OPERATING SYSTEM (OS)

Microsoft

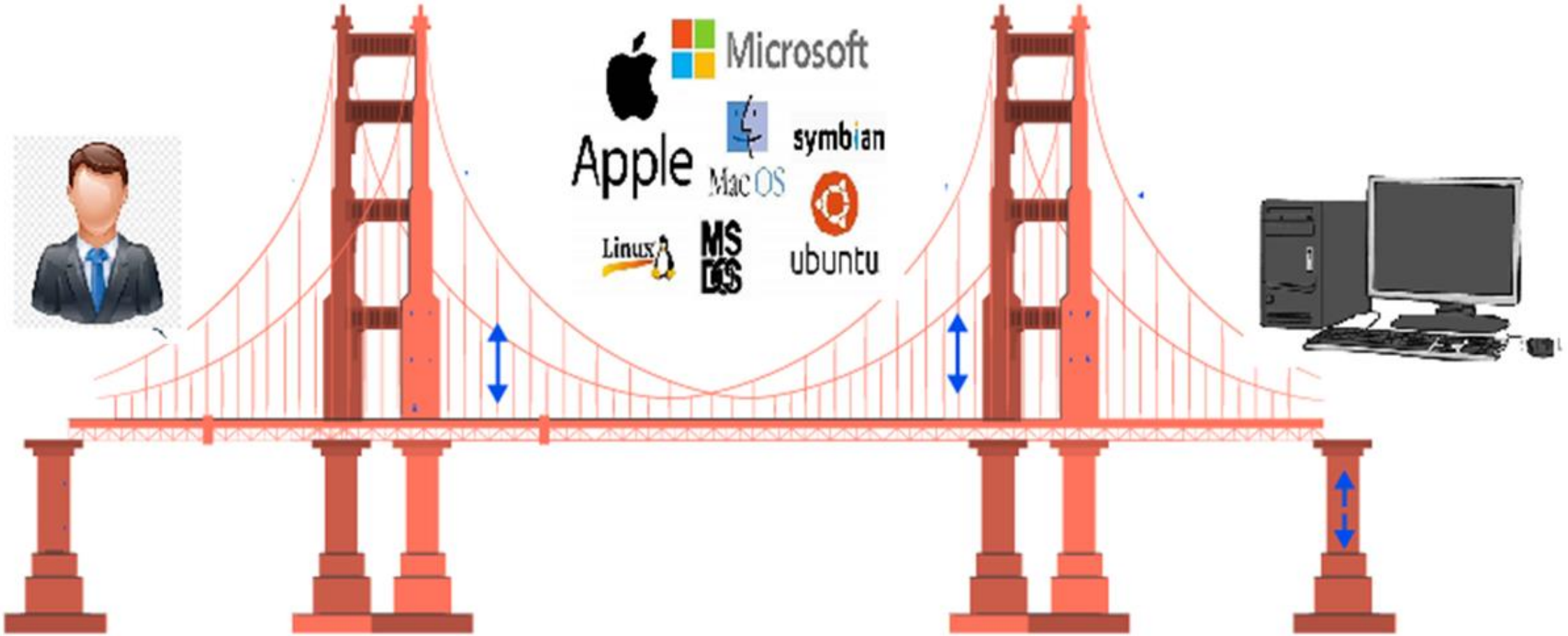
Apple

symbian

Mac OS

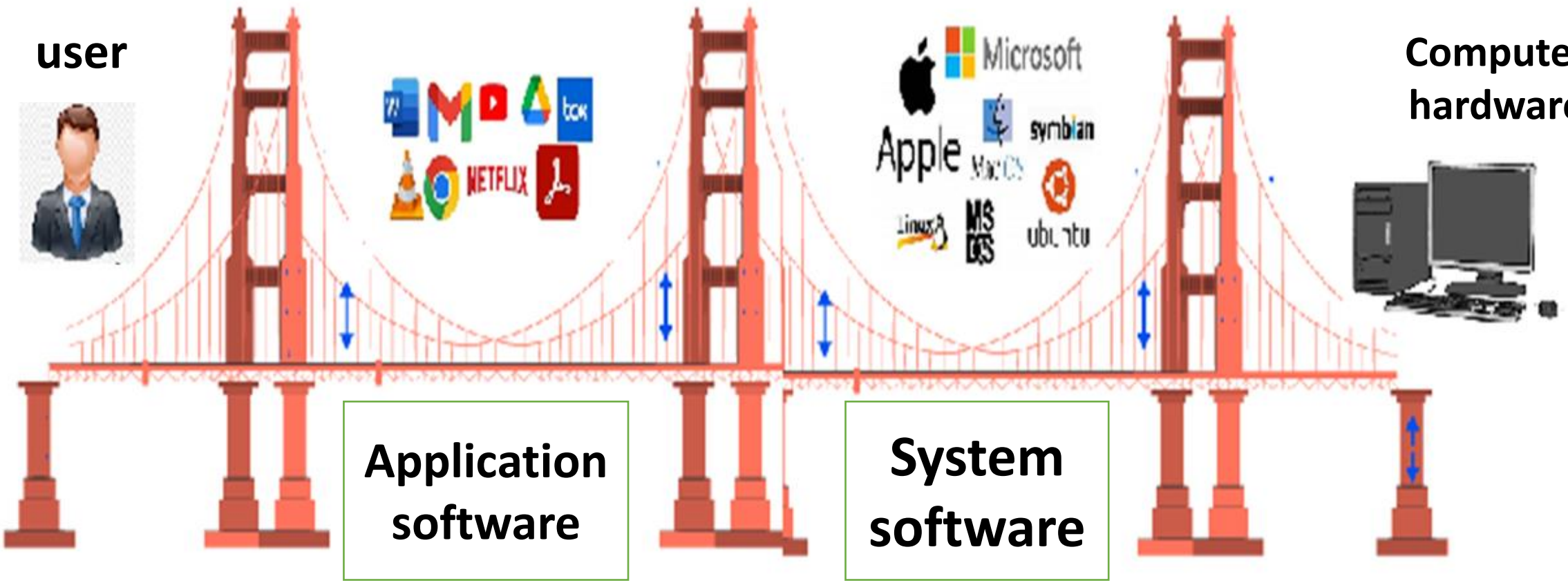
ubuntu

OS = Interface between the computer user and the computer hardware.

