

# Dictionary of Computer and Internet Terms

Eighth Edition

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About the Auth  
To the Reader

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Visual Dictiona  
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## QUALITY

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of integrated circuits  
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*Mega-* is derived from  
IC PREFIXES.

nory equal to  $2^{20}$  =  
te can store more than

imes means the same  
r, *megabyte* is used to  
1024 × 1000). These  
ferent numbers being  
*See also* GIGABYTE.

per second, a measure  
of a radio signal. *See*

e size of a graphical  
is often referred to as  
ixels are needed for

various levels of image quality. *See also* DIGITAL CAMERA; PHOTOPAINT PROGRAM; EFFECTIVE MEGAPIXELS; GROSS MEGAPIXELS.

**meme virus** an idea or belief that spreads quickly from person to person, like an infection, whether or not it is true; meme viruses do to the human mind what computer viruses do to software.

End-of-the-world predictions, fads, and hoaxes are examples of meme viruses. Some people deliberately spread meme viruses on the Internet. *See* HOAX.

The term *meme* was introduced by evolutionary biologist Richard Dawkins in 1976 to denote important ideas, skills, or habits that are passed along from person to person, almost like genes.

**memory** (formerly called *core*) the space within a computer where information is stored while being actively worked on. Most microcomputers have a small amount of read-only memory (ROM), containing the built-in programs that start the operation of the computer when it is turned on, and a large amount of random-access memory (RAM) for user's programs and data. Except for ROM, memory goes blank when the computer is turned off; any data in it must be copied to disk or tape to be saved.

*See also* EXPANDED MEMORY; EXTENDED MEMORY; MS-DOS; SIMM; DRAM; EDO; FPM; SDRAM; RDRAM.

**memory leak** *see* LEAK.

**MemoryStick** a type of flash-memory non-volatile storage device similar to CompactFlash but physically long and thin, developed by Sony Corporation. *Compare* COMPACTFLASH; SMARTMEDIA; SECURE DIGITAL; MULTIMEDIACARD; FLASHCARD.

**Memphis** Microsoft's internal code name for the Windows 98 development project. *See* WINDOWS 98. *Compare* CHICAGO; CAIRO.

**menu** a list of choices that appears on the screen in response to your actions. Most windows have a MENU BAR just under the title bar. When you click on an item in the menu bar, its corresponding menu will appear. You select the command you want by moving the mouse pointer to it. Commands with ellipsis dots (...) after them will pop up a dialog box for you to give the computer further instructions before executing the command. If there are keyboard shortcuts for any command, they will often be listed to the right of the command.

Menus make a program user-friendly. It's very easy to learn and use software with a menu-driven command system. You don't need to memorize all the commands. By looking at the menus, you can see all the options.

The problem with menus is that it often takes a substantial amount of time and mouse movement to work through them. Experienced users use the keyboard shortcuts to speed up their work. Also, if you are not careful, it is possible to get lost in a series of nested menus. Many

o UNIX that enables com-  
NFS was developed by Sun  
ers from a wide variety of  
FILE SERVER.

”

ard inside a computer that  
the first step in networking

rechargeable battery often  
m batteries are toxic and  
*see also* LI-ION.

chargeable battery electri-  
it having greater capacity.

another type of machine)

ch as a linked list or tree.  
line that helps define the  
CUSP NODE.

not indicate a place where  
he hyphenated word “flip-  
” can appear on one line,  
f you type “flip-flop” with  
Microsoft Word, to type a  
e hyphen key together.

ot denote a place where  
. For instance, you might  
”) to be split at the end of  
aces between them rather  
e is typed as ~ (TILDE). In  
ed by pressing Ctrl-Shift

ising that produces plain-  
yphenation, page breaks,  
saving a file in nondocu-  
choose “text file” or “text

the entire screen in one

**non-volatile** not erased when turned off. Disks are a non-volatile stor-  
age medium; memory (RAM) is volatile.

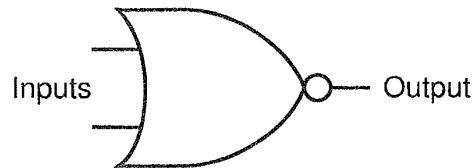


FIGURE 184. NOR gate (logic symbol)

**NOR gate** (Figure 184) a logic gate whose output is 0 when either or  
both of the two inputs is 1, thus:

Inputs		Output
0	0	1
0	1	0
1	0	0
1	1	0

A NOR gate is equivalent to an OR gate followed by a NOT gate. NOR  
gates are important because all the other types of logic circuits can be  
built from them. *See* LOGIC CIRCUITS.

