

Help Resources

Installing an Operating System on a "Barebones" Computer

If you did not purchase an operating system and have Cascade install it (for free) you will have to do the following to install a Windows operating system. Be sure to check the minimum hardware requirements and make sure that the specifications for the computer you have purchased meet or (better yet) exceed them (listed below).

Note: Even though you may be able to run the software with the minimum specifications you may not be satisfied with the performance.

Minimum Hardware Requirements for various Microsoft Operating Systems:

Windows XP:

CPU	300 MHz (single CPU for Home edition, Single or dual for Professional edition)
RAM	128 MB
Disk Space	1.5 GB free
Video Card	Super VGA (800x600)
Media	Bootable CD-ROM or DVD, Bootable floppy disks.

Windows ME:

CPU	300 MHz or higher Pentium-compatible CPU
RAM	128 MB
Disk Space	400 MB free
Video Card	Super VGA (800x600)
Media	Bootable CD-ROM or DVD, Bootable floppy disks

Windows 2000 Professional:

CPU	133 MHz or higher Pentium-compatible CPU
RAM	128 MB
Disk Space	650MB free
Video Card	Super VGA (800x600)
Media	Bootable CD-ROM or DVD, Bootable floppy disks

Windows 98:

CPU	486DX 66 megahertz (MHz) or faster processor (Pentium central processing unit recommended).
RAM	16 MB
Disk Space	295 MB free
Video Card	Super VGA (800x600)
Media	Bootable CD-ROM or DVD, Bootable floppy disk.

Installing your operating system:

Booting from the CD/DVD is by far the easiest way to install the operating systems above!

If you are installing any of the operating systems above you should be able to "boot" your computer directly from the CD-Rom or DVD drive assuming that your computer's BIOS (also called "set-up") allows for this (most newer systems Pentium 2 and above) and the option is "turned on". Insert the operating system disk and restart the computer watch the screen carefully it may display a message saying "Press any key to boot from CD" you should press any button on your keyboard to continue and boot from the CD.

If you are able to boot from CD the installation wizard will guide you through the process of steps necessary to prepare your computer for installation of the operating system. Each installation is slightly different and will present you with different options. If you don't understand the options or want some clarification there may be some help available on the internet or on the CD itself in help files or in some cases "read me" files.

If you are not able to boot from CD:

Enter BIOS (set-up) to turn on the option to boot from CD/DVD drive(s).

Warning: Your BIOS Setup program is very powerful. An incorrect setting could cause your computer not to boot properly. You should make sure you understand what a setting does before you change it.

You can usually run Setup by pressing a special function key or key combination soon after turning on the computer; during its power-on self test (POST), before the operating system loads. During POST, the BIOS usually will display a prompt such as:

Press F2 to enter Setup

Entering the designated keystroke will take you into the BIOS Setup. Common keystrokes to enter the BIOS Setup are F1, F2, F10, and Del.

On some computers, such as some Gateway or Compaq computers, graphics appear during the POST, and the BIOS information is hidden. You must press Esc to make these graphics disappear. Your monitor will then display the correct keystroke to enter.

Note: If you press the key too early or too often, the BIOS may display an error message. To avoid this, wait about five seconds after turning the power on, then press the key once or twice.

To find out what you need to press to enter BIOS (set-up) for your specific computer you can visit the manufacturer web site (usually under the support or documentation section) or do a "google" <http://www.google.com> search for "Dell enter BIOS" or "Dell enter set-up" for example replace the "Dell" with your computer manufacturer name.

Once you are in your computers BIOS (set-up) you should find a section/page/screen that says something like:

- "Boot options"
- "Boot device"
- "Boot sequence"
- "Boot priority"

This may appear on any of the screens/pages/sections within BIOS (set-up) each computer may be slightly different. There should be options to display on screen help for each item (usually F1). Follow the on screen directions for changing settings. Usually you are required to **"Save settings and exit"** before the change is actually made. If you make a mistake you may also have the option to return to "Default settings".

Once you have found the section that looks like it allows you to control the "Boot Order" you should try to add/change the first setting to be the CD/DVD Rom or "optical drive". If you follow the on

screen directions and are not able to change the first device to this setting it probably won't work on your computer.

If you know that you can't boot from CD (or tried to but couldn't):

If you cannot boot from your CD then you need to create or download a Startup (or Boot) floppy disk. In this disk are a few basic programs that will allow you to format and partition your hard drive as well and load your Windows from your CD. To create a boot disk (on another computer with Windows installed) you can create it by going to your control panel and clicking on the add/remove programs button. Then click on the upper right tab labeled "Start Up Disk" and download the files. Start up the computer with the start up disk in the floppy drive. You can also download a "boot disk" one from the internet (using another computer) by going here: <http://www.bootdisk.com> you will need to download the appropriate boot disk for your operating system. This will usually be a program file that will unpack itself to a floppy that you must have ready and installed in the floppy drive for the process to work. **Unfortunately Cascade cannot supply this disk due to licensing restrictions placed on us by software vendors.**

This procedure explains how to setup a **new hard disk**. Warning - if you are setting up a hard disk which contains data, the following procedure would completely erase your hard disk and the data would be unrecoverable.

