# **LINUX ADMINSTRATION**

## **ASSIGNMENT 2nd**

#### **Question 1**

- 1. Add a 10GB disk to the CentOS.
- 2. Create 2 Partitions 4GB and 6GB of Space respectively.
- 3. Format 4GB with xfs and 6GB with ext4 file system.
- 4. Mount 4GB and 6GB in /data and /music directory respectively.
- 5. Create one file of 1GB in each of the mount point created above.
- 6. Verify the disk Consumption and disk space free in the mounted partitions.

### 1. Add a 10GB disk to the CentOS.

Ans. Verify That Disk Is Added Using fdisk -I

Applications Places Terminal root@localhost:~ File Edit View Search Terminal Help [root@localhost ~]# fdisk -l Disk /dev/sda: 32.2 GB, 32212254720 bytes, 62914560 sectors Units = sectors of 1 \* 512 = 512 bytes Sector size (logical/physical): 512 bytes / 512 bytes I/O size (minimum/optimal): 512 bytes / 512 bytes Disk label type: dos Disk identifier: 0x0008367b Device Boot Start End Blocks Id System /dev/sdal 2048 1026047 512000 83 Linux /dev/sda2 1026048 41986047 20480000 83 Linux /dev/sda3 50178047 82 Linux swap / Solaris 41986048 4096000 Disk /dev/sdb: 21.5 GB, 21474836480 bytes, 41943040 sectors Units = sectors of 1 \* 512 = 512 bytes Sector size (logical/physical): 512 bytes / 512 bytes I/O size (minimum/optimal): 512 bytes / 512 bytes Disk label type: dos Disk identifier: 0x2e86ee15 Device Boot Start End Blocks Id System /dev/sdb1 2048 20973567 10485760 Linux Disk /dev/sdc: 11.8 GB, 11811160064 bytes, 23068672 sectors Units = sectors of 1 \* 512 = 512 bytes Sector size (logical/physical): 512 bytes / 512 bytes I/O size (minimum/optimal): 512 bytes / 512 bytes

#I Have Taken 11Gb To Avoid Any Kind Of Storage Issue.

2. Create 2 Partitions 4GB and 6GB of Space respectively.

**Ans.** Creating 2 Partition

[root@localhost ~]#

3. Format 4GB with xfs and 6GB with ext4 file system.

Partition 2 of type Linux and of size 6 GiB is set

Last sector, +sectors or +size{K,M,G} (8390656-23068671, default 23068671): +6G

Ans.

Using default value 8390656

#### Formating And Creating File System Using mkfs Command

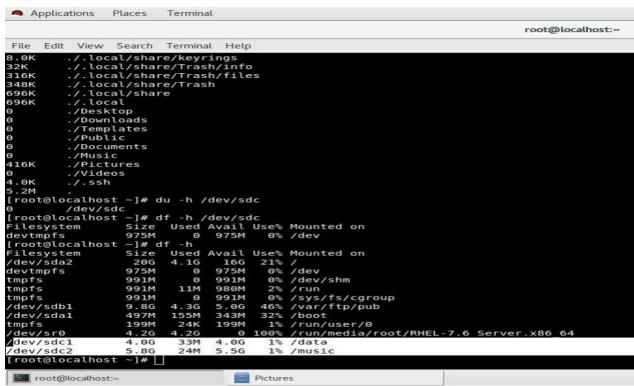


### 4. Mount 4GB and 6GB in /data and /music directory respectively.

Ans.

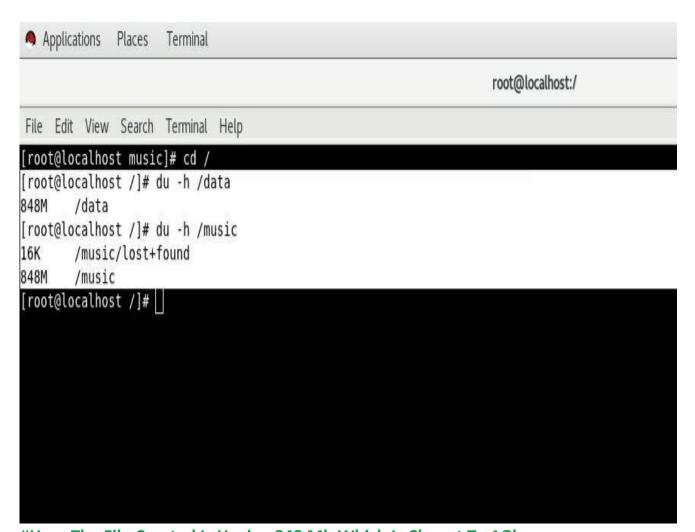
#### Creating Mount Point Using fstab File

#### **Verifying Mount Point Is Created**



5. Create one file of 1GB in each of the mount point created above.

Ans. Creating 1Gb File Using seq > 1000000 Command



**#Here The File Created Is Having 848 Mb Which Is Closest To 1Gb** 

6. Verify the disk Consumption and disk space free in the mounted partitions.

Ans. Verify Disk Usage Using df -h Command

Applications Places Terminal root@localhost:~ File Edit View Search Terminal Help [root@localhost ~]# df -h Filesystem Size Used Avail Use% Mounted on /dev/sda2 20G 4.1G 16G 21% / devtmpfs 0% /dev 975M 0 975M 0 991M 0% /dev/shm tmpfs 991M 11M 980M 2% /run 991M tmpfs tmpfs 0 991M 0% /sys/fs/cgroup 991M /dev/sdb1 9.8G 4.3G 5.0G 46% /var/ftp/pub /dev/sda1 497M 155M 343M 32% /boot tmpfs 28K 199M 1% /run/user/0 199M /dev/sr0 0 100% /run/media/root/RHEL-7.6 Server.x86 64 4.2G 4.2G /dev/sdc1 4.0G 880M 3.2G 22% /data /dev/sdc2 5.8G 872M 4.7G 16% /music [root@localhost ~]#