

# Types of operating system

## (i) Batch Processing Operating System

The ~~is~~ batch processing OS supports processing of jobs one at a time. The jobs are submitted in a batch.

It is the responsibility of OS to schedule the job in a queue and assign a system resources one by one by one. It has very less interaction with CPU and the user.  
e.g. printer

## (ii) Multiprogramming System

In multiprogramming systems it is a technique used to utilize maximum CPU time by running multiple program simultaneously.

In these systems multiple programs are loaded into the and the running process begin with the first program to continue, till an instruction writing a peripheral is reached.

The contents of program are stored and

The second program in memory is given a chance to run. This process continues until all program finished running.

### (iii) Time-sharing OS

It is a multi processing system which supports multiple-user to work as multiple terminal. This OS makes time of the CPU time & distribute among the multiple user sitting on various terminal.

This OS allows the user to share the system simultaneously. Each user is allocated resources for a particular slot.

The switching between user is so fast that each user think that he is getting the system resources continuously.

e.g. UNIX, LINUX

### (iv) Real-Time OS

It is a multi-tasking OS intended for real time application in which the total correctness of an operation depends not only upon its logical correctness. But also upon the time in which it is performed.

e.g. Industrial purpose, scientific research equipments.

### (v) Multiprocessing OS

This system works with two or more Central Processing Unit within a single computer system. In this system all CPUs may be equal or some may be reserved for special purposes.

This OS enables several programs run concurrently

e.g. UNIX (widely used multiprocessing OS)

### (vi) Multi-tasking system

Only one CPU is involved but it supports to perform multiple task at the same time. It switches from one program to another program that it gives the appearance of ~~working~~ running all of the programs at the same time. eg. printer (It can send output data to printer and print it at that time, it can send the

### (vii) Networking operating system files to secondary storage device for storage.

It is a software that includes special function for connecting computers and devices into a LAN. It controls a network and its messages and it is controlled by multiple users to network.

Resources such as files and provides for certain administrative function. This type of OS is complex in nature. i.e. Windows NT, Mac-OS, UNIX and network OS.

Control Processing Unit within a single computer system. In this system, all the data must be given a unique ID assigned for special purposes.

This OS handles several processes and concurrently. e.g. UNIX (highly used multiprocessor OS)

### Multi-tasking system

Multi-tasking system is a system where the CPU is involved in the execution of multiple tasks at the same time. It switches from one program to another program that it gives the appearance of the program to be running at the same time. In a multi-tasking system, the CPU can execute several programs at the same time. It is a system where the CPU is involved in the execution of multiple tasks at the same time. It switches from one program to another program that it gives the appearance of the program to be running at the same time.

It is a software that includes several functions for controlling computer and network. It is a software that includes several functions for controlling computer and network.