

# [Operating system](https://assignbuster.com/operating-system/)

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COMPUTER SCIENCES AND INFORMATION TECHNOLOGY OPERATING SYSTEM An operating system is a program that acts as an interface between the user and the computer hardware and controls the execution of all kinds of programs. (Maxwell, 2011)It is the most important software that runs on a computer. It manages the computers memory, processes, and all of its software and hardware. It also allows one to communicate with the computer without knowing the computers language. (Anonymous, 2010)
Functions of an operating System
The operating system is important and it has the following functions; (Maxwell, 2011)
I. Memory Management-refers to management of Primary Memory or Main Memory. Main memory is a large array of words or bytes where each word or byte has its own address.
II. Processor Management. The OS decides which process gets the processor when and how much time. It keeps tracks of processor and status of process. The program responsible for this task is known as traffic controller.
III. Device Management. It keeps tracks of all devices. The program that is responsible for this task is known as the I/O controller.
IV. Useful in file Management by keeping track of information, location, uses and status.
V. It enhances security by means of password and similar other techniques, preventing unauthorized access to programs and data.
VI. It controls the system performance for efficiency.
VII. It accounts for the jobs and the tasks in the computer
VIII. It has error detecting aids that prevents them
IX. It coordinates between other software and users for efficiency
Types of operating systems.
The three most common operating systems for personal computers are Microsoft Windows, Apple Mac OS X, and Linux. (Anonymous, 2010)
Modern operating systems use a graphical user interface, or GUI. A GUI allows one to use the mouse to click icons, buttons, and menus, and everything will be displayed on the screen in combination of graphics and text. Traditionally, computers had a command-line interface, which meant users had to type every single command to the computer and the computer would only display text. (Anonymous, 2010)
I. Mac OS X. It was created by Apple and it comes preloaded on all new Macintosh computers, or Macs. All of the recent versions are known as OS X and the specific versions include Yosemite 2014, Mavericks 2013, Mountain Lion 2012, Lion 2011 and Snow Leopard 2009. Apple also offers a version called Mac OS X Server, which is designed to be run on servers. (Anonymous, 2010)
II. Microsoft Windows. Microsoft created the Windows operating system in the mid-1980s. The different versions of Windows are Windows 8 (2012), Windows 7 (2009), and Windows Vista (2007). Windows comes preloaded on most new PCs, which helps to make it the most popular operating system in the world. (Anonymous, 2010)
III. Linux. This OS can be modified and distributed by anyone around the world. This is different from proprietary software like Windows, which can only be modified by the company that owns it (Microsoft). The most popular versions include Ubuntu, Mint, and Fedora. (Anonymous, 2010)
Operating systems for mobile devices
Normally, the operating systems of mobile phones are designed specifically for mobile devices. Operating systems for these mobile devices are usually not fully featured like those of desktop and laptop computers. However, one can still do a lot of things with them, like watching movies, browsing the Web, managing your calendar and playing games. Examples of these mobile operating systems include Apple iOS, Windows Phone, and Google Android. (Anonymous, 2010)
Works Cited
Anonymous. (2010). Computer Basics; Understanding Operating Systems. Retrieved 2015,
from http://www. gcflearnfree. org/computerbasics/2
Maxwell, P. (2011). Operating System - Overview. Retrieved 2015,
from http://www. tutorialspoint. com/operating\_system/os\_overview. htm
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