Before a new hard disk can be used it needs to be setup. This involves partitioning and formatting the hard disk. Windows 98 or ME boot disk contains the required software to perform this procedure. FDISK.EXE and FORMAT.COM are the files required in your bootable floppy disk.

Start the partition and format procedure by booting your PC using a Windows boot disk. Make sure you set the BIOS so that the boot sequence is set to detect the floppy disk first. If your system has no problems booting you will be presented with a Windows boot disk menu. This gives you the option to start the system with or without CD-ROM support. At this stage you do not need the CD-ROM support, so choose the option to boot without CD-ROM support. You should end up in the MS DOS prompt A: (A drive).

From A: command prompt type **fdisk**. You will be presented with following message:

```
Your computer has a disk larger than 512 MB. This version of Windows
includes improved support for large disks, resulting in more efficient
use of disk space on large drives, and allowing disks over 2 GB to be
formatted as a single drive.

IMPORTANT: If you enable large disk support and create any new drives on this
disk, you will not be able to access the new drive(s) using other operating
systems, including some versions of Windows 95 and Windows NT, as well as
earlier versions of Windows and MS-DOS. In addition, disk utilities that
were not designed explicitly for the FAT32 file system will not be able
to work with this disk. If you need to access this disk with other operating
systems or older disk utilities, do not enable large drive support.

Do you wish to enable large disk support (Y/N) . . . . . ? [Y]
```

Choose "Y" to enable large disk support.

You will now be presented with the FDISK main menu as shown below.

```
Microsoft Windows 98
Fixed Disk Setup Program
(C) Copyright Microsoft Corp. 1983 - 1998

FDISK Options

Current Fixed disk drive: 1

Choose one of the following:

1. Create DOS partition or Logical DOS Drive
2. Set active partition
3. Delete partition or Logical DOS Drive
4. Display partition information
5. Change current fixed disk drive

Enter choice: [ 1 ]

Press Esc to exit FDISK
```

From the menu, choose option 1 - Create DOS partition or Logical DOS drive. Another menu will present the following options.

```
Create DOS Partition or Logical DOS Drive

Current fixed disk drive: 1

Choose one of the following:

1. Create Primary DOS Partition
2. Create Extended DOS Partition
3. Create Logical DOS Drive(s) in the Extended DOS Partition

Enter choice: [ 1 ]
```

Choose option 1 - Create primary DOS Partition. FDISK verifies the integrity of your drive and will ask you if want to use the maximum available size of your hard disk to create the primary partition and set it active. To keep things simple we will create one large partition. Choose "Y" to use maximum available space. When the partition has been created successfully you will be notified by the system. Your drive is now known as C: (C drive). Press "Esc" to return to the menu. Press "Esc" again to exit FDISK. You need to restart your system for the changes to take affect. Leave boot disk in the drive.

When the system reboots, choose start without CD-ROM from the boot disk menu. While booting from floppy disk you might get error message like "Invalid media type reading drive C" this is OK for this stage as the hard disk is not formatted.

From A: command prompt type **format c:**

You will get a message saying "WARNING, ALL DATA ON NON-REMOVABLE DISK DRIVE C: WILL BE LOST. Proceed with Format (Y/N)?".

Don't worry about the message as you do not have any data in the new hard disk. Choose "Y". The format will proceed and would show you a progress indicator. The time it takes to format a hard disk depends on the size and speed of the drive. This could be around 5-30 minutes. Once the format is complete you need to reset your system. You are now ready to install an operating system.

- Restart you computer with the Windows 98 Startup disk in the floppy disk drive.
- When the Windows 98 Startup menu is displayed, select the Start computer without CD-ROM support menu option, and then press ENTER.
- When a command prompt is displayed, type format c:, and then press ENTER.
- When you successfully run the Format.com utility, you receive the following message: WARNING, ALL DATA ON NON-REMOVABLE DISK DRIVE C: WILL BE LOST! Proceed with Format (Y/N)? Press Y, and then press ENTER to format drive C.
- After the format procedure is finished, you receive the following message: Volume label (11 characters, ENTER for none)? This is an optional feature that you can use to type a name for the hard disk. Type an 11-character name for the drive, or leave it blank, and then press ENTER.
- After you partition and format your hard disk, you can install Windows 98:
- Insert the Windows 98 Startup disk in your floppy disk drive, and then restart your computer
- When the Windows 98 Startup menu is displayed, select the **Start computer with CD-ROM support** menu option, and then press ENTER
- Insert the Windows 98 CD-ROM in the CD-ROM drive, type the following command at a command prompt, and then press ENTER X:\setup where X is the drive letter that is assigned to your CD-ROM drive. (Usually D or E).
- When you receive the following message, press ENTER, and then follow the instructions on the screen to complete the Setup procedure:

"Please wait while the Setup initializes. Setup is now going to perform a routine check on your system. To continue press Enter."

Here are a few helpful links to the Microsoft web site that should help you through the setup process.

- [Description of Windows 98 Setup Process](#)



- [How to install Windows 98: Helpful Tips and Suggestions](#)

For more information, see our [Cascade Web site](#) and visit our [contact page](#).