 1024)

oracle hard memlock 14466355 (0.9 \* total mem in MB \* 1024)

# Disable Transparent Hugepages

echo never > /sys/kernel/mm/transparent\_hugepage/enabled

echo never > /sys/kernel/mm/transparent\_hugepage/defrag

vi /etc/rc.d/rc.local (thêm vào file)

echo never > /sys/kernel/mm/transparent\_hugepage/enabled

echo never > /sys/kernel/mm/transparent\_hugepage/defrag

fix permission

chmod 755 /etc/rc.d/rc.local

# Create Stage directory

mkdir -p /u01/stage

chown oracle:oinstall /u01/stage

chmod 775 /u01/stage

mkdir -p /u01/stage/rsp

chown oracle:oinstall /u01/stage/rsp

chmod 775 /u01/stage/rsp

mkdir -p /u01/stage/udev

chown oracle:oinstall /u01/stage/udev

chmod 775 /u01/stage/udev

# Install pakages required by Oracle for ASMlib

dnf install /u01/softs/oracle\_package/ncurses-c++-libs-6.1-9.20180224.el8.x86\_64.rpm -y

dnf install /u01/softs/oracle\_package/ncurses-devel-6.1-9.20180224.el8.x86\_64.rpm -y

dnf install /u01/softs/oracle\_package/oracleasmlib-2.0.17-1.el8.x86\_64.rpm -y

dnf install /u01/softs/oracle\_package/oracleasm-support-2.1.12-1.el8.x86\_64.rpm -y

dnf install /u01/softs/oracle\_package/kmod-redhat-oracleasm-2.0.8-12.0.1.el8.x86\_64.rpm -y

dnf install /u01/softs/oracle\_package/oracle-database-preinstall-19c-1.0-2.el8.x86\_64.rpm -y

dnf install /u01/softs/oracle\_package/cvuqdisk-1.0.10-1.rpm -y

# ASMlib Add config

vi /etc/sysconfig/oracleasm-\_dev\_oracleasm

# This is a configuration file for automatic loading of the Oracle

# Automatic Storage Management library kernel driver. It is generated

# By running /etc/init.d/oracleasm configure. Please use that method

# to modify this file

#

# ORACLEASM\_ENABLED: 'true' means to load the driver on boot.

ORACLEASM\_ENABLED=true

# ORACLEASM\_UID: Default user owning the /dev/oracleasm mount point.

ORACLEASM\_UID=grid

# ORACLEASM\_GID: Default group owning the /dev/oracleasm mount point.

ORACLEASM\_GID=asmadmin

# ORACLEASM\_SCANBOOT: 'true' means scan for ASM disks on boot.

ORACLEASM\_SCANBOOT=true

# ORACLEASM\_SCANORDER: Matching patterns to order disk scanning

ORACLEASM\_SCANORDER=""

# ORACLEASM\_SCANEXCLUDE: Matching patterns to exclude disks from scan

ORACLEASM\_SCANEXCLUDE=""

# ORACLEASM\_USE\_LOGICAL\_BLOCK\_SIZE: 'true' means use the logical block size

# reported by the underlying disk instead of the physical. The default

# is 'false'

ORACLEASM\_USE\_LOGICAL\_BLOCK\_SIZE=false

# Link ASMlib file config

ln -fs /etc/sysconfig/oracleasm-\_dev\_oracleasm /etc/sysconfig/oracleasm

# Enable and start Oracle ASMlib

systemctl enable oracleasm

systemctl start oracleasm

systemctl restart oracleasm

# Create bash profile for Oracle User

# --------------------------------------------------

# OS User: oracle

# Application: Oracle Database Software Owner

# Version: Oracle 19g Release 15

# --------------------------------------------------

export ORACLE\_SID=olab;

export ORACLE\_TERM=xterm;

export ORACLE\_BASE=/u01/app/oracle;

export ORACLE\_HOME=/u01/app/oracle/product/19.0.0/dbhome\_1;

export PATH=/usr/lib64/qt-3.3/bin:/usr/local/bin:/bin:/usr/bin:/usr/local/sbin:/usr/sbin:/sbin:/home/oracle/bin:/bin:/OPatch;

export LD\_LIBRARY\_PATH=/lib;

export ORACLE\_UNQNAME=olab;

export JAVA\_HOME=/jdk;

export PATH=$PATH:$ORACLE\_HOME/bin:$ORACLE\_HOME/OPatch;

export CV\_ASSUME\_DISTID=OEL8; ###for oracle 19C

alias sqlplus="rlwrap sqlplus"

alias rman="rlwrap rman"

alias lsnrctl="rlwrap lsnrctl"

alias adrci="rlwrap adrci"

alias dgmgrl="rlwrap dgmgrl"

alias asmcmd="rlwrap asmcmd"

# Create bash profile for Grid User

# --------------------------------------------------

# OS User: grid

# Application: Oracle Grid Infrastructure

# Version: Oracle 19g Release 15

# --------------------------------------------------

export ORACLE\_SID=+ASM;

export ORACLE\_BASE=/u01/app/grid;

export ORACLE\_HOME=/u01/app/19.0.0/grid;

export ORACLE\_TERM=xterm;

export PATH=/usr/lib64/qt-3.3/bin:/usr/local/bin:/bin:/usr/bin:/usr/local/sbin:/usr/sbin:/sbin:/home/grid/bin:/bin:/OPatch;

export LD\_LIBRARY\_PATH=/lib;

export PATH=$PATH:$ORACLE\_HOME/bin:$ORACLE\_HOME/OPatch;

export CV\_ASSUME\_DISTID=OEL8; ###for oracle 19C

#alias sqlplus="rlwrap sqlplus"

#alias rman="rlwrap rman"

#alias lsnrctl="rlwrap lsnrctl"

#alias adrci="rlwrap adrci"

#alias asmcmd="rlwrap asmcmd"

#alias dgmgrl="rlwrap dgmgrl"

# Partition devices

parted /dev/sde "mklabel gpt mkpart primary 1 -1"

kpartx -a /dev/sde1

# Create ASM labels

oracleasm createdisk asmdisk01 /dev/sde1

oracleasm scandisks

oracleasm listdisks

# Reboot server

# Create grid response file

As user grid:

vi /u01/stage/rsp/grid-sidev.rsp

###############################################################################

## Copyright(c) Oracle Corporation 1998,2019. All rights reserved. ##

## ##

## Specify values for the variables listed below to customize ##

## your installation. ##

## ##

## Each variable is associated with a comment. The comment ##

## can help to populate the variables with the appropriate ##

## values. ##

## ##

## IMPORTANT NOTE: This file contains plain text passwords and ##

## should be secured to have read permission only by oracle user ##

## or db administrator who owns this installation. ##

## ##

###############################################################################

#------------------------------------------------------------------------------

# Do not change the following system generated value.

#------------------------------------------------------------------------------

oracle.install.responseFileVersion=/oracle/install/rspfmt\_crsinstall\_response\_schema\_v19.0.0

INVENTORY\_LOCATION=/u01/app/oraInventory

oracle.install.option=HA\_CONFIG

ORACLE\_BASE=/u01/app/grid

ORACLE\_HOME=/u01/app/19.0.0/grid

oracle.install.asm.OSDBA=asmdba

oracle.install.asm.OSOPER=asmoper

oracle.install.asm.OSASM=asmadmin

oracle.install.crs.config.scanType=LOCAL\_SCAN

oracle.install.crs.config.SCANClientDataFile=

oracle.install.crs.config.gpnp.scanName=oracle.install.crs.config.gpnp.scanPort=

################################################################################

# #

# SECTION D - CLUSTER & GNS #

# #

################################################################################

oracle.install.crs.config.ClusterConfiguration=STANDALONE

oracle.install.crs.config.configureAsExtendedCluster=false

oracle.install.crs.config.memberClusterManifestFile=

oracle.install.crs.config.clusterName=sidev

oracle.install.crs.config.gpnp.configureGNS=false

oracle.install.crs.config.autoConfigureClusterNodeVIP=false

oracle.install.crs.config.gpnp.gnsOption=CREATE\_NEW\_GNS

oracle.install.crs.config.gpnp.gnsClientDataFile=

oracle.install.crs.config.gpnp.gnsSubDomain=hcnet.vn

oracle.install.crs.config.gpnp.gnsVIPAddress=sidev-vip.hcnet.vn

oracle.install.crs.config.sites=

oracle.install.crs.config.clusterNodes=

oracle.install.crs.config.networkInterfaceList=

oracle.install.crs.configureGIMR=false

oracle.install.asm.configureGIMRDataDG=false

################################################################################

# #

# SECTION E - STORAGE #

# #

################################################################################

oracle.install.crs.config.storageOption=

oracle.install.crs.config.sharedFileSystemStorage.votingDiskLocations=

oracle.install.crs.config.sharedFileSystemStorage.ocrLocations=

################################################################################

# #

# SECTION F - IPMI #

# #

################################################################################

oracle.install.crs.config.useIPMI=false

oracle.install.crs.config.ipmi.bmcUsername=

oracle.install.crs.config.ipmi.bmcPassword=

oracle.install.asm.SYSASMPassword=Password1

oracle.install.asm.diskGroup.name=ASMDISK

oracle.install.asm.diskGroup.redundancy=EXTERNAL

oracle.install.asm.diskGroup.AUSize=4

oracle.install.asm.diskGroup.FailureGroups=

oracle.install.asm.diskGroup.disksWithFailureGroupNames=

oracle.install.asm.diskGroup.disks=/dev/oracleasm/disks/ASMDISK01

oracle.install.asm.diskGroup.quorumFailureGroupNames=

oracle.install.asm.diskGroup.diskDiscoveryString=/dev/oracleasm/disks

oracle.install.asm.monitorPassword=Password1

oracle.install.asm.gimrDG.name=

oracle.install.asm.gimrDG.redundancy=

oracle.install.asm.gimrDG.AUSize=1

oracle.install.asm.gimrDG.FailureGroups=

oracle.install.asm.gimrDG.disksWithFailureGroupNames=

oracle.install.asm.gimrDG.disks=

oracle.install.asm.gimrDG.quorumFailureGroupNames=

oracle.install.asm.configureAFD=false

oracle.install.crs.configureRHPS=false

oracle.install.crs.config.ignoreDownNodes=false

oracle.install.config.managementOption=NONE

oracle.install.config.omsHost=

oracle.install.config.omsPort=0

oracle.install.config.emAdminUser=

oracle.install.config.emAdminPassword=

oracle.install.crs.rootconfig.executeRootScript=false

oracle.install.crs.rootconfig.configMethod=

oracle.install.crs.rootconfig.sudoPath=

oracle.install.crs.rootconfig.sudoUserName=

oracle.install.crs.config.batchinfo=

oracle.install.crs.app.applicationAddress=

oracle.install.crs.deleteNode.nodes=

# Run Grid installer with user grid

As root

chown -R grid:oinstall /u01/softs/oracle\_PSU/30159782

As user grid:

source /home/grid/.bash\_profile && /u01/app/19.0.0/grid/gridSetup.sh -applyOneOffs /u01/softs/oracle\_PSU/30159782/30159782 -responseFile /u01/stage/rsp/grid-sidev.rsp -waitforcompletion -ignorePrereq -silent