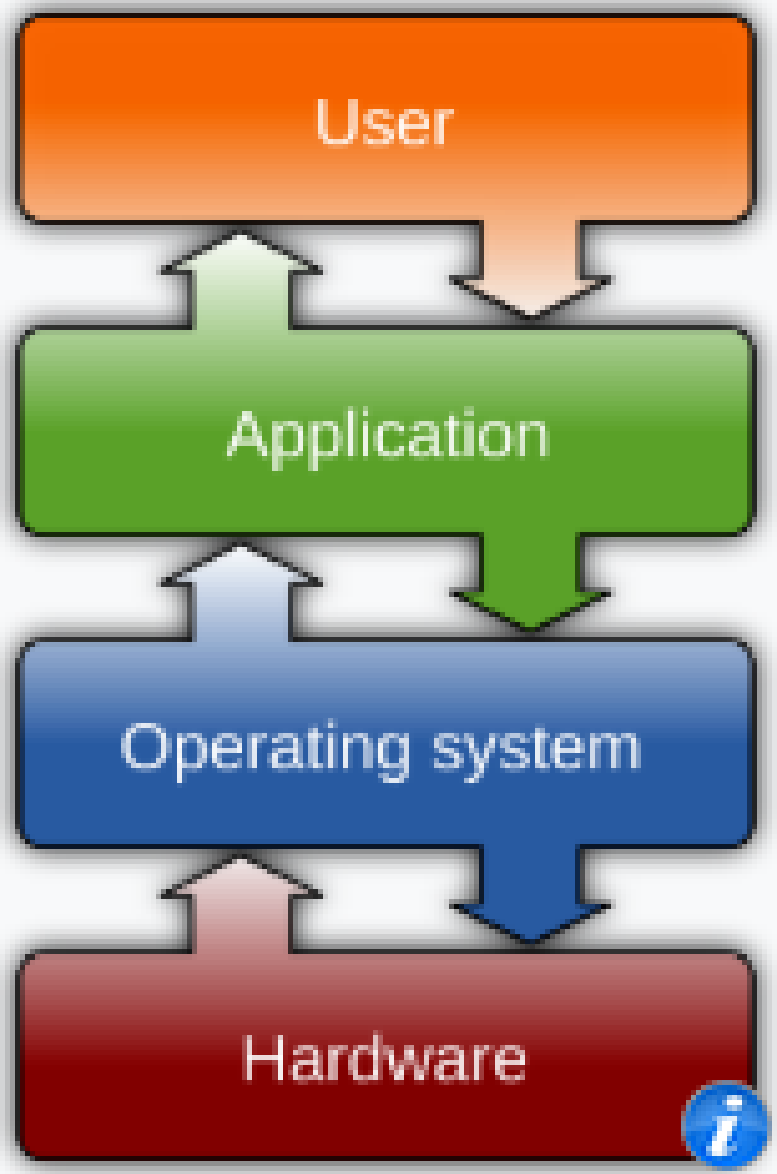


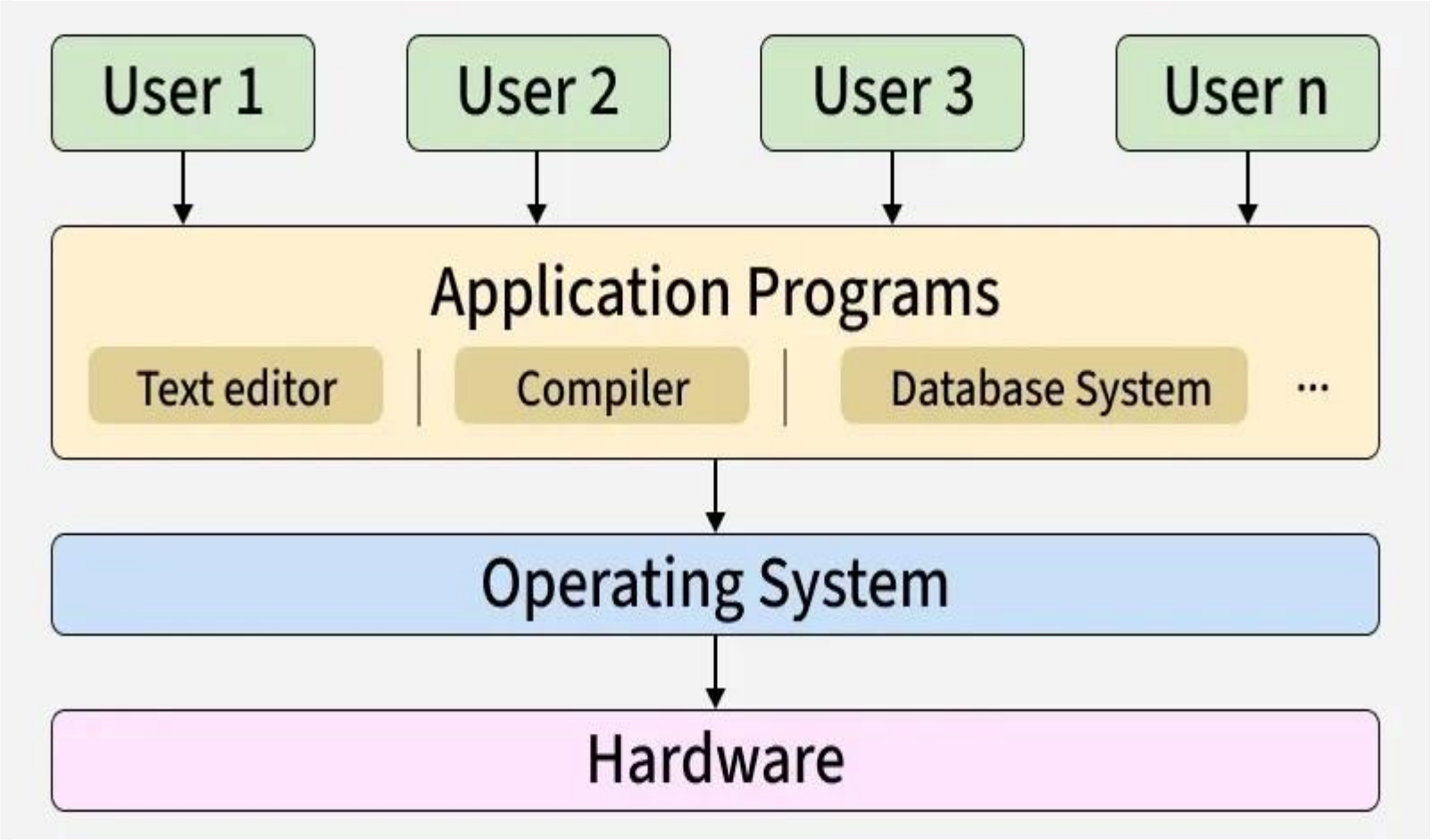
OS = ये user और कंप्यूटर हार्डवेयर के बीच Interface(बात-चीत) करवाता हैं |

User भी direct OS (system software) से interface नहीं करता हैं वो पहले application software से interface करता हैं |

