

ANNEXURE - II

Internet Glossary

Source: <http://www.matisse.net/files/glossary.html>

1xRTT (Single Carrier (1x) Radio Transmission Technology)

A wireless communications protocol used for connections to networks by devices such as laptop computers. 1xRTT has the capability of providing data transfer speeds of up to 144 thousand bps. 1xRTT is built on top of another widely used protocol, CDMA and is also called CMDA2000.

ADN (Advanced Digital Network)

Usually refers to a 56Kbps leased-line.

ADSL (Asymmetric Digital Subscriber Line)

A DSL line where the upload speed is different from the download speed. Usually the download speed is much greater.

Ajax (Asynchronous JavaScript and XML)

A way of including content in a web page in which javascript code in the web page fetches some data from a server and displays it without re-fetching the entire surrounding page at the same time (hence the 'Asynchronous') Often (but not always) the data fetched by the javascript code is in XML format. It is common for Ajax applications to update the Ajax content multiple times without the surrounding page needing to be updated even once. A simple example of Ajax would be a weather-forecast box in the middle of a web page. Ajax could be used to populate the box every 5 minutes without needing to refresh the surrounding page.

Apache

The most common web server (or HTTP server) software on the Internet. Apache is an open-source application originally created from a series of changes ("patches") made to a web server written at the National Center for Supercomputing Applications, the same place the Mosaic web browser was created. Apache is designed as a set of modules, enabling administrators to choose which features they wish to use and making it easy to add features to meet specific needs including handling protocols other than the web-standard HTTP.

Applet

A small Java program that can be embedded in an HTML page. Applets differ from full-fledged Java applications in that they are not allowed to access certain resources on the local computer, such as files and serial devices (modems, printers, etc.), and are prohibited from communicating with most other computers across a network. The common rule is that an applet can only make an Internet connection to the computer from which the applet was sent.

Application Server

Server software that manages one or more other pieces of software in a way that makes the managed software available over a network, usually to a Web server. By having a piece of software manage other software packages it is possible to use resources like memory and database access more efficiently than if each of the managed packages responded directly to requests.

Archie

A tool (software) for finding files stored on anonymous FTP sites. You need to know the exact file name or a substring of it. By 1999 Archie had been almost completely replaced by web-based search engines. Back when FTP was the main way people moved files over the Internet archie was quite popular.

ARPANet (Advanced Research Projects Agency Network)

The precursor to the Internet. Developed in the late 60's and early 70's by the US Department of Defense as an experiment in wide-area-networking to connect together computers that were each running different system so that people at one location could use computing resources from another location.

ASCII (American Standard Code for Information Interchange)

This is the defacto world-wide standard for the code numbers used by computers to represent all the upper and lower-case Latin letters, numbers, punctuation, etc. There are 128 standard ASCII codes each of which can be represented by a 7 digit binary number: 0000000 through 1111111.

ASP (Application Service Provider)

A organization (usually a business) that runs one or more applications on their own servers and provides (usually for a fee) access to others. Common examples of services provided this way include web-based software such as Calendar systems, Human Resources tools (timesheets, benefits, etc.), and various applications to help groups collaborate on projects.

Atom

An evolving protocol for syndication and sharing of content. Atom is being developed as a sucesor to and improvement over RSS and is more complex than RSS while offering support for additional features such digital signatures, geographic location of author, possibly security/encryption, licensing, etc. Like RSS, Atom is an XML-based specification.

Backbone

A high-speed line or series of connections that forms a major pathway within a network. The term is relative as a backbone in a small network will likely be much smaller than many non-backbone lines in a large network.

Bandwidth

How much stuff you can send through a connection. Usually measured in bits-per-second (bps.) A full page of English text is about 16,000 bits. A fast modem can move about 57,000 bits in one second. Full-motion full-screen video would require roughly 10,000,000 bits-per-second, depending on compression.

Baud

In common usage the baud rate of a modem is how many bits it can send or receive per second. Technically, baud is the number of times per second that the carrier signal shifts value - for example a 1200 bit-per-second modem actually runs at 300 baud, but it moves 4 bits per baud (4 x 300= 1200 bits per second).