As user root:

/u01/app/oraInventory/orainstRoot.sh

/u01/app/19.0.0/grid/root.sh

As user grid:

/u01/app/19.0.0/grid/gridSetup.sh -executeConfigTools -responseFile /u01/stage/rsp/grid-sidev.rsp -silent

# Create response file for configToolAllCommands

vi /u01/stage/rsp/configtoolallcommands.rsp

grid.crs|S\_ASMPASSWORD=Password1

grid.crs|S\_ASMMONITORPASSWORD=Password1

oracle.crs|S\_ASMPASSWORD=Password1

oracle.crs|S\_ASMMONITORPASSWORD=Password1

# Run configToolAllCommands

As user grid:

/u01/app/19.0.0/grid/cfgtoollogs/configToolAllCommands RESPONSE\_FILE=/u01/stage/rsp/configtoolallcommands.rsp

# Update Nodelist, set CRS=TRUE

As user grid:

/u01/app/19.0.0/grid/oui/bin/runInstaller -updateNodeList ORACLE\_HOME=/u01/app/19.0.0/grid CRS=TRUE

# Extract Opatch to grid home

As user grid:

cd /u01/app/19.0.0/grid

mv OPatch OPatch\_old

As user root:

cd /u01/app/19.0.0/grid

cp -r /u01/softs/OPatch/ ./

chown -R grid:oinstall OPatch

# Run OPatchauto to upgrade grid home

As root

chmod -R 755 /u01/softs/oracle\_PSU/

/u01/app/19.0.0/grid/OPatch/opatchauto apply /u01/softs/oracle\_PSU/33803476/33575402

/u01/app/19.0.0/grid/OPatch/opatchauto apply /u01/softs/oracle\_PSU/33803476/33815596/

/u01/app/19.0.0/grid/OPatch/opatchauto apply /u01/softs/oracle\_PSU/33803476/33815607/

/u01/app/19.0.0/grid/OPatch/opatchauto apply /u01/softs/oracle\_PSU/33803476/33911149/

Check

/u01/app/19.0.0/grid/bin/srvctl status asm |grep 'is running'

/u01/app/19.0.0/grid/bin/srvctl status diskgroup -g ASMDISK

# Prepare response file oracle Oracle Home installation

As user oracle:

vi /u01/stage/db-install-19.0.0.rsp

####################################################################

## Copyright(c) Oracle Corporation 1998,2019. All rights reserved.##

## ##

## Specify values for the variables listed below to customize ##

## your installation. ##

## ##

## Each variable is associated with a comment. The comment ##

## can help to populate the variables with the appropriate ##

## values. ##

## ##

## IMPORTANT NOTE: This file contains plain text passwords and ##

## should be secured to have read permission only by oracle user ##

## or db administrator who owns this installation. ##

## ##

####################################################################

#-------------------------------------------------------------------------------

# Do not change the following system generated value.

#-------------------------------------------------------------------------------

oracle.install.responseFileVersion=/oracle/install/rspfmt\_dbinstall\_response\_schema\_v19.0.0

oracle.install.option=INSTALL\_DB\_SWONLY

UNIX\_GROUP\_NAME=oinstall

INVENTORY\_LOCATION=/u01/app/oraInventory

ORACLE\_HOME=/u01/app/oracle/product/19.0.0/dbhome\_1

ORACLE\_BASE=/u01/app/oracle

oracle.install.db.InstallEdition=EE

oracle.install.db.OSDBA\_GROUP=dba

oracle.install.db.OSOPER\_GROUP=dba

oracle.install.db.OSBACKUPDBA\_GROUP=dba

oracle.install.db.OSDGDBA\_GROUP=dba

oracle.install.db.OSKMDBA\_GROUP=dba

oracle.install.db.OSRACDBA\_GROUP=dba

# Install Oracle Home

As root

chown -R oracle:oinstall /u01/app/oracle/product/19.0.0/dbhome\_1

As user oracle

source /home/oracle/.bash\_profile && /u01/app/oracle/product/19.0.0/dbhome\_1/runInstaller -responseFile /u01/stage/db-install-19.0.0.rsp -noconfig -silent -waitforcompletion

As user root

/u01/app/oracle/product/19.0.0/dbhome\_1/root.sh

Configure auto start script

vi /usr/local/bin/manage\_oracle\_rdbms\_procs.sh

#!/bin/bash

#

# Date: 10.11.2018

#

# Thorsten Bruhns (thorsten.bruhns@googlemail.com)

#

# The startup-scritp is bundled with ansible-oracle

# The .profile\_<ORACLE\_SID> files are needed for starting listeners

#

# Limitations:

# - 1 Listener per Instance

# An Instance can only start 1 Listener. Multieple Listeners inside

# an ORACLE\_HOME are possible, when an Instance is existing for each

# Listener

#

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# Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

PROGNAME=`basename $0`

PROGPATH=`echo $0 | sed -e 's,[\\/][^\\/][^\\/]\*$,,'`

function print\_usage() {

echo "Usage:"

echo " $PROGNAME -a <start|stop> [-m abort|immediate] [-s SID] [-h]"

}

function print\_help() {

echo ""

print\_usage

echo ""

echo "Start/Stop Oracle Listeners and Instances on Host"

echo ""

echo "-a/--action <start|stop> Start/Stop of all components"

echo "-m/--mode <abort|immediate> Shutdown Mode for all databases"

echo "-s/--ORACLE\_SID SID of database to perform action on"

}

setenv()

{

SHORTOPTS="ha:m:s:"

LONGOPTS="help,action:mode:,ORACLE\_SID:"

ARGS=$(getopt -s bash --options $SHORTOPTS --longoptions $LONGOPTS --name $PROGNAME -- "$@" )

if [ ${?} -ne 0 ] ; then

exit

fi

eval set -- "$ARGS"

while true;

do

case "$1" in

-h|--help)

print\_help

exit 0;;

-a|--action)

global\_action=${2}

export global\_action

shift 2;;

-m|--mode)

global\_dbmode=${2}

export global\_dbmode

shift 2;;

-s|--ORACLE\_SID)

SID=${2}

export SID

shift 2;;

--)

shift

break;;

esac

done

}

function start\_database() {

ORACLE\_HOME=${1}

ORACLE\_SID=${2}

ORA\_STARTMODE=${3}

echo "########################################"

echo "ORACLE\_HOME: "${ORACLE\_HOME}

echo "ORACLE\_SID : "${ORACLE\_SID}

# Check for SPFile/PFile

test -f ${ORACLE\_HOME}/dbs/spfile${ORACLE\_SID}.ora || test -f ${ORACLE\_HOME}/dbs/init${ORACLE\_SID}.ora

if [ ${?} -ne 0 ] ; then

echo "no parameter file found."

echo "Skipping entry in oratab!"

return 1

fi

if [ ! -z "${global\_dbmode}" ] ; then

DB\_STARTMODE=${global\_dbmode}

STARTDB=Y

elif [ ${ORA\_STARTMODE} = 'Y' ] ; then

# 'Y' => Startup open

DB\_STARTMODE=""

STARTDB=Y

elif [ ${ORA\_STARTMODE} = 'M' ] ; then

DB\_STARTMODE='MOUNT'

STARTDB=Y

fi

if [ ${STARTDB:-"N" = "Y" } ] ; then

# Using RMAN for startup

# => easy to switch from mount to open for running instance during execution

echo "startup ${DB\_STARTMODE}" | ${ORACLE\_HOME}/bin/rman target /

else

echo "Skipping Oracle Instance: "${ORACLE\_SID}" due to Startmode "${ORA\_STARTMODE}

fi

}

function stop\_database() {

ORACLE\_HOME=${1}

ORACLE\_SID=${2}

ORA\_STOPMODE=${3}

echo "########################################"

# check for pmon

ps ax | grep "[0-9] ora\_pmon\_${ORACLE\_SID}$" > /dev/null 2>&1

if [ ${?} -ne 0 ] ; then

echo "Instance "${ORACLE\_SID}" not running"

return

else

echo "Stopping Oracle Instance: "${ORACLE\_SID}" with rman"

# Using RMAN for startup

# => easy to switch from mount to open for running instance during execution

echo "shutdown "${ORA\_STOPMODE} | ${ORACLE\_HOME}/bin/rman target /

fi

}

function start\_listener() {

ORACLE\_HOME=${1}

LSNRNAME=${2}

echo "checking Listener: "${LSNRNAME}" in ORACLE\_HOME: "${ORACLE\_HOME}

ORACLE\_BASE=$(${ORACLE\_HOME}/bin/orabase)