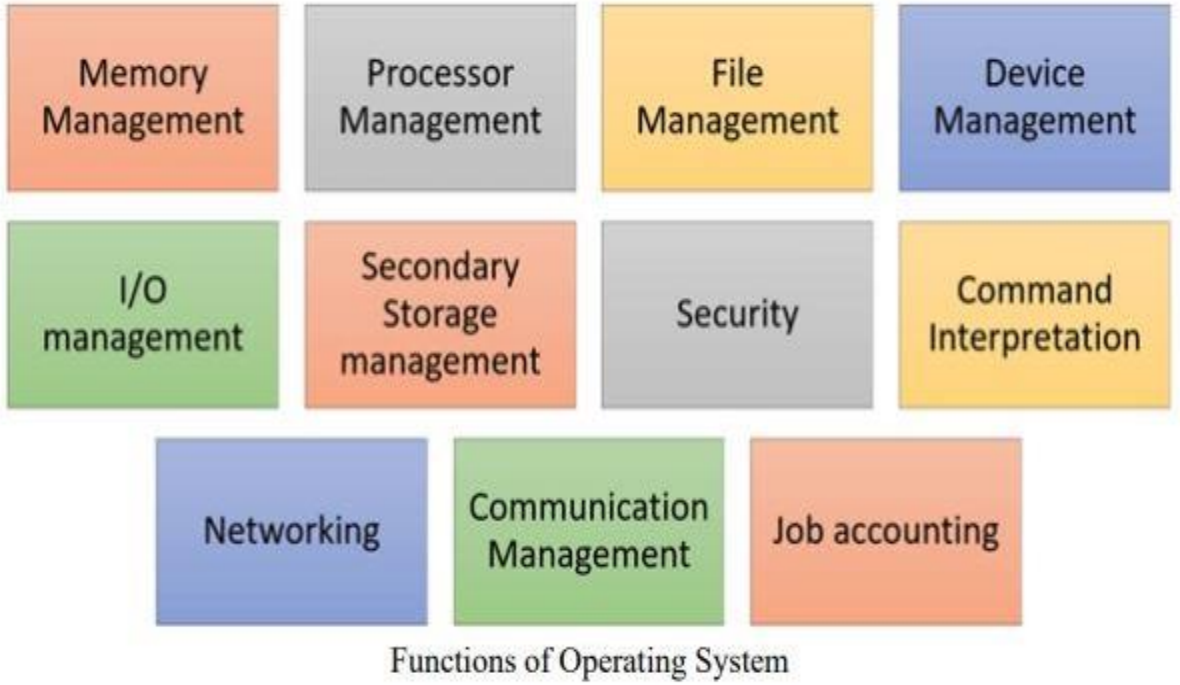


Operating systems





Function / Components OS



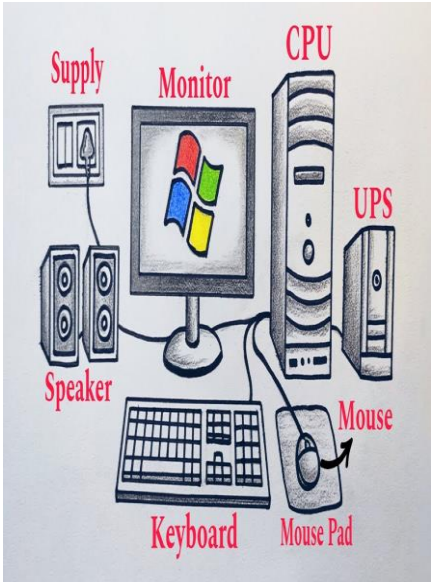
Functions of Operating System

Hotel

customer

Manager

chef



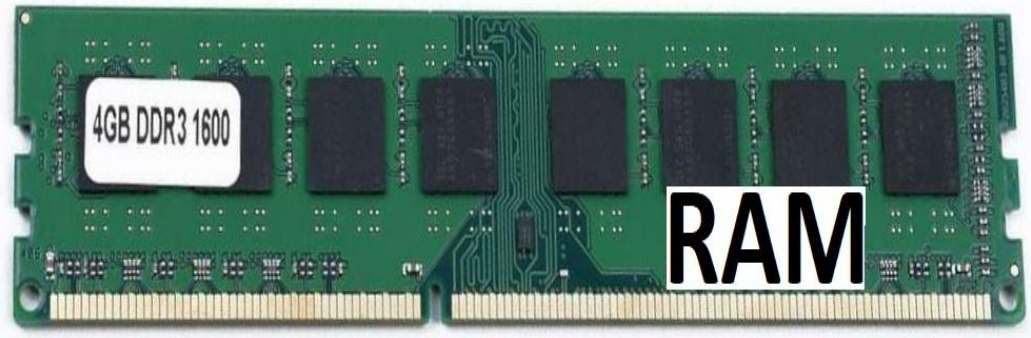
User

operating System

