

Experiment 1.2

Student Name: Gaurav Kumar

UID: 22MCC20177

Branch: CC-DevOps

Section/Group: 1/B

Semester: I

Date of Performance: 14/11/2022

Subject Name: Linux Administration Lab

Subject Code: 22CAP-648

1. Write a command used to display existing partitions and sizes using 2 different commands. After that compare the outputs of both. After this create a new 400MB primary partition and 2 extended partition under that primary partition and check whether both partitions are created or not.

Ans :

1. Open Terminal
2. Write `fdisk -l` to view list of partition

```
linux@ubuntu:~$ sudo fdisk -l
Disk /dev/loop0: 140.9 MiB, 147722240 bytes, 288520 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 /dev/loop1: 140.7 MiB, 147496960 bytes, 288080 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 /dev/loop2: 14.5 MiB, 15196160 bytes, 29680 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 /dev/loop3: 3.7 MiB, 3887104 bytes, 7592 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 /dev/loop4: 13 MiB, 13619200 bytes, 26600 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 /dev/loop5: 34.7 MiB, 36323328 bytes, 70944 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 /dev/loop6: 91 MiB, 95416320 bytes, 186360 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 /dev/loop7: 34.8 MiB, 36503552 bytes, 71296 sectors
Units: sectors of 1 * 512 = 512 bytes
```

3. We can also use lsblk

```
manav@manav-GL63-9RCX:~$ lsblk
NAME        MAJ:MIN RM  SIZE RO TYPE MOUNTPOINT
loop0        7:0      0   55M  1 loop /snap/core18/1705
loop1        7:1      0   55M  1 loop /snap/core18/1754
loop2        7:2      0 240.8M  1 loop /snap/gnome-3-34-1804/24
loop3        7:3      0 255.6M  1 loop /snap/gnome-3-34-1804/33
loop4        7:4      0  62.1M  1 loop /snap/gtk-common-themes/1506
loop5        7:5      0 214.9M  1 loop /snap/wine-platform-5-stable/4
loop6        7:6      0    4M  1 loop /snap/notepad-plus-plus/232
loop7        7:7      0  49.8M  1 loop /snap/snap-store/433
loop8        7:8      0 226.3M  1 loop /snap/wine-platform-runtime/123
loop9        7:9      0  27.1M  1 loop /snap/snapd/7264
loop10       7:10     0 226.4M  1 loop /snap/wine-platform-runtime/136
nvme0n1      259:0     0  477G  0 disk 
├─nvme0n1p1  259:1     0   300M  0 part /boot/efi
└─nvme0n1p2  259:2     0 285.2G  0 part /
```

4. Select the partition using fdisk /dev/sda1

We can also view Disk partitions using lsblk. it displays block devices, when used with the -f option, it prints file system type on partitions as well now Creating primary partition and 2 extended partitions

1. Verify the partitions available on the server: fdisk -l
2. Choose which device you wish to use (such as /dev/sda or /dev/sdb)
3. Run fdisk /dev/sdX (where X is the device you would like to add the partition to)
4. Type 'n' to create a new partition.
5. Specify where you would like the partition to end and staff You can set the number of NIB
6. of the partition instead of the end cylinder. For example: 400M
7. Type 'p' to view the partition, and type 'w' to save the partition

1) Learning outcomes (What I have learnt):

- i) About fdisk and lsblk
- ii) About disk partition
- iii) Learn to create a new partition

Evaluation Grid:

Sr. No.	Parameters	Marks Obtained	Maximum Marks
1.	Demonstration and Performance (Quiz)		22
2.	Worksheet		8