

QUESTION NO: 1 CORRECT TEXT

Configure your Host Name, IP Address, Gateway and DNS.

Host name: station.domain40.example.com

/etc/sysconfig/network

hostname=abc.com

hostname abc.com

IP Address:172.24.40.40/24

Gateway172.24.40.1

DNS:172.24.40.1

Answer: # cd /etc/sysconfig/network-scripts/

ls

vim ifcfg-eth0 (Configure IP Address, Gateway and DNS) IPADDR=172.24.40.40

GATEWAY=172.24.40.1

DNS1=172.24.40.1

vim /etc/sysconfig/network

(Configure Host Name)

HOSTNAME= station.domain40.example.com

OR

Graphical Interfaces:

System->Preference->Network Connections (Configure IP Address, Gateway and DNS) Vim

/etc/sysconfig/network

(Configure Host Name)

QUESTION NO: 2 CORRECT TEXT

Add 3 users: harry, natasha, tom.

The requirements: The Additional group of the two users: harry, Natasha is the admin group. The user: tom's login shell should be non-interactive.

Answer: # useradd -G admin harry

useradd -G admin natasha

useradd -s /sbin/nologin tom

id harry;id Natasha (Show additional group)

cat /etc/passwd

(Show the login shell)

OR

```
# system-config-users
```

QUESTION NO: 3 CORRECT TEXT

Create a catalog under /home named admins. Its respective group is requested to be the admin group. The group users could read and write, while other users are not allowed to access it. The files created by users from the same group should also be the admin group.

```
Answer: # cd /home/  
# mkdir admins /  
# chown .admin admins/  
# chmod 770 admins/  
# chmod g+s admins/
```

QUESTION NO: 4 CORRECT TEXT

Configure a task: plan to run echo hello command at 14:23 every day.

```
Answer: # which echo  
# crontab -e  
23 14 * * * /bin/echo hello  
# crontab -l (Verify)
```

QUESTION NO: 5 CORRECT TEXT

Find the files owned by harry, and copy it to catalog: /opt/dir

```
Answer: # cd /opt/  
# mkdir dir  
# find / -user harry -exec cp -rpf {} /opt/dir/ \;
```

QUESTION NO: 6 CORRECT TEXT

Find the rows that contain abcde from file /etc/testfile, and write it to the file/tmp/testfile, and the sequence is requested as the same as /etc/testfile.

```
Answer: # cat /etc/testfile | while read line;
do
echo $line | grep abcde | tee -a /tmp/testfile
done
OR
grep `abcde` /etc/testfile > /tmp/testfile
```

QUESTION NO: 7 CORRECT TEXT

Create a 2G swap partition which take effect automatically at boot-start, and it should not affect the original swap partition.

```
Answer: # fdisk /dev/sda
p
(check Partition table)
n
(create new partition: press e to create extended partition, press p to create the main partition, and
theextended partition is further divided into logical partitions) Enter
+2G
t l
W
partx -a /dev/sda
partprobe
mkswap /dev/sda8
Copy UUID
swapon -a
vim /etc/fstab
UUID=XXXXXX swap swap defaults 0 0
(swapon -s)
```

QUESTION NO: 8 CORRECT TEXT

Create a user named alex, and the user id should be 1234, and the password should be alex111.

```
Answer: # useradd -u 1234 alex
# passwd alex
alex111
alex111
```

OR

```
echo alex111|passwd -stdin alex
```

QUESTION NO: 9 CORRECT TEXT

Install a FTP server, and request to anonymous download from /var/ftp/pub catalog. (it needs you to configure yum direct to the already existing file server.)

```
Answer: # cd /etc/yum.repos.d
# vim local.repo
[local]
name=local.repo
baseurl=file:///mnt
enabled=1
gpgcheck=0
# yum makecache
# yum install -y vsftpd
# service vsftpd restart
# chkconfig vsftpd on
# chkconfig --list vsftpd
# vim /etc/vsftpd/vsftpd.conf
anonymous_enable=YES
```

QUESTION NO: 10 CORRECT TEXT

Configure a HTTP server, which can be accessed through <http://station.domain40.example.com>.