Application Software

Memory Management

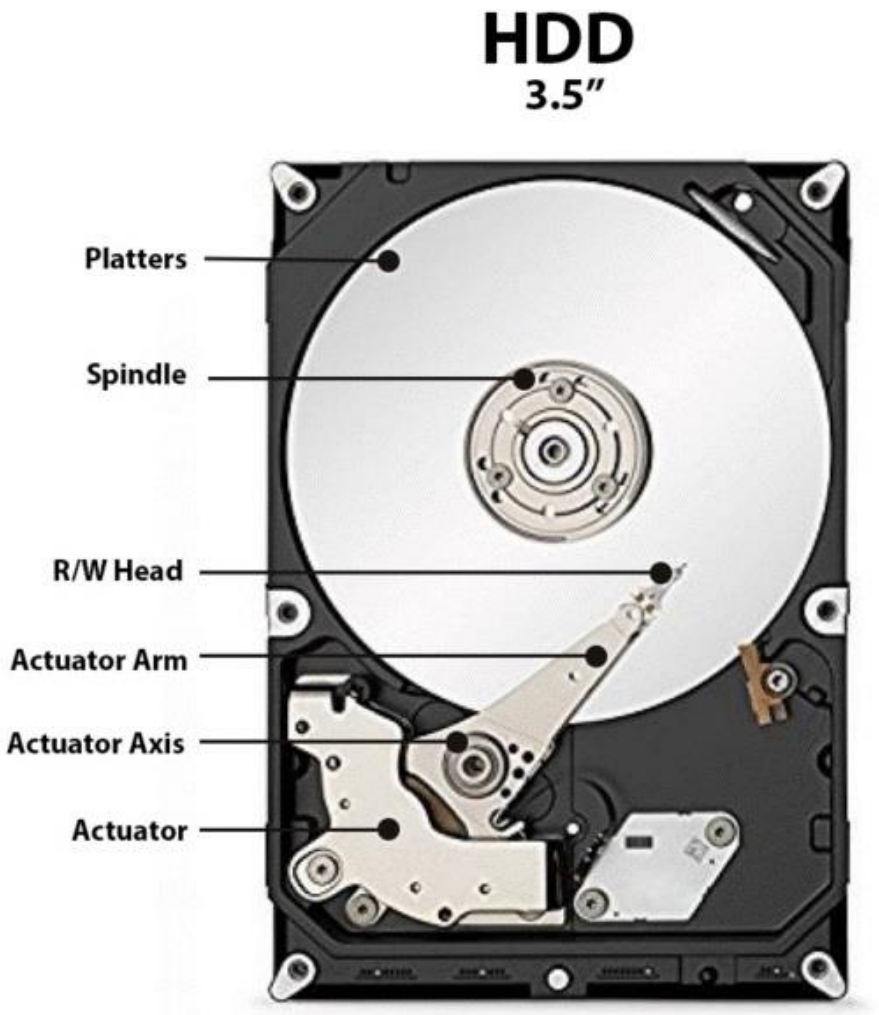
Application Software



RAM को manage करना

- Process को RAM allocate कराना
- Process का काम खत्म होने पर RAM को free करना
- Multitasking के लिए memory divide करना
- जरूरत होने पर Virtual memory बनाना