${ORACLE\_HOME}/bin/lsnrctl status ${LSNRNAME} > /dev/null 2>&1

if [ ${?} -eq 0 ] ; then

echo "Listener still running"

else

${ORACLE\_HOME}/bin/lsnrctl start ${LSNRNAME}

fi

}

function stop\_listener() {

ORACLE\_HOME=${1}

LSNRNAME=${2}

echo "checking Listener: "${LSNRNAME}" in ORACLE\_HOME: "${ORACLE\_HOME}

ORACLE\_BASE=$(${ORACLE\_HOME}/bin/orabase)

${ORACLE\_HOME}/bin/lsnrctl status ${LSNRNAME} > /dev/null 2>&1

if [ ${?} -eq 0 ] ; then

${ORACLE\_HOME}/bin/lsnrctl stop ${LSNRNAME}

else

echo "Listener not running"

fi

}

function do\_sidline() {

sidline=${1}

ORA\_SID=$(echo $sidline | cut -d":" -f1)

ORA\_HOME=$(echo $sidline | cut -d":" -f2)

ORA\_STARTMODE=$(echo $sidline | cut -d":" -f3)

ORA\_OWNER=$(stat -c '%U' ${ORA\_HOME/bin/oracle})

PROFILE\_FILE=$(getent passwd ${ORA\_OWNER} | cut -d":" -f6)/.profile\_${ORA\_SID}

if [ ${ORA\_OWNER:-"\_"} != $(id -n -u) ] ; then

echo "Script started with wrong user."

echo "current user : "$(id -n -u)

echo "expected user: "${ORA\_OWNER}

exit 50

fi

if [ ${global\_action:-"unknown"} = "unknown" ] ; then

echo "no action found on command line."

print\_usage

exit 99

elif [ ${global\_action:-"unknown"} = "start" ] ; then

echo "########################################"

test -f ${PROFILE\_FILE} && . ${PROFILE\_FILE} > /dev/null

if [ ${?} -eq 0 ] ; then

echo "working on profile: "${PROFILE\_FILE}

# listener need the LSNRNAME from .profile\_!

start\_listener ${ORA\_HOME} ${LSNRNAME}

fi

start\_database ${ORA\_HOME} ${ORA\_SID} ${ORA\_STARTMODE}

elif [ ${global\_action:-"unknown"} = "stop" ] ; then

echo "########################################"

echo "working on profile: "${PROFILE\_FILE}

test -f ${PROFILE\_FILE} && . ${PROFILE\_FILE} > /dev/null

stop\_database ${ORA\_HOME} ${ORA\_SID} ${global\_dbmode:-"immediate"}

test -f ${PROFILE\_FILE} && . ${PROFILE\_FILE} > /dev/null

if [ ${?} -eq 0 ] ; then

echo "working on profile: "${PROFILE\_FILE}

# listener need the LSNRNAME from .profile\_!

stop\_listener ${ORA\_HOME} ${LSNRNAME}

fi

else

echo "wrong action found on command line."

print\_usage

exit 99

fi

}

setenv $\*

if [[ ! -z "${SID}" ]] ; then

filter\_SID=${SID}

grep "^${filter\_SID}:" /etc/oratab > /dev/null 2>&1

if [ $? -ne 0 ] ; then

echo "Could not find an SID in /etc/oratab for ${SID}"

print\_usage

fi

else

filter\_SID=".\*"

fi

for sidline in $(cat /etc/oratab | grep -v "^#" | grep "^${filter\_SID}:" ) ; do

echo "for ${sidline}"

do\_sidline ${sidline}

done

chmod 755 /usr/local/bin/manage\_oracle\_rdbms\_procs.sh

# Configure auto-startup service

vi /etc/systemd/system/oracle-rdbms.service

# /etc/systemd/system/oracle-rdbms.service

# Invoking Oracle scripts to start/shutdown Instances defined in /etc/oratab

# and starts Listener

[Unit]

Description=Oracle Database(s) and Listener

Requires=network.target

After=network.target

[Service]

Type=forking

Restart=no

ExecStart=/usr/local/bin/manage\_oracle\_rdbms\_procs.sh -a start

ExecStop=/usr/local/bin/manage\_oracle\_rdbms\_procs.sh -a stop

User=oracle

[Install]

WantedBy=multi-user.target

systemctl daemon-reload

systemctl enable oracle-rdbms

# Upgrade OPatch for Oracle Home

As user root

mv /u01/app/oracle/product/19.0.0/dbhome\_1/OPatch /u01/app/oracle/product/19.0.0/dbhome\_1/OPatch\_old

cp -r /u01/softs/OPatch/ /u01/app/oracle/product/19.0.0/dbhome\_1

chown -R oracle:oinstall /u01/app/oracle/product/19.0.0/dbhome\_1/OPatch

# Apply patch for Oracle Home

As root:

/u01/app/oracle/product/19.0.0/dbhome\_1/OPatch/opatchauto apply /u01/softs/oracle\_PSU/33803476/33806152 -oh /u01/app/oracle/product/19.0.0/dbhome\_1

/u01/app/oracle/product/19.0.0/dbhome\_1/OPatch/opatchauto apply /u01/softs/oracle\_PSU/33803476/33815596 -oh /u01/app/oracle/product/19.0.0/dbhome\_1

As oracle:

cd /u01/softs/oracle\_PSU/33808367

opatch apply -silent

# Edit template for db creation

Change all the followings to false:

* OMS
* SPATIAL
* IMEDIA
* ORACLE\_TEXT
* SAMPLE\_SCHEMA
* CWMLITE
* APEX
* DV

<DatabaseTemplate name="General Purpose" description=" " version="19.0.0.0.0">

<CommonAttributes>

<option name="OMS" value="false" includeInPDBs="false"/>

<option name="JSERVER" value="true" includeInPDBs="true"/>

<option name="SPATIAL" value="false" includeInPDBs="false"/>

<option name="IMEDIA" value="false" includeInPDBs="false"/>

<option name="ORACLE\_TEXT" value="false" includeInPDBs="false">

<tablespace id="SYSAUX"/>

</option>

<option name="SAMPLE\_SCHEMA" value="false" includeInPDBs="false"/>

<option name="CWMLITE" value="false" includeInPDBs="false">

<tablespace id="SYSAUX"/>

</option>

<option name="APEX" value="false" includeInPDBs="false"/>

<option name="DV" value="false" includeInPDBs="false"/>

</CommonAttributes>

Physical Standby stop here.

# Create response file

vi /u01/stage/dbca\_olab.rsp

##############################################################################

## ##

## DBCA response file ##

## ------------------ ##

## Copyright(c) Oracle Corporation 1998,2021. All rights reserved. ##

## ##

## Specify values for the variables listed below to customize ##

## your installation. ##

## ##

## Each variable is associated with a comment. The comment ##

## can help to populate the variables with the appropriate ##

## values. ##

## ##

## IMPORTANT NOTE: This file contains plain text passwords and ##

## should be secured to have read permission only by oracle user ##

## or db administrator who owns this installation. ##

##############################################################################

#-------------------------------------------------------------------------------

# Do not change the following system generated value.

#-------------------------------------------------------------------------------

responseFileVersion=/oracle/assistants/rspfmt\_dbca\_response\_schema\_v12.2.0

#-----------------------------------------------------------------------------

# Name : gdbName

# Datatype : String

# Description : Global database name of the database

# Valid values : <db\_name>.<db\_domain> - when database domain isn't NULL

# <db\_name> - when database domain is NULL

# Default value : None

# Mandatory : Yes

#-----------------------------------------------------------------------------

gdbName=olab.hcnet.vn

#-----------------------------------------------------------------------------

# Name : sid

# Datatype : String

# Description : System identifier (SID) of the database

# Valid values : Check Oracle12c Administrator's Guide

# Default value : <db\_name> specified in GDBNAME

# Mandatory : No

#-----------------------------------------------------------------------------

sid=olab

#-----------------------------------------------------------------------------

# Name : databaseConfigType

# Datatype : String

# Description : database conf type as Single Instance, Real Application Cluster or Real Application Cluster One Nodes database