Please download the released page from <http://ip/dir/example.html>.

```
Answer: # yum install -y httpd
# chkconfig httpd on
# cd /var/www/html
# wget http://ip/dir/example.html
# cp example.com index.html
# vim /etc/httpd/conf/httpd.conf
NameVirtualHost 192.168.0.254:80
<VirtualHost 192.168.0.254:80>
DocumentRoot /var/www/html/
ServerName station.domain40.example.com
</VirtualHost>
```

QUESTION NO: 11 CORRECT TEXT

Configure the verification mode of your host account and the password as LDAP. And it can ldapuser40. The password is set as "password". And the certificate login successfully through can be downloaded from <http://ip/dir/ldap.crt>. After the user logs on , the user has no host directory unless you configure the autofs in the following questions.

Answer: system-config-authentication

LDAP Server: ldap://instructor.example.com (In domain form, not write IP)

OR

```
# yum groupinstall directory-client (1.krb5-workstation 2.pam-krb5 3.sssd)
```

```
# system-config-authentication
```

```
1.User Account Database: LDAP
```

```
2.LDAP Search Base DN: dc=example,dc=com
```

```
3.LDAP Server: ldap://instructor.example.com (In domain form, not write IP) 4.Download CA Certificate
```

```
5.Authentication Method: LDAP password
```

```
6.Apply
```

```
getent passwd ldapuser40
```

QUESTION NO: 12 CORRECT TEXT

Configure autofs to make sure after login successfully, it has the home directory autofs, which is shared as /rhome/ldapuser40 at the ip: 172.24.40.10. and it also requires that, other ldap users can use the home directory normally.

Answer: # chkconfig autofs on

```
# cd /etc/
```

```
# vim /etc/auto.master
```

```
/rhome /etc/auto.ldap
```

```
# cp auto.misc auto.ldap
```

```
# vim auto.ldap
```

```
ldapuser40 -rw,soft,intr 172.24.40.10:/rhome/ldapuser40
```

```
* -rw,soft,intr 172.16.40.10:/rhome/&
```

```
# service autofs stop
```

```
# service autofs start
```

```
# showmount -e 172.24.40.10
```

```
# su - ldapuser40
```

QUESTION NO: 13 CORRECT TEXT

Configure the system synchronous as 172.24.40.10.

Answer: Graphical Interfaces:

System-->Administration-->Date & Time

OR

```
# system-config-date
```

QUESTION NO: 14 CORRECT TEXT

Change the logical volume capacity named vo from 190M to 300M. and the size of the floating range should set between 280 and 320. (This logical volume has been mounted in advance.)

Answer: # vgdisplay

(Check the capacity of vg, if the capacity is not enough, need to create pv , vgextend , lvextend)

```
# lvdisplay (Check lv)
```

```
# lvextend -L +110M /dev/vg2/lv2
```

```
# resize2fs /dev/vg2/lv2
```

```
mount -a
```

(Verify)

----- (Decrease lvm)

```
# umount /media
```

```
# fsck -f /dev/vg2/lv2
```

```
# resize2fs -f /dev/vg2/lv2 100M
```

```
# lvreduce -L 100M /dev/vg2/lv2
```

```
# mount -a
```

```
# lvdisplay (Verify)
```

OR

```
# e2fsck -f /dev/vg1/lvm02
```

```
# resize2fs -f /dev/vg1/lvm02
```

```
# mount /dev/vg1/lvm01 /mnt
```

```
# lvreduce -L 1G -n /dev/vg1/lvm02
```

```
# lvdisplay (Verify)
```