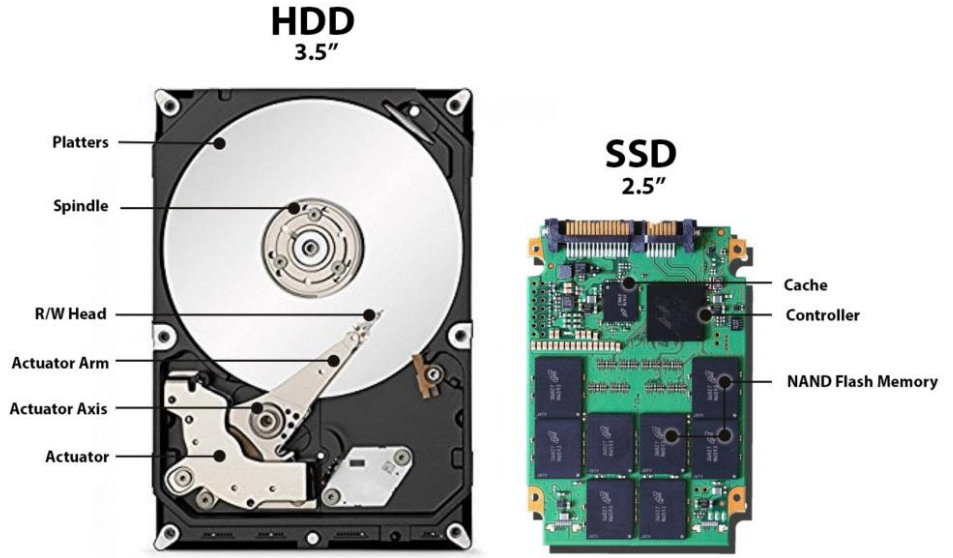
File Management



File को manage करना

- Secondary storage (HDD/SDD) के file को manage करते हैं |
- File create,open,save,delete,rename....
- Folder create , open, save,delete,rename,....
- File का size, location, permission,...
- Logical storage/update देखता/manage करता हैं

Device /IO Management

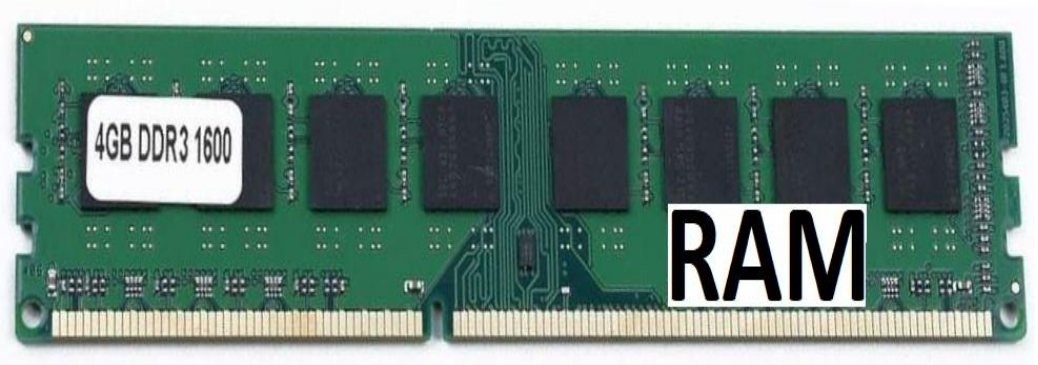


Device को manage करना

- Device को allocation & de-allocation करना
- Hardware device (printer/ keyword / mouse/ disk / scanner,....) को manage करना
- Device driver के through Device को चलाना
- Device का status track करना
- Device के Job को manage करना