# Valid values : SI\RAC\RACONENODE

# Default value : SI

# Mandatory : No

#-----------------------------------------------------------------------------

databaseConfigType=SI

#-----------------------------------------------------------------------------

# Name : RACOneNodeServiceName

# Datatype : String

# Description : Service is required by application to connect to RAC One

# Node Database

# Valid values : Service Name

# Default value : None

# Mandatory : No [required in case DATABASECONFTYPE is set to RACONENODE ]

#-----------------------------------------------------------------------------

#RACOneNodeServiceName =

#-----------------------------------------------------------------------------

# Name : policyManaged

# Datatype : Boolean

# Description : Set to true if Database is policy managed and

# set to false if Database is admin managed

# Valid values : TRUE\FALSE

# Default value : FALSE

# Mandatory : No

#-----------------------------------------------------------------------------

#policyManaged=false

#-----------------------------------------------------------------------------

# Name : createServerPool

# Datatype : Boolean

# Description : Set to true if new server pool need to be created for database

# if this option is specified then the newly created database

# will use this newly created serverpool.

# Multiple serverpoolname can not be specified for database

# Valid values : TRUE\FALSE

# Default value : FALSE

# Mandatory : No

#-----------------------------------------------------------------------------

#createServerPool=false

#-----------------------------------------------------------------------------

# Name : serverPoolName

# Datatype : String

# Description : Only one serverpool name need to be specified

# if Create Server Pool option is specified.

# Comma-separated list of Serverpool names if db need to use

# multiple Server pool

# Valid values : ServerPool name

# Default value : None

# Mandatory : No [required in case of RAC service centric database]

#-----------------------------------------------------------------------------

#serverPoolName=

#-----------------------------------------------------------------------------

# Name : cardinality

# Datatype : Number

# Description : Specify Cardinality for create server pool operation

# Valid values : any positive Integer value

# Default value : Number of qualified nodes on cluster

# Mandatory : No [Required when a new serverpool need to be created]

#-----------------------------------------------------------------------------

#cardinality=

#-----------------------------------------------------------------------------

# Name : force

# Datatype : Boolean

# Description : Set to true if new server pool need to be created by force

# if this option is specified then the newly created serverpool

# will be assigned server even if no free servers are available.

# This may affect already running database.

# This flag can be specified for Admin managed as well as policy managed dbh.

# Valid values : TRUE\FALSE

# Default value : FALSE

# Mandatory : No

#-----------------------------------------------------------------------------

#force=false

#-----------------------------------------------------------------------------

# Name : pqPoolName

# Datatype : String

# Description : Only one serverpool name needs to be specified

# if create server pool option is specified.

# Comma-separated list of serverpool names if use

# server pool. This is required to

# create Parallel Query (PQ) database. Applicable to Big Cluster

# Valid values : Parallel Query (PQ) pool name

# Default value : None

# Mandatory : No [required in case of RAC service centric database]

#-----------------------------------------------------------------------------

#pqPoolName=

#-----------------------------------------------------------------------------

# Name : pqCardinality

# Datatype : Number

# Description : Specify Cardinality for create server pool operation.

# Applicable to Big Cluster

# Valid values : any positive Integer value

# Default value : Number of qualified nodes on cluster

# Mandatory : No [Required when a new serverpool need to be created]

#-----------------------------------------------------------------------------

#pqCardinality=

#-----------------------------------------------------------------------------

# Name : createAsContainerDatabase

# Datatype : boolean

# Description : flag to create database as container database

# Valid values : Check Oracle12c Administrator's Guide

# Default value : false

# Mandatory : No

#-----------------------------------------------------------------------------

createAsContainerDatabase=False

#-----------------------------------------------------------------------------

# Name : numberOfPDBs

# Datatype : Number

# Description : Specify the number of pdb to be created

# Valid values : 0 to 252

# Default value : 0

# Mandatory : No

#-----------------------------------------------------------------------------

numberOfPDBs=

#-----------------------------------------------------------------------------

# Name : pdbName

# Datatype : String

# Description : Specify the pdbname/pdbanme prefix if one or more pdb need to be created

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : No

#-----------------------------------------------------------------------------

pdbName=

#-----------------------------------------------------------------------------

# Name : useLocalUndoForPDBs

# Datatype : boolean

# Description : Flag to create local undo tablespace for all PDB's.

# Valid values : TRUE\FALSE

# Default value : TRUE

# Mandatory : No

#-----------------------------------------------------------------------------

useLocalUndoForPDBs=True

#-----------------------------------------------------------------------------

# Name : pdbAdminPassword

# Datatype : String

# Description : PDB Administrator user password

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : No

#-----------------------------------------------------------------------------

pdbAdminPassword=Password1

#-----------------------------------------------------------------------------

# Name : nodelist

# Datatype : String

# Description : Comma-separated list of cluster nodes

# Valid values : Cluster node names

# Default value : None

# Mandatory : No (Yes for RAC database-centric database )

#-----------------------------------------------------------------------------

#NODELIST=

#-----------------------------------------------------------------------------

# Name : templateName

# Datatype : String

# Description : Name of the template

# Valid values : Template file name

# Default value : None

# Mandatory : Yes

#-----------------------------------------------------------------------------

templateName=General\_Purpose.dbc

#-----------------------------------------------------------------------------

# Name : sysPassword

# Datatype : String

# Description : Password for SYS user

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : Yes

#-----------------------------------------------------------------------------

sysPassword=Password1

#-----------------------------------------------------------------------------

# Name : systemPassword

# Datatype : String

# Description : Password for SYSTEM user

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : Yes

#-----------------------------------------------------------------------------

systemPassword=Password1

#-----------------------------------------------------------------------------

# Name : serviceUserPassword

# Datatype : String

# Description : Password for Windows Service user

# Default value : None

# Mandatory : If Oracle home is installed with windows service user

#-----------------------------------------------------------------------------

#serviceUserPassword=

#-----------------------------------------------------------------------------

# Name : emConfiguration

# Datatype : String

# Description : Enterprise Manager Configuration Type

# Valid values : CENTRAL|DBEXPRESS|BOTH|NONE

# Default value : NONE

# Mandatory : No

#-----------------------------------------------------------------------------

emConfiguration=NONE

#-----------------------------------------------------------------------------

# Name : emExpressPort

# Datatype : Number

# Description : Enterprise Manager Configuration Type

# Valid values : Check Oracle12c Administrator's Guide

# Default value : NONE

# Mandatory : No, will be picked up from DBEXPRESS\_HTTPS\_PORT env variable

# or auto generates a free port between 5500 and 5599

#-----------------------------------------------------------------------------

emExpressPort=5500

#-----------------------------------------------------------------------------

# Name : runCVUChecks

# Datatype : Boolean

# Description : Specify whether to run Cluster Verification Utility checks

# periodically in Cluster environment

# Valid values : TRUE\FALSE

# Default value : FALSE

# Mandatory : No

#-----------------------------------------------------------------------------

runCVUChecks=false

#-----------------------------------------------------------------------------

# Name : dbsnmpPassword

# Datatype : String

# Description : Password for DBSNMP user

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : Yes, if emConfiguration is specified or

# the value of runCVUChecks is TRUE

#-----------------------------------------------------------------------------

dbsnmpPassword=Password1

#-----------------------------------------------------------------------------

# Name : omsHost

# Datatype : String

# Description : EM management server host name

# Default value : None

# Mandatory : Yes, if CENTRAL is specified for emConfiguration

#-----------------------------------------------------------------------------

omsHost=

#-----------------------------------------------------------------------------

# Name : omsPort

# Datatype : Number

# Description : EM management server port number

# Default value : None

# Mandatory : Yes, if CENTRAL is specified for emConfiguration

#-----------------------------------------------------------------------------

omsPort=0

#-----------------------------------------------------------------------------

# Name : emUser

# Datatype : String

# Description : EM Admin username to add or modify targets

# Default value : None

# Mandatory : Yes, if CENTRAL is specified for emConfiguration

#-----------------------------------------------------------------------------

emUser=

#-----------------------------------------------------------------------------

# Name : emPassword

# Datatype : String

# Description : EM Admin user password

# Default value : None

# Mandatory : Yes, if CENTRAL is specified for emConfiguration

#-----------------------------------------------------------------------------

emPassword=

#-----------------------------------------------------------------------------

# Name : dvConfiguration

# Datatype : Boolean

# Description : Specify "True" to configure and enable Oracle Database vault

# Valid values : True/False

# Default value : False

# Mandatory : No

#-----------------------------------------------------------------------------

dvConfiguration=false

#-----------------------------------------------------------------------------

# Name : dvUserName

# Datatype : String

# Description : DataVault Owner

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : Yes, if DataVault option is chosen

#-----------------------------------------------------------------------------

dvUserName=

#-----------------------------------------------------------------------------

# Name : dvUserPassword

# Datatype : String

# Description : Password for DataVault Owner

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : Yes, if DataVault option is chosen

