Q) What is Operating System ?
=> OS is a mediator between user and computer
=> OS is mandatory to use any computer
=> Using OS we can run our applications in the computer
=> We have below 3 types Operating System
1) Windows OS
2) Linux OS
3) MAC OS
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=> Developed by Microsoft
=> Single User OS
=> It is GUI based
=> It is used for personal purpose (games, movies, work)
=> Less Security
=> Windows OS License is commercial
======== Linux OS ========
=> It is free & Open source OS
=> Linux is Very Secured
=> Linux is Multi User Operating System
=> Linux is Highly recommend OS to run Servers and Databases
=> Linux is recommended for Business Purpose
=> Linux is CLI based.
========= Linux History =========

- -> Initially we had UNIX OS
- -> Linus Torvalds identified some issues in UNIX OS and informed to Unix Team.
- -> Unix Team did not accept Linux Torvalds suggesions.
- -> Linus Torvalds developed his own Operating System by using Minux OS.

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(Li) nus + Mi (nux) ==> Linux OS
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- -> Linus Torvalds released Linux OS into market with free of cost along with source code.
- -> So many companies taken Linux OS source code and modified according to their requirement and released into market with different names those are called as Linux Distributions.
- 1) Ubuntu Linux
- 2) Red Hat Linux
- 3) Debian Linux
- 4) Fedora Linux
- 5) SUSE Linux
- 6) Kali Linux
- 7) Cent OS Linux
- 8) Amazon Linux

Note: We have 200+ Linux Distributions.

Linux Environment Setup

- 1) Create AWS account (Free Tier)
- 2) Create EC2 instance with Amazon Linux
- 3) Download MobaXterm Software
- 4) Connect to EC2 Linux VM using MobaXterm

======== Linux Commands

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whoami: Displays logged in user information

date: Prints today's date

cal: Print current month calendar

pwd: Display present working directory

mkdir: Create new directory

rmdir: Remove empty directory

cd : change directory

Is: list files

touch: To create empty file

cat: Create file with content & display file content

cat > filename : Create file with data (we will loose old data)

cat >> filename : append data at the bottom

cat filename : display file content

rm: It is used to remove file

mv: To rename file / directory

cp: To copy data from one file to another file

wc: word count (lines, words, characters)