Process Management

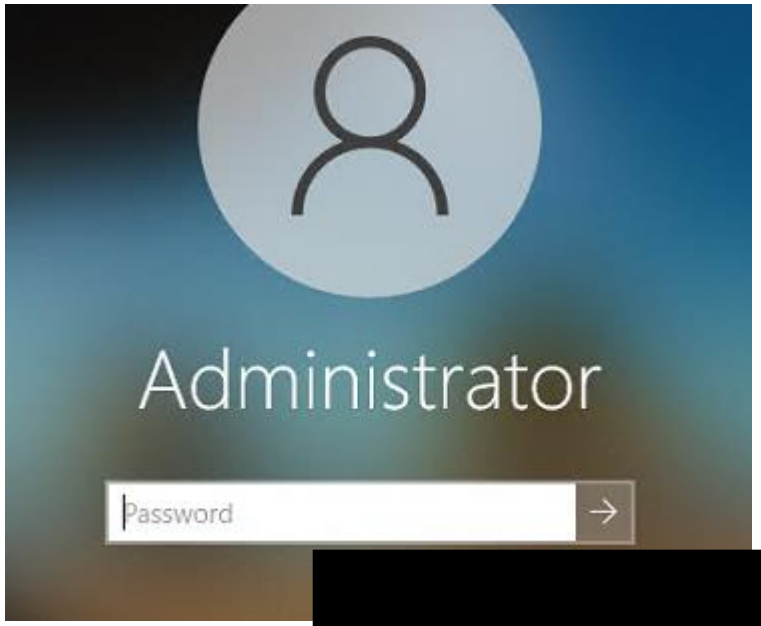
Application Software

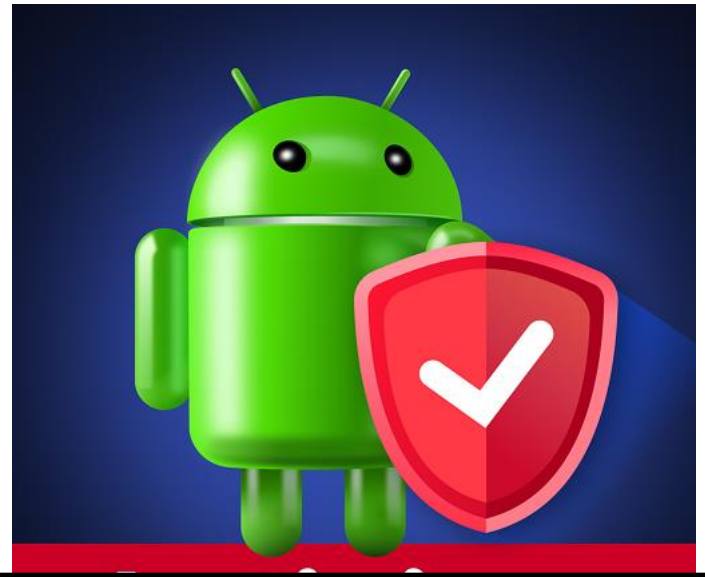


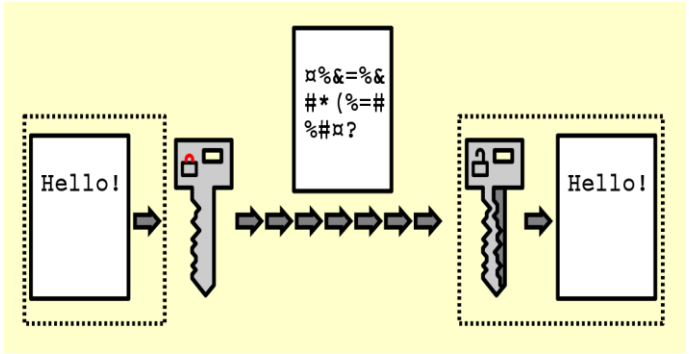
CPU को manage करना

- CPU allocation & scheduling
- Process create ,ready,running,block/wait, terminate
- Deadlock remove, PCB record
- Algorithm – FCFS,SJF, Priority, Round-robin