#-----------------------------------------------------------------------------

dvUserPassword=

#-----------------------------------------------------------------------------

# Name : dvAccountManagerName

# Datatype : String

# Description : DataVault Account Manager

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : No

#-----------------------------------------------------------------------------

dvAccountManagerName=

#-----------------------------------------------------------------------------

# Name : dvAccountManagerPassword

# Datatype : String

# Description : Password for DataVault Account Manager

# Valid values : Check Oracle12c Administrator's Guide

# Default value : None

# Mandatory : No

#-----------------------------------------------------------------------------

dvAccountManagerPassword=

#-----------------------------------------------------------------------------

# Name : olsConfiguration

# Datatype : Boolean

# Description : Specify "True" to configure and enable Oracle Label Security

# Valid values : True/False

# Default value : False

# Mandatory : No

#-----------------------------------------------------------------------------

olsConfiguration=false

#-----------------------------------------------------------------------------

# Name : datafileJarLocation

# Datatype : String

# Description : Location of the data file jar

# Valid values : Directory containing compressed datafile jar

# Default value : None

# Mandatory : No

#-----------------------------------------------------------------------------

datafileJarLocation={ORACLE\_HOME}/assistants/dbca/templates/

#-----------------------------------------------------------------------------

# Name : datafileDestination

# Datatype : String

# Description : Location of the data file's

# Valid values : Directory for all the database files

# Default value : $ORACLE\_BASE/oradata

# Mandatory : No

#-----------------------------------------------------------------------------

datafileDestination=+ASMDISK

#-----------------------------------------------------------------------------

# Name : recoveryAreaDestination

# Datatype : String

# Description : Location of the data file's

# Valid values : Recovery Area location

# Default value : $ORACLE\_BASE/flash\_recovery\_area

# Mandatory : No

#-----------------------------------------------------------------------------

recoveryAreaDestination=+ASMDISK

#-----------------------------------------------------------------------------

# Name : storageType

# Datatype : String

# Description : Specifies the storage on which the database is to be created

# Valid values : FS (CFS for RAC), ASM

# Default value : FS

# Mandatory : No

#-----------------------------------------------------------------------------

storageType=ASM

#-----------------------------------------------------------------------------

# Name : diskGroupName

# Datatype : String

# Description : Specifies the disk group name for the storage

# Default value : DATA

# Mandatory : No

#-----------------------------------------------------------------------------

diskGroupName=+ASMDISK

#-----------------------------------------------------------------------------

# Name : asmsnmpPassword

# Datatype : String

# Description : Password for ASM Monitoring

# Default value : None

# Mandatory : No

#-----------------------------------------------------------------------------

asmsnmpPassword=Password1

#-----------------------------------------------------------------------------

# Name : recoveryGroupName

# Datatype : String

# Description : Specifies the disk group name for the recovery area

# Default value : RECOVERY

# Mandatory : No

#-----------------------------------------------------------------------------

recoveryGroupName=+ASMDISK

#-----------------------------------------------------------------------------

# Name : characterSet

# Datatype : String

# Description : Character set of the database

# Valid values : Check Oracle12c National Language Support Guide

# Default value : "US7ASCII"

# Mandatory : NO

#-----------------------------------------------------------------------------

characterSet=AL32UTF8

#-----------------------------------------------------------------------------

# Name : nationalCharacterSet

# Datatype : String

# Description : National Character set of the database

# Valid values : "UTF8" or "AL16UTF16". For details, check Oracle12c National Language Support Guide

# Default value : "AL16UTF16"

# Mandatory : No

#-----------------------------------------------------------------------------

nationalCharacterSet=AL16UTF16

#-----------------------------------------------------------------------------

# Name : registerWithDirService

# Datatype : Boolean

# Description : Specifies whether to register with Directory Service.

# Valid values : TRUE \ FALSE

# Default value : FALSE

# Mandatory : No

#-----------------------------------------------------------------------------

registerWithDirService=false

#-----------------------------------------------------------------------------

# Name : dirServiceUserName

# Datatype : String

# Description : Specifies the name of the directory service user

# Mandatory : YES, if the value of registerWithDirService is TRUE

#-----------------------------------------------------------------------------

dirServiceUserName=

#-----------------------------------------------------------------------------

# Name : dirServicePassword

# Datatype : String

# Description : The password of the directory service user.

# You can also specify the password at the command prompt instead of here.

# Mandatory : YES, if the value of registerWithDirService is TRUE

#-----------------------------------------------------------------------------

dirServicePassword=

#-----------------------------------------------------------------------------

# Name : walletPassword

# Datatype : String

# Description : The password for wallet to created or modified.

# You can also specify the password at the command prompt instead of here.

# Mandatory : YES, if the value of registerWithDirService is TRUE

#-----------------------------------------------------------------------------

walletPassword=

#-----------------------------------------------------------------------------

# Name : listeners

# Datatype : String

# Description : Specifies list of listeners to register the database with.

# By default the database is configured for all the listeners specified in the

# $ORACLE\_HOME/network/admin/listener.ora

# Valid values : The list should be comma separated like "listener1,listener2".

# Mandatory : NO

#-----------------------------------------------------------------------------

listeners=

#-----------------------------------------------------------------------------

# Name : variablesFile

# Datatype : String

# Description : Location of the file containing variable value pair

# Valid values : A valid file-system file. The variable value pair format in this file

# is <variable>=<value>. Each pair should be in a new line.

# Default value : None

# Mandatory : NO

#-----------------------------------------------------------------------------

variablesFile=

#-----------------------------------------------------------------------------

# Name : variables

# Datatype : String

# Description : comma separated list of name=value pairs. Overrides variables defined in variablefile and templates

# Default value : None

# Mandatory : NO

#-----------------------------------------------------------------------------

#variables=DB\_UNIQUE\_NAME=asmdb,ORACLE\_BASE=/u01/app/oracle,PDB\_NAME=,DB\_NAME=asmdb,ORACLE\_HOME=/u01/app/oracle/12.2.0.1/db1,SID=asmdb

#-----------------------------------------------------------------------------

# Name : initParams

# Datatype : String

# Description : comma separated list of name=value pairs. Overrides initialization parameters defined in templates

# Default value : None

# Mandatory : NO

#-----------------------------------------------------------------------------

#initParams={ init\_params\_list }}

#-----------------------------------------------------------------------------

# Name : sampleSchema

# Datatype : Boolean

# Description : Specifies whether or not to add the Sample Schemas to your database

# Valid values : TRUE \ FALSE

# Default value : FASLE

# Mandatory : No

#-----------------------------------------------------------------------------

sampleSchema=false

#-----------------------------------------------------------------------------

# Name : memoryPercentage

# Datatype : String

# Description : percentage of physical memory for Oracle

# Default value : None

# Mandatory : NO

#-----------------------------------------------------------------------------

#memoryPercentage =

#-----------------------------------------------------------------------------

# Name : databaseType

# Datatype : String

# Description : used for memory distribution when memoryPercentage specified

# Valid values : MULTIPURPOSE|DATA\_WAREHOUSING|OLTP

# Default value : MULTIPURPOSE

# Mandatory : NO

#-----------------------------------------------------------------------------

databaseType=MULTIPURPOSE

#-----------------------------------------------------------------------------

# Name : automaticMemoryManagement

# Datatype : Boolean

# Description : flag to indicate Automatic Memory Management is used

# Valid values : TRUE/FALSE

# Default value : TRUE

# Mandatory : NO

#-----------------------------------------------------------------------------

automaticMemoryManagement=false

#-----------------------------------------------------------------------------

# Name : totalMemory

# Datatype : String

# Description : total memory in MB to allocate to Oracle

# Valid values :

# Default value :

# Mandatory : NO

#-----------------------------------------------------------------------------

totalMemory=0

# Create Database

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/dbca -createDatabase -silent -responseFile '/u01/stage/dbca\_olab.rsp' -initParams processes=500,pga\_aggregate\_target=1GB,sga\_target=2GB,log\_archive\_format='%t\_%s\_%r.dbf',audit\_trail='db,extended',remote\_login\_passwordfile='EXCLUSIVE',open\_cursors=50,db\_create\_online\_log\_dest\_1='+ASMDISK',log\_archive\_dest\_1='LOCATION=+ASMDISK',db\_recovery\_file\_dest='+ASMDISK',db\_recovery\_file\_dest\_size=9GB,db\_create\_file\_dest='+ASMDISK',\_parallel\_statement\_queuing=false -gdbName olab -systemPassword Password1 -sysPassword Password1 -dbsnmpPassword Password1

# Setup autostart

olab:/u01/app/oracle/product/19.0.0/dbhome\_1:N

# Setup log rotate

vi /etc/logrotate.d/oracle

/u01/app/oracle/diag/rdbms/\*/\*/trace/\*.log {

weekly

compress

rotate 9

missingok

copytruncate

}

/u01/app/oracle/product/\*/\*/network/log/\*.log {

yearly

compress

rotate 9

missingok

copytruncate

}

/u01/app/agent/\*/sysman/log/\*.log {

monthly

compress

rotate 9

missingok

copytruncate

}

/home/oracle/bin/purge\_trace.log {

monthly

compress

rotate 9

missingok

copytruncate

}

vi /home/oracle/bin/oracle\_cleanup.sh

#!/bin/bash

#

# Ansible managed

#

# DO NOT EDIT THIS FILE!

#

# This file is under control of ansible-oracle.

#

# Please configure the -mtime with oracle\_cleanup\_days and oracle\_trace\_cleanup\_days in Ansible

# Remove Auditfiles from Filesystem

for audit in /u01/app/oracle/admin/\*/adump /u01/app/19.0.0/grid/rdbms/audit

do

find ${audit} -name "\*.aud" -type f -mtime +14 -delete 2>/dev/null

find ${audit} -name "\*.xml" -type f -mtime +14 -delete 2>/dev/null

done

# Remove all xml-Files from ADR

# We ignore, that individual cleanups are existing in ADR

find /u01/app/oracle/diag/rdbms/\*/\*/alert -name "\*.xml" -type f -mtime +14 -delete 2>/dev/null

find /u01/app/oracle/diag/asm/\*/\*/alert -name "\*.xml" -type f -mtime +14 -delete 2>/dev/null

# Remove Tracefiles from ADR

# We ignore a possible policy in ADR

find /u01/app/oracle/diag/rdbms/\*/\*/trace -name "\*.tr?" -type f -mtime +7 -delete 2>/dev/null

find /u01/app/oracle/diag/asm/\*/\*/trace -name "\*.tr?" -type f -mtime +7 -delete 2>/dev/null

#

find /u01/app/oracle/diag/tnslsnr/\*/\*/alert -name "\*.xml" -type f -mtime +14 -delete 2>/dev/null

vi /home/oracle/bin/rotate\_tmp.sh

#!/bin/bash

log\_file="/home/oracle/bin/rotate\_tmp.log"

cd /tmp/

echo "--------------------------------------------" >> $log\_file

echo `date` >> $log\_file

find . -type f -name "check\_logfiles.\*" -mtime +2 -exec rm -rf {} +

echo "Complete remove check\_logfiles.\* file at $(date)" >> $log\_file

find . -type f -name "ora-alert.\*" -mtime +2 -exec rm -rf {} +

echo "Complete remove ora-alert.\* file at $(date)" >> $log\_file

find . -type d -empty -mtime +2 -delete

echo "Complete Compress & Cleanup Folder empty at $(date)" >> $log\_file

vi /etc/logrotate.d/grid

/u01/app/19.0.0/grid/log/diag/\*/\*/\*/trace/\*.log {

monthly

compress

rotate 9

missingok

copytruncate

}

/u01/app/grid/diag/asm/\*/\*/trace/\*.log {

monthly

compress

rotate 9

missingok

copytruncate

}

/u01/app/19.0.0/grid/log/\*/cssd/\*.log {

monthly

compress

rotate 9

missingok

copytruncate

}

/home/grid/bin/\*.log {

monthly

compress

rotate 9

missingok

copytruncate

}

/u01/app/grid/diag/tnslsnr/\*/listener/trace/\*.log {

monthly

compress

rotate 9

missingok

copytruncate

}

# Setup crontab

root

#Ansible: drop\_caches job

45 12,21 \* \* \* sync; echo 3 > /proc/sys/vm/drop\_caches

#Ansible: rotate /tmp/

0 5 \* \* \* /home/oracle/bin/rotate\_tmp.sh > /dev/null 2>&1

Oracle

#Ansible: clean-up job

15 16 \* \* \* /home/oracle/bin/oracle\_cleanup.sh 14 14 >> /home/oracle/bin/oracle\_cleanup.log 2>&1

# Create function

vi /u01/stage/f\_verify\_pwd.fnc

CREATE OR REPLACE NONEDITIONABLE FUNCTION f\_verify\_pwd

(username varchar2,

password varchar2,

old\_password varchar2)