QUESTION NO: 15 CORRECT TEXT

Create a volume group, and set 16M as a extends. And divided a volume group containing 50

extends on volume group lv, make it as ext4 file system, and mounted automatically under /mnt/data.

```
Answer: # pvcreate /dev/sda7 /dev/sda8
# vgcreate -s 16M vg1 /dev/sda7 /dev/sda8
# lvcreate -l 50 -n lvm02
# mkfs.ext4 /dev/vg1/lvm02
# blkid /dev/vg1/lv1
# vim /etc/fstab
# mkdir -p /mnt/data
UUID=xxxxxxx /mnt/data ext4 defaults 0 0
# vim /etc/fstab
# mount -a
# mount
(Verify)
```

QUESTION NO: 16 CORRECT TEXT

Upgrading the kernel as 2.6.36.7.1, and configure the system to Start the default kernel, keep the old kernel available.

```
Answer: # cat /etc/grub.conf
# cd /boot
# lftp it
# get dr/dom/kernel-xxxx.rpm
# rpm -ivh kernel-xxxx.rpm
# vim /etc/grub.conf
default=0
```

QUESTION NO: 17 CORRECT TEXT

Create a 512M partition, make it as ext4 file system, mounted automatically under /mnt/data and which take effect automatically at boot-start.

```
Answer: # fdisk /dev/vda
n
+512M
w
# partprobe /dev/vda
```

```
# mkfs -t ext4 /dev/vda5
# mkdir -p /data
# vim /etc/fstab
/dev/vda5 /data ext4 defaults 0 0
# mount -a
```

QUESTION NO: 18 CORRECT TEXT

Create a volume group, and set 8M as a extends. Divided a volume group containing 50 extends on volume group lv (lvshare), make it as ext4 file system, and mounted automatically under /mnt/data. And the size of the floating range should set between 380M and 400M.

```
Answer: # fdisk
# partprobe
# pvcreate /dev/vda6
# vgcreate -s 8M vg1 /dev/vda6 -s
# lvcreate -n lvshare -l 50 vg1 -l
# mkfs.ext4 /dev/vg1/lvshare
# mkdir -p /mnt/data
# vim /etc/fstab
/dev/vg1/lvshare /mnt/data ext4 defaults 0 0
# mount -a
# df -h
```

QUESTION NO: 19 CORRECT TEXT

Download ftp://192.168.0.254/pub/boot.iso to /root, and mounted automatically under /media/cdrom and which take effect automatically at boot-start.

```
Answer: # cd /root; wget ftp://192.168.0.254/pub/boot.iso
# mkdir -p /media/cdrom
# vim /etc/fstab
/root/boot.iso /media/cdrom iso9660 defaults,loop 0 0
# mount -a
mount [-t vfstype] [-o options] device dir
```

QUESTION NO: 20 CORRECT TEXT

Add admin group and set gid=600

Answer: # groupadd -g 600 admin

QUESTION NO: 21 CORRECT TEXT

Add user: user1, set uid=601

Password: redhat

The user's login shell should be non-interactive.

Answer: # useradd -u 601 -s /sbin/nologin user1

passwd user1

redhat

QUESTION NO: 22 CORRECT TEXT

Add users: user2, user3.

The Additional group of the two users: user2, user3 is the admin group Password: redhat

Answer: # useradd -G admin user2

useradd -G admin user3

passwd user2

redhat

passwd user3

redhat

QUESTION NO: 23 CORRECT TEXT

Copy /etc/fstab to /var/tmp name admin, the user1 could read, write and modify it, while user2 without any permission.

Answer: # cp /etc/fstab /var/tmp/

chgrp admin /var/tmp/fstab

setfacl -m u:user1:rwX /var/tmp/fstab

setfacl -m u:user2:--- /var/tmp/fstab

ls -l

-rw-rw-r--+ 1 root admin 685 Nov 10 15:29 /var/tmp/fstab

QUESTION NO: 24 CORRECT TEXT

Configure a task: plan to run echo "file" command at 14:23 every day.

Answer: (a) Created as administrator

```
# crontab -u natasha -e
```

```
23 14 * * * /bin/echo "file"
```

(b)Created as natasha

```
# su - natasha
```

```
$ crontab -e
```

```
23 14 * * * /bin/echo "file"
```