Security Management





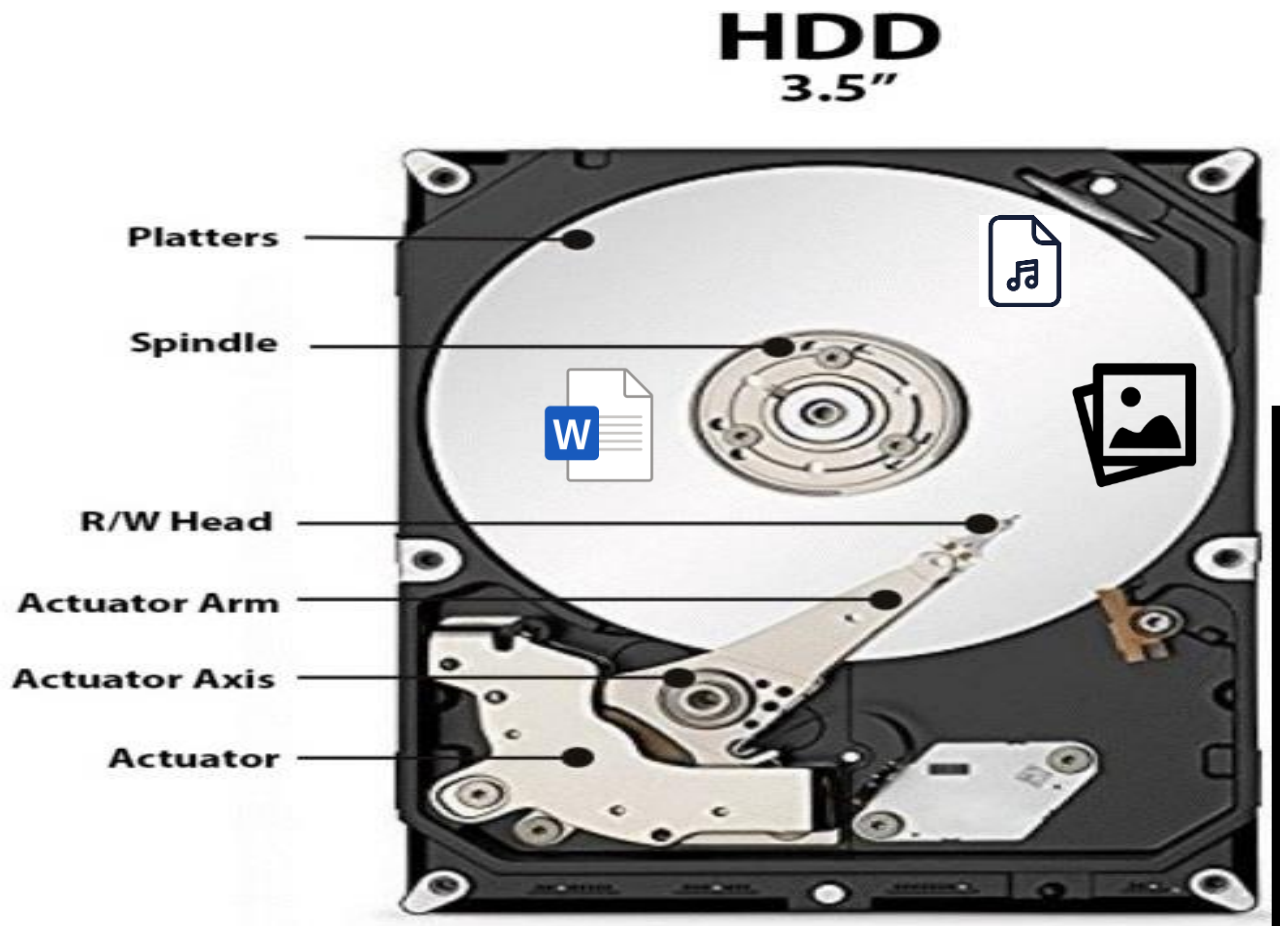


Security को manage करना

- System,data एंड resource को unauthorized access से बचाना |
- Pin,password,otp,file permission, antivirus, malware, spyware, admin login, Encryption, threats protection,....से बचाना

Disk Management

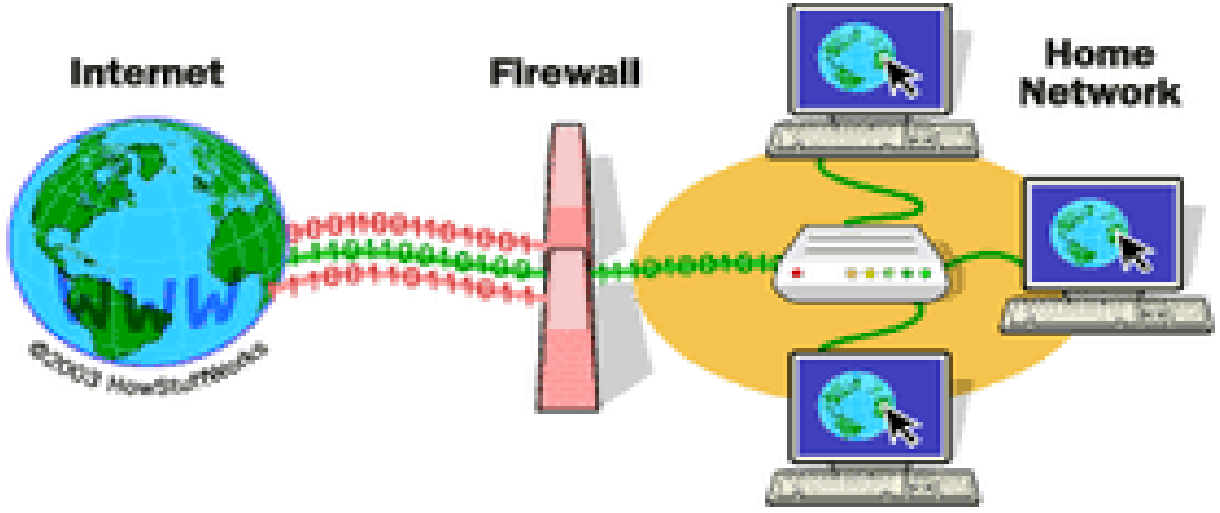
OR Secondary Storage management



Disk को manage करना

- HardDisk, SSD, Pen driver, CD,... को manage करना
- खोजने का तरीका – FCFS, SSTF, SCAN, c-scan,.....
- रखने का तरीका – Contiguous, linked –index, Non Contiguous
- Physical storage देखता हैं

Network Management



1. College
2. Principal
3. Parent
4. Teacher
5. Student

a. CPU
b. Application S/W
c. Operating System (OS)
d. User
e. Computer