RETURN boolean IS

-- $Revision: 12764 $

n boolean;

m integer;

differ integer;

isdigit boolean;

ischar boolean;

ispunct boolean;

digitarray varchar2(20);

punctarray varchar2(25);

chararray varchar2(52);

passwd\_dict number;

dbname varchar2(8);

inst varchar2(8);

l\_cstr VARCHAR2(1000);

l\_nstr VARCHAR2(1000);

l\_len NUMBER(10);

l\_c CHAR(1);

l\_ncount NUMBER;

BEGIN

digitarray:= '0123456789';

chararray:= 'abcdefghijklmnopqrstuvwxyzABCDEFGHIJKLMNOPQRSTUVWXYZ';

l\_cstr := password;

-- Check if the password is same as the username

IF NLS\_LOWER(password) = NLS\_LOWER(username) THEN

raise\_application\_error(-20000, 'Password verification failed - password cannot be the same as username.');

END IF;

-- Check for the minimum length of the password

IF length(password) < 18 THEN

raise\_application\_error(-20000, 'Password verification failed - password must have at least 18 characters.');

END IF;

-- zjisti zda se username vyskytuje v hesle

IF INSTR( NLS\_LOWER(password), NLS\_LOWER(username) ) != 0 THEN

raise\_application\_error(-20000, 'Password verification failed - password cannot contain username.');

END IF;

-- zjisti zda se db name vyskytuje v hesle

select name into dbname from v$database;

IF INSTR( NLS\_LOWER(password), NLS\_LOWER(dbname) ) != 0 THEN

raise\_application\_error(-20000, 'Password verification failed - password cannot contain db name.');

END IF;

-- Check if the password contains at least one letter, one digit and one

-- punctuation mark.

-- 1. Check for the digit

isdigit:=FALSE;

m := length(password);

FOR i IN 1..10 LOOP

FOR j IN 1..m LOOP

IF substr(password,j,1) = substr(digitarray,i,1) THEN

isdigit:=TRUE;

GOTO findchar;

END IF;

END LOOP;

END LOOP;

IF isdigit = FALSE THEN

raise\_application\_error(-20000, 'Password verification failed - password must contain at least one digit.');

END IF;

-- 2. Check for the character

<<findchar>>

ischar:=FALSE;

FOR i IN 1..length(chararray) LOOP

FOR j IN 1..m LOOP

IF substr(password,j,1) = substr(chararray,i,1) THEN

ischar:=TRUE;

GOTO endsearch;

END IF;

END LOOP;

END LOOP;

IF ischar = FALSE THEN

raise\_application\_error(-20000, 'Password verification failed - password must contain at least one letter.');

END IF;

<<endsearch>>

-- Check if the password differs from the previous password by at least

-- 3 letters

IF old\_password IS NOT NULL THEN

differ := length(old\_password) - length(password);

IF abs(differ) < 3 THEN

IF length(password) < length(old\_password) THEN

m := length(password);

ELSE

m := length(old\_password);

END IF;

differ := abs(differ);

FOR i IN 1..m LOOP

IF substr(password,i,1) != substr(old\_password,i,1) THEN

differ := differ + 1;

END IF;

END LOOP;

IF differ < 3 THEN

raise\_application\_error(-20000, 'Password verification failed - password must differ from the previous one by at least 3 letters.');

END IF;

END IF;

END IF;

-- check that one character does not repeate more than 4 times

l\_cstr := UPPER(l\_cstr);

l\_len := LENGTH(l\_cstr);

WHILE l\_len > 0 LOOP

l\_c := SUBSTR(l\_cstr, 1, 1);

l\_nstr := REPLACE(l\_cstr, l\_c, NULL);

l\_ncount := LENGTH(l\_cstr) - NVL(LENGTH(l\_nstr),0);

IF l\_ncount > 0 AND l\_c <> ' ' THEN

IF l\_ncount > 4 THEN

raise\_application\_error(-20000, 'Password verification failed - password cannot contain one character more than 4 times.');

END IF;

END IF;

l\_len := LENGTH(l\_nstr);

l\_cstr := l\_nstr;

END LOOP;

-- Everything is fine; return TRUE ;

RETURN(TRUE);

END;

Run with sys

SQL> @f\_verify\_pwd.fnc;

/

Grant permission

grant execute,debug on SYS.F\_VERIFY\_PWD to system;

Unlock sysdg

alter user sysdg identified by Password1 account unlock;

Set timezone

ALTER DATABASE SET TIME\_ZONE = '+07:00';

vi /u01/stage/ scheduler\_attribute.sql

BEGIN

DBMS\_SCHEDULER.set\_scheduler\_attribute('email\_server', 'smtp-int.vn.prod');

DBMS\_SCHEDULER.set\_scheduler\_attribute('email\_sender', 'no\_reply@homecredit.vn');

DBMS\_SCHEDULER.set\_scheduler\_attribute('default\_timezone','Asia/Saigon');

END;

/

Execute scheduler\_attribute.sql

@scheduler\_attribute.sql;

# Create profile

Monitoring

CREATE PROFILE monitoring

LIMIT sessions\_per\_user 10

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time 10

idle\_time unlimited

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts unlimited

password\_life\_time unlimited

password\_reuse\_time unlimited

password\_reuse\_max unlimited

password\_lock\_time unlimited

password\_grace\_time unlimited

password\_verify\_function f\_verify\_pwd;

System

CREATE PROFILE system

LIMIT sessions\_per\_user unlimited

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time unlimited

idle\_time 15

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts unlimited

password\_life\_time unlimited

password\_reuse\_time unlimited

password\_reuse\_max unlimited

password\_lock\_time unlimited

password\_grace\_time unlimited

password\_verify\_function f\_verify\_pwd;

Interface

CREATE PROFILE interface

LIMIT sessions\_per\_user unlimited

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time unlimited

idle\_time unlimited

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts unlimited

password\_life\_time unlimited

password\_reuse\_time unlimited

password\_reuse\_max unlimited

password\_lock\_time unlimited

password\_grace\_time unlimited

password\_verify\_function f\_verify\_pwd;

CREATE PROFILE interfaceext

LIMIT sessions\_per\_user 5

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time unlimited

idle\_time unlimited

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts unlimited

password\_life\_time unlimited

password\_reuse\_time unlimited

password\_reuse\_max unlimited

password\_lock\_time unlimited

password\_grace\_time unlimited

password\_verify\_function f\_verify\_pwd;

CREATE PROFILE usersdba

LIMIT sessions\_per\_user 10

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time unlimited

idle\_time 15

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts 5

password\_life\_time 90

password\_reuse\_time 365

password\_reuse\_max 10

password\_lock\_time .0207

password\_grace\_time 7

password\_verify\_function f\_verify\_pwd;

CREATE PROFILE usersext

LIMIT sessions\_per\_user 10

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time unlimited

idle\_time 15

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts 5

password\_life\_time 90

password\_reuse\_time 365

password\_reuse\_max 10

password\_lock\_time .0207

password\_grace\_time 7

password\_verify\_function f\_verify\_pwd;

CREATE PROFILE pr4qradar

LIMIT sessions\_per\_user 3

cpu\_per\_session unlimited

cpu\_per\_call unlimited

connect\_time 10

idle\_time unlimited

logical\_reads\_per\_session unlimited

logical\_reads\_per\_call unlimited

composite\_limit unlimited

private\_sga unlimited

failed\_login\_attempts unlimited

password\_life\_time unlimited

password\_reuse\_time unlimited

password\_reuse\_max unlimited

password\_lock\_time unlimited

password\_grace\_time unlimited

password\_verify\_function f\_verify\_pwd;

CREATE PROFILE qualys\_profile

LIMIT sessions\_per\_user 3

failed\_login\_attempts 3

password\_life\_time unlimited

password\_grace\_time 10

password\_verify\_function f\_verify\_pwd;

# Setup roles

As sysdba

create role application\_role;

create role qualys\_role;

create role IT\_APP\_SUPPORT\_UPDATE;

create role IT\_APP\_SUPPORT\_SELECT;

create role IT\_APP\_SUPPORT\_INSERT;

create role IT\_APP\_SUPPORT\_EXECUTE;

create role IT\_APP\_SUPPORT\_DELETE;

create role IT\_APP\_SUPPORT\_SCHEDULER\_JOB;

grant permission to role

grant connect,resource,create job,create materialized view,create procedure,create sequence,create session,create synonym,create table,create trigger,create type,create view to application\_role

grant select on SYS.GV\_$PARAMETER to qualys\_role;

grant select on SYS.GV\_$INSTANCE to qualys\_role;

grant select on SYS.DBA\_USERS to qualys\_role;

grant select on SYS.DBA\_PROFILES to qualys\_role;

grant select on SYS.DBA\_TS\_QUOTAS to qualys\_role;

grant select on SYS.DBA\_SYS\_PRIVS to qualys\_role;

grant select on SYS.DBA\_TAB\_PRIVS to qualys\_role;

grant select on SYS.DBA\_ROLES to qualys\_role;

grant select on SYS.DBA\_ROLE\_PRIVS to qualys\_role;

grant select on SYS.PROXY\_USERS to qualys\_role;

grant select on SYS.DBA\_ROLLBACK\_SEGS to qualys\_role;

grant select on SYS.V\_$LOG to qualys\_role;

grant select on SYS.V\_$LOGFILE to qualys\_role;

grant select on SYS.DBA\_STMT\_AUDIT\_OPTS to qualys\_role;

grant select on SYS.DBA\_PRIV\_AUDIT\_OPTS to qualys\_role;

grant select on SYS.DBA\_OBJ\_AUDIT\_OPTS to qualys\_role;

grant select on SYS.GV\_$DATABASE to qualys\_role;

grant select on SYS.DBA\_COL\_PRIVS to qualys\_role;

grant select on SYS.REGISTRY$HISTORY to qualys\_role;

grant select on SYS.DBA\_TABLES to qualys\_role;

grant select on SYS.LINK$ to qualys\_role;

grant select on SYS.V\_$ARCHIVE\_DEST to qualys\_role;

grant select on SYS.V\_$CONTROLFILE to qualys\_role;

grant select on SYS.DBA\_DATA\_FILES to qualys\_role;

grant select on SYS.DBA\_POLICIES to qualys\_role;

grant select on SYS.DBA\_FGA\_AUDIT\_TRAIL to qualys\_role;

grant select on SYS.DBA\_VIEWS to qualys\_role;

grant select on SYS.V\_$PARAMETER to qualys\_role;

grant select on SYS.V\_$DBLINK to qualys\_role;

grant select on SYS.AUDIT\_UNIFIED\_POLICIES to qualys\_role;

grant select on SYS.AUDIT\_UNIFIED\_ENABLED\_POLICIES to qualys\_role;

grant select on SYS.DBA\_DB\_LINKS to qualys\_role;

grant select on SYS.REGISTRY$SQLPATCH to qualys\_role;

grant select on SYS.USER\_TAB\_COLUMNS to qualys\_role;

grant select on SYS.DBA\_REGISTRY\_SQLPATCH to qualys\_role;

grant select on SYS.GV\_$VERSION to qualys\_role;

grant select on SYS.DBA\_PROCEDURES to qualys\_role;

grant select on SYS.GV\_$INSTANCE to qualys\_role;

grant select on SYS.DBA\_AUDIT\_TRAIL to qualys\_role;