**Norton Utilities** a set of programs originally written by Peter Norton  
and now a product of Symantec Corporation, for Macintosh and PC-  
compatible computers. Their most important function is to recover  
erased files and correct other problems with disks. *See* RECOVERING  
ERASED FILES.

## NOS

**1. (Network Operating System)** any special operating system or oper-  
ating system extension that supports networking. For an example, *see*  
NOVELL NETWARE.

**2. (New Old Stock)** old but never sold to a customer and still in orig-  
inal packaging; this describes parts for obsolete equipment or the like.  
*Compare* LNIB.

**notebook** a computer about the same size as a looseleaf notebook,  
weighing less than 6 pounds (2.7 kg). Notebooks are slightly smaller  
than laptop computers, which can weigh up to 8 pounds (3.6 kg).

*Usage note:* The distinction between “laptop” and “notebook” has  
become blurred; all present-day laptop computers are notebooks by the  
standards of a few years ago.

conversations through the Internet or through IP networks. Several protocols are used for this purpose. *See* INTERNET TELEPHONY; PROTOCOL.

**voken** (virtual token) an advertisement that appears over the contents of a browser window, but not in a window of its own. *Compare* POP-UP AD.

The voken can move around the screen, rotate, and blink to attract attention. A moving voken can trick you into clicking on it — thus going to the advertiser's site — when you meant to click on something else, but it got in the way.

**volatile** not permanent; erased when turned off. The memory (RAM) of a computer is volatile; that is, it goes blank when power is removed. Flash memory and disks are non-volatile. In some programming languages, a variable is declared *volatile* if it can be changed by something outside the program.

**volt** the unit of measure of electric potential. If a potential of 1 volt is applied to a resistance of 1 ohm, then a current of 1 ampere will flow through the resistance. (*See* OHM'S LAW.)

### volume

1. an individual diskette, disk, or tape.
2. the perceived loudness of a sound. The volume control on a sound card may be a knob on the card itself, a setting made in software, or both.

**volume serial number** an identifying number assigned to a diskette, disk, or tape by OS/2, Windows 95 and later, or other operating systems. Volume serial numbers ensure that the computer will know when the disk or tape in a drive is changed.

**Von Neumann architecture** a type of computer design in which programs and data are stored in a single kind of memory. *Contrast* HARVARD ARCHITECTURE. *See* COMPUTER ARCHITECTURE.

**Von Neumann, John** (1903–1957) mathematician who worked on one of the earliest computers and developed the concept of storing programs in memory.

**VPN** (virtual private network) a network where data is transferred over the Internet using security features preventing unauthorized access.

**VRAM** (video random access memory) RAM that is specially designed for use in video cards. Commonly, it can be read and written simultaneously so that the generation of the display is not interrupted when the CPU needs to place data in it.

**VRML** (Virtual Reality Markup Language or Virtual Reality Modeling Language) a programming language developed by Mark Pesce and Tony Parisi to describe three-dimensional objects for graphical display. A VRML program describes a “world” of virtual objects that a person

#VRML V1.0 ascii

```
Separator {
  Separator {
    # Black
    Transform
    Material
    Cube { w
  }
  Separator {
    # Ball
    Transform
    Material

    Sphere {
  }
  Separator {
    # Middle
    Material
    Cube { w
  }
  Separator {
    # Block
    Transform
    Cube { w
  }
  Separator {
    # Block
    Transform
    Cube { w
  }
}
```

FIGUF

can walk or fly through from a specified position can respond to motion

Figure 302 shows It depicts a sphere in a language, a “separate shapes. Figure 303: with a VRML BROW programs can provide

**VSN** *see* VOLUME SERIAL

**VT-100** a computer that had a major improvement provided convenient the screen, and self SCREEN CONTROL). personal-computer implementations of