# Create and start Service

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/srvctl add service -d olab -service OLAB.HCNET.VN

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/srvctl add service -d olab -s OLAB\_APP\_DEFAULT.HCNET.VN [-r olab -a olab]

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/srvctl add service -d olab -s OLAB\_BACKUP.HCNET.VN [-r olab -a olab]

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/srvctl start service -d olab -service OLAB.HCNET.VN

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/srvctl start service -d olab -service OLAB\_APP\_DEFAULT.HCNET.VN

/u01/app/oracle/product/19.0.0/dbhome\_1/bin/srvctl start service -d olab -service OLAB\_BACKUP.HCNET.VN

# Create tablespace

CREATE TABLESPACE audit\_data DATAFILE '+ASMDISK' size 1G autoextend on next 1G maxsize unlimited;

CREATE TABLESPACE tech\_data DATAFILE '+ASMDISK' size 100M autoextend on next 100M maxsize 1G;

# Create Users

create user phattt identified by Password\_123456789 default tablespace USERS temporary tablespace TEMP profile USERSDBA;

create user QRADAR identified by Password\_123456789 default tablespace USERS quota 50m on USERS temporary tablespace TEMP profile PR4QRADAR;

create user QUALYS\_SCAN identified by Password\_123456789 default tablespace USERS quota 50m on USERS temporary tablespace TEMP profile QUALYS\_PROFILE;

grant dba,connect,resource to phattt;

grant execute,debug on SYS.F\_VERIFY\_PWD to phattt;

grant connect,resource,select any dictionary to QRADAR;

grant select on sys.dba\_audit\_trail to QRADAR;

grant qualys\_role to QUALYS\_SCAN;

# Create view

As sysdba

CREATE OR REPLACE VIEW HCI\_ALERTLOG\_VIEW AS (SELECT ADDR,INDX,INST\_ID,ORIGINATING\_TIMESTAMP,NORMALIZED\_TIMESTAMP,ORGANIZATION\_ID,COMPONENT\_ID,HOST\_ID,HOST\_ADDRESS,MESSAGE\_TYPE,MESSAGE\_LEVEL,MESSAGE\_ID,MESSAGE\_GROUP,CLIENT\_ID,MODULE\_ID,PROCESS\_ID,THREAD\_ID,USER\_ID,INSTANCE\_ID,DETAILED\_LOCATION,PROBLEM\_KEY,UPSTREAM\_COMP\_ID,DOWNSTREAM\_COMP\_ID,EXECUTION\_CONTEXT\_ID,EXECUTION\_CONTEXT\_SEQUENCE,ERROR\_INSTANCE\_ID,ERROR\_INSTANCE\_SEQUENCE,VERSION,MESSAGE\_TEXT,MESSAGE\_ARGUMENTS,SUPPLEMENTAL\_ATTRIBUTES,SUPPLEMENTAL\_DETAILS,PARTITION,RECORD\_ID FROM sys.x$dbgalertext);

CREATE OR REPLACE VIEW V\_HCI\_SESSION\_COUNT AS (SELECT COUNT(\*) session\_count FROM x$ksuse WHERE bitand(ksspaflg,1) !=0)

# Create script

vi /u01/stage/jobmonitor\_object.sh



vi /u01/stage/nagios\_object.sh



vi /u01/stage/ora\_masking.sh



# Create User for script

create user DBADMIN identified by Password\_123456789 default tablespace AUDIT\_DATA temporary tablespace TEMP profile SYSTEM;

create user JOBMONITOR identified by Password\_123456789 default tablespace AUDIT\_DATA temporary tablespace TEMP profile MONITORING;

create user NAGIOS identified by Password\_123456789 default tablespace AUDIT\_DATA temporary tablespace TEMP profile MONITORING;

grant dba,connect,resource,create type,create trigger,create table,create session,create procedure,select\_catalog\_role,unlimited tablespace to DBADMIN;

grant select,delete on SYS.AUD$ to DBADMIN;

grant select on SYS.DBA\_DIRECTORIES to DBADMIN;

grant select on SYS.DBA\_EXTERNAL\_TABLES to DBADMIN;

grant select on SYS.DBA\_IND\_PARTITIONS to DBADMIN;

grant select on SYS.DBA\_OBJECTS to DBADMIN;

grant select on SYS.DBA\_QUEUES to DBADMIN;

grant select on SYS.DBA\_ROLES to DBADMIN;

grant select on SYS.DBA\_SQL\_PLAN\_BASELINES to DBADMIN;

grant select on SYS.DBA\_TABLES to DBADMIN;

grant select on SYS.DBA\_TAB\_PRIVS to DBADMIN;

grant select on SYS.DBA\_USERS to DBADMIN;

grant select on SYS.DBMS\_WORKLOAD\_REPOSITORY to DBADMIN;

grant select on SYS.GV\_$DATABASE to DBADMIN;

grant select on SYS.GV\_$SQLSTATS to DBADMIN;

grant execute on SYS.UTL\_RECOMP to DBADMIN;

grant select on SYS.UTL\_SMTP to DBADMIN;

grant select on SYS.GV\_$PARAMETER to DBADMIN;

grant select on SYS.WRH$\_SQLSTAT to DBADMIN;

grant select on SYS.WRM$\_SNAPSHOT to DBADMIN;

grant select on SYS.GV\_$SESSION to DBADMIN;

grant select on sys.dba\_stored\_settings to DBADMIN;

grant select on sys.dba\_constraints to DBADMIN;

grant select on sys.dba\_triggers to DBADMIN;

grant select on sys.dba\_indexes to DBADMIN;

grant select on sys.dba\_ind\_columns to DBADMIN;

grant select on sys.ind$ to DBADMIN;

grant select on sys.object\_usage to DBADMIN;

grant select on sys.dba\_segments to DBADMIN;

grant select on SYS.DBA\_ROLE\_PRIVS to DBADMIN;

grant select on sys.dba\_dependencies to DBADMIN;

grant select on sys.dba\_source to DBADMIN;

grant select on SYS.DBA\_JOBS to DBADMIN;

grant select on sys.dba\_scheduler\_jobs to DBADMIN;

grant select on SYS.DBA\_TABLES to DBADMIN;

grant select on sys.dba\_tablespaces to DBADMIN;

grant select on SYS.DBA\_SCHEDULER\_JOB\_CLASSES to DBADMIN;

grant select on sys.v\_$database to DBADMIN;

grant select on sys.dba\_tab\_partitions to DBADMIN;

grant select on sys.gv\_$services to DBADMIN;

grant select on sys.v\_$session to DBADMIN;

grant select on sys.v\_$parameter to DBADMIN;

grant select on sys.dba\_snapshot\_logs to DBADMIN;

grant select on sys.dba\_internal\_triggers to DBADMIN;

grant select on sys.dba\_plsql\_object\_settings to DBADMIN;

grant select on SYS.GV\_$INSTANCE to DBADMIN;

grant select on sys.dba\_sys\_privs to DBADMIN;

grant select on sys.dba\_ind\_subpartitions to DBADMIN;

grant select on sys.DBA\_TAB\_STATISTICS to DBADMIN;

grant select on sys.v\_$sql to DBADMIN;

grant select on sys.v\_$active\_session\_history to DBADMIN;

grant select on v\_$osstat to DBADMIN;

grant select on sys.dba\_sequences to DBADMIN;

grant select on sys.v\_$instance to DBADMIN;

grant select on sys.dba\_data\_files to DBADMIN;

grant select on sys.dba\_free\_space to DBADMIN;

grant select on nagios.d\_metrics to DBADMIN;

grant select on nagios.d\_thresholds to DBADMIN;

grant select on v\_$datafile to DBADMIN;

grant select on v\_$asm\_diskgroup to DBADMIN;

grant select on sys.dba\_lobs to DBADMIN;

grant select on sys.dba\_temp\_files to DBADMIN;

grant select on sys.v\_$archived\_log to DBADMIN;

grant select on sys.v\_$log to DBADMIN;

grant select on sys.v\_$controlfile to DBADMIN;

grant connect,resource,unlimited tablespace to JOBMONITOR;

grant select on SYS.DBA\_JOBS to JOBMONITOR;

grant select on SYS.DBA\_SCHEDULER\_CHAINS to JOBMONITOR;

grant select on SYS.DBA\_SCHEDULER\_CHAIN\_STEPS to JOBMONITOR;

grant select on SYS.DBA\_SCHEDULER\_JOBS to JOBMONITOR;

grant select on SYS.DBA\_SCHEDULER\_JOB\_RUN\_DETAILS to JOBMONITOR;

grant select on SYS.DBA\_SCHEDULER\_PROGRAMS to JOBMONITOR;

grant select on SYS.DBA\_SCHEDULER\_RUNNING\_JOBS to JOBMONITOR;

grant select on SYS.DBA\_USERS to JOBMONITOR;

grant select on SYS.GV\_$LOCK to JOBMONITOR;

grant select on SYS.GV\_$SESSION to JOBMONITOR;

grant dba,connect,resource,create type,create trigger,create table,create session,create procedure,select\_catalog\_role,unlimited tablespace to NAGIOS;

grant select on SYS.AUD$ to NAGIOS;

grant select on SYS.DBA\_ADVISOR\_TASKS to NAGIOS;

grant select on SYS.DBA\_AUTOTASK\_OPERATION to NAGIOS;

grant select on SYS.DBA\_CUBES to NAGIOS;

grant select on SYS.DBA\_DATA\_FILES to NAGIOS;

grant select on SYS.DBA\_DB\_LINKS to NAGIOS;

grant select on SYS.DBA\_DEPENDENCIES to NAGIOS;

grant select on SYS.DBA\_DIRECTORIES to NAGIOS;

grant select on SYS.DBA\_ENCRYPTED\_COLUMNS to NAGIOS;

grant select on SYS.DBA\_EXTERNAL\_TABLES to NAGIOS;

grant select on SYS.DBA\_FEATURE\_USAGE\_STATISTICS to NAGIOS;

grant select on SYS.DBA\_FLASHBACK\_ARCHIVE to NAGIOS;

grant select on SYS.DBA\_FLASHBACK\_ARCHIVE\_TABLES to NAGIOS;

grant select on SYS.DBA\_FLASHBACK\_ARCHIVE\_TS to NAGIOS;

grant select on SYS.DBA\_FREE\_SPACE to NAGIOS;

grant select on SYS.DBA\_HIST\_WR\_CONTROL to NAGIOS;

grant select on SYS.DBA\_INDEXES to NAGIOS;

grant select on SYS.DBA\_IND\_PARTITIONS to NAGIOS;

grant select on SYS.DBA\_IND\_STATISTICS to NAGIOS;

grant select on SYS.DBA\_IND\_SUBPARTITIONS to NAGIOS;

grant select on SYS.DBA\_INTERNAL\_TRIGGERS to NAGIOS;

grant select on SYS.DBA\_JOBS to NAGIOS;

grant select on SYS.DBA\_JOBS\_RUNNING to NAGIOS;

grant select on SYS.DBA\_LOBS to NAGIOS;

grant select on SYS.DBA\_LOB\_PARTITIONS to NAGIOS;

grant select on SYS.DBA\_LOB\_SUBPARTITIONS to NAGIOS;

grant select on SYS.DBA\_MINING\_MODELS to NAGIOS;

grant select on SYS.DBA\_MVIEWS to NAGIOS;

grant select on SYS.DBA\_NETWORK\_ACLS to NAGIOS;

grant select on SYS.DBA\_NETWORK\_ACL\_PRIVILEGES to NAGIOS;

grant select on SYS.DBA\_OBJECTS to NAGIOS;

grant select on SYS.DBA\_OBJECT\_TABLES to NAGIOS;

grant select on SYS.DBA\_OBJ\_AUDIT\_OPTS to NAGIOS;

grant select on SYS.DBA\_PROFILES to NAGIOS;

grant select on SYS.DBA\_QUEUE\_TABLES to NAGIOS;

grant select on SYS.DBA\_REGISTERED\_SNAPSHOTS to NAGIOS;

grant select on SYS.DBA\_REGISTRY to NAGIOS;

grant select on SYS.DBA\_REGISTRY\_HISTORY to NAGIOS;

grant select on SYS.DBA\_ROLES to NAGIOS;

grant select on SYS.DBA\_ROLE\_PRIVS to NAGIOS;

grant select on SYS.DBA\_SCHEDULER\_JOBS to NAGIOS;

grant select on SYS.DBA\_SCHEDULER\_JOB\_CLASSES to NAGIOS;

grant select on SYS.DBA\_SCHEDULER\_JOB\_RUN\_DETAILS to NAGIOS;

grant select on SYS.DBA\_SCHEDULER\_RUNNING\_JOBS to NAGIOS;

grant select on SYS.DBA\_SCHEDULER\_WINDOWS to NAGIOS;

grant select on SYS.DBA\_SEGMENTS to NAGIOS;

grant select on SYS.DBA\_SERVICES to NAGIOS;

grant select on SYS.DBA\_SNAPSHOT\_LOGS to NAGIOS;

grant select on SYS.DBA\_SOURCE to NAGIOS;

grant select on SYS.DBA\_SQLSET to NAGIOS;

grant select on SYS.DBA\_SQLSET\_REFERENCES to NAGIOS;

grant select on SYS.DBA\_SQL\_PROFILES to NAGIOS;

grant select on SYS.DBA\_STMT\_AUDIT\_OPTS to NAGIOS;

grant select on SYS.DBA\_SYS\_PRIVS to NAGIOS;

grant select on SYS.DBA\_TABLES to NAGIOS;

grant select on SYS.DBA\_TABLESPACES to NAGIOS;

grant select on SYS.DBA\_TAB\_COLS to NAGIOS;

grant select on SYS.DBA\_TAB\_COLUMNS to NAGIOS;

grant select on SYS.DBA\_TAB\_MODIFICATIONS to NAGIOS;

grant select on SYS.DBA\_TAB\_PARTITIONS to NAGIOS;

grant select on SYS.DBA\_TAB\_PRIVS to NAGIOS;

grant select on SYS.DBA\_TAB\_STATISTICS to NAGIOS;

grant select on SYS.DBA\_TAB\_SUBPARTITIONS to NAGIOS;

grant select on SYS.DBA\_TEMP\_FILES to NAGIOS;

grant select on SYS.DBA\_TRIGGERS to NAGIOS;

grant select on SYS.DBA\_TS\_QUOTAS to NAGIOS;

grant select on SYS.DBA\_USERS to NAGIOS;

grant select on SYS.DBA\_VIEWS to NAGIOS;

grant execut on :SYS.DBMS\_CRYPTO to NAGIOS;

grant select on SYS.GLOBAL\_NAME to NAGIOS;

grant select on SYS.GV\_$DATABASE\_BLOCK\_CORRUPTION to NAGIOS;

grant select on SYS.GV\_$INSTANCE to NAGIOS;

grant select on SYS.GV\_$LOG to NAGIOS;

grant select on SYS.GV\_$OPTION to NAGIOS;

grant select on SYS.GV\_$RESOURCE\_LIMIT to NAGIOS;

grant select on SYS.GV\_$SESSION to NAGIOS;

grant select on SYS.GV\_$SESSION\_WAIT to NAGIOS;

grant select on SYS.GV\_$SORT\_SEGMENT to NAGIOS;

grant select on SYS.GV\_$TRANSACTION to NAGIOS;

grant select on SYS.HCI\_ALERTLOG\_VIEW to NAGIOS;

grant select on SYS.MODEL$ to NAGIOS;

grant select on SYS.REGISTRY$HISTORY to NAGIOS;

grant select on SYS.SYSTEM\_PRIVILEGE\_MAP to NAGIOS;

grant select on SYS.USER$ to NAGIOS;

grant select on SYS.V\_$ACTIVE\_SERVICES to NAGIOS;

grant select on SYS.V\_$ARCHIVED\_LOG to NAGIOS;

grant select on SYS.V\_$ARCHIVE\_DEST\_STATUS to NAGIOS;

grant select on SYS.V\_$BACKUP\_SET to NAGIOS;

grant select on SYS.V\_$BACKUP\_SET\_DETAILS to NAGIOS;

grant select on SYS.V\_$BLOCK\_CHANGE\_TRACKING to NAGIOS;

grant select on SYS.V\_$DATABASE to NAGIOS;

grant select on SYS.V\_$DATAFILE to NAGIOS;

grant select on SYS.V\_$DATAGUARD\_CONFIG to NAGIOS;

grant select on SYS.V\_$INSTANCE to NAGIOS;

grant select on SYS.V\_$LOG to NAGIOS;

grant select on SYS.V\_$OPTION to NAGIOS;

grant select on SYS.V\_$OSSTAT to NAGIOS;

grant select on SYS.V\_$PARAMETER to NAGIOS;

grant select on SYS.V\_$PGASTAT to NAGIOS;

grant select on SYS.V\_$PX\_SESSION to NAGIOS;

grant select on SYS.V\_$RECOVERY\_FILE\_DEST to NAGIOS;

grant select on SYS.V\_$RESOURCE\_LIMIT to NAGIOS;

grant select on SYS.V\_$RESTORE\_POINT to NAGIOS;

grant select on SYS.V\_$RMAN\_BACKUP\_JOB\_DETAILS to NAGIOS;

grant select on SYS.V\_$RMAN\_CONFIGURATION to NAGIOS;

grant select on SYS.V\_$SESSION to NAGIOS;

grant select on SYS.V\_$SQL\_SHARED\_CURSOR to NAGIOS;

grant select on SYS.V\_$TEMPFILE to NAGIOS;

grant select on SYS.V\_$VERSION to NAGIOS;

# Execute script

As user oracle with environment variables:

/u01/stage/nagios\_object.sh

/u01/stage/ora\_masking.sh

/u01/stage/jobmonitor\_object.sh

Utlmail package, use sqlplus as sysdba:

@/u01/app/oracle/product/19.0.0/dbhome\_1/rdbms/admin/utlmail.sql;

# Unzip Package dbadmin



cd /u01/stage

unzip dbadmin.zip

# Install dbadmin

Sqlplus as sysdba

@create\_dbadmin.sql;



@dbaadmin\_object.sql;



@trigger\_allow\_logon.sql;

# Recompile objects

As sysdba

@/u01/app/oracle/product/19.0.0/dbhome\_1/rdbms/admin/utlrp.sql;