BBS (Bulletin Board System)

A computerized meeting and announcement system that allows people to carry on discussions, upload and download files, and make announcements without the people being connected to the computer at the same time. In the early 1990's there were many thousands (millions?) of BBS's around the world, most were very small, running on a single IBM clone PC with 1 or 2 phone lines. Some were very large and the line between a BBS and a system like AOL gets crossed at some point, but it is not clearly drawn.

Binary

Information consisting entirely of ones and zeros. Also, commonly used to refer to files that are not simply text files, e.g. images.

Binhex (BINary HEXadecimal)

A method for converting non-text files (non-ASCII) into ASCII. This is needed because Internet e-mail can only handle ASCII.

Bit (Binary DigIT)

A single digit number in base-2, in other words, either a 1 or a zero. The smallest unit of computerized data. Bandwidth is usually measured in bits-per-second.

BITNET (Because It's Time NETwork (or Because It's There NETwork))

A network of educational sites separate from the Internet, but e-mail is freely exchanged between BITNET and the Internet. Listservs®, a popular form of e-mail discussion groups, originated on BITNET. At its peak (the late 1980's and early 1990's) BITNET machines were usually mainframes, often running IBM's MVS operating system. BITNET is probably the only international network that is shrinking.

Blog (weB LOG)

A blog is basically a journal that is available on the web. The activity of updating a blog is "blogging" and someone who keeps a blog is a "blogger." Blogs are typically updated daily using software that allows people with little or no technical background to update and maintain the blog. Postings on a blog are almost always arranged in chronological order with the most recent additions featured most prominently. It is common for blogs to be available as RSS feeds.

Blogsphere or Blogosphere

The current state of all information available on blogs and/or the sub-culture of those who create and use blogs.

bps (Bits-Per-Second)

A measurement of how fast data is moved from one place to another. A 56K modem can move about 57,000 bits per second.

Broadband

Generally refers to connections to the Internet with much greater bandwidth than you can get with a modem. There is no specific definition of the speed of a "broadband" connection but in general any Internet connection using DSL or a via Cable-TV may be considered a broadband connection.

Browser

A Client program (software) that is used to look at various kinds of Internet resources.

BTW (By The Way)

A shorthand appended to a comment written in an online forum.

Byte

A set of Bits that represent a single character. Usually there are 8 Bits in a Byte, sometimes more, depending on how the measurement is being made.

CATP (Caffeine Access Transport Protocol)

Common method of moving caffeine across Wide Area Networks such as the Internet. CATP was first used at the Binary Cafe in Cybertown and quickly spread world-wide. There are reported problems with short-circuits and rust and decaffeinated beverages were not supported until version 1.5.3

CDMA (Code Division Multiple Access)

A protocol for wireless data and voice communication, CMDA is widely used in cellphone networks, but also in many other data communications systems. CDMA uses a technique called "Spread Spectrum" whereby the data being transmitted is spread across multiple radio frequencies, making

more efficient use of available radio spectrum. There are a number of additional protocols built on top of CDMA, such as 1xRTT (also called CMDA2000).

Certificate Authority

An issuer of Security Certificates used in SSL connections.

CGI (Common Gateway Interface)

A set of rules that describe how a Web Server communicates with another piece of software on the same machine, and how the other piece of software (the ?CGI program?) talks to the web server. Any piece of software can be a CGI program if it handles input and output according to the CGI standard.

cgi-bin

The most common name of a directory on a web server in which CGI programs are stored.

Client

A software program that is used to contact and obtain data from a Server software program on another computer, often across a great distance. Each Client program is designed to work with one or more specific kinds of Server programs, and each Server requires a specific kind of Client. A Web Browser is a specific kind of Client.

co-location

Most often used to refer to having a server that belongs to one person or group physically located on an Internet-connected network that belongs to another person or group. Usually this is done because the server owner wants their machine to be on a high-speed Internet connection and/or they do not want the security risks of having the server on their own network.

Cookie

The most common meaning of "Cookie" on the Internet refers to a piece of information sent by a Web Server to a Web Browser that the Browser software is expected to save and to send back to the Server whenever the browser makes additional requests from the Server.

Depending on the type of Cookie used, and the Browsers' settings, the Browser may accept or not accept the Cookie, and may save the Cookie for either a short time or a long time.

Cookies might contain information such as login or registration information, online "shopping cart" information, user preferences, etc.

When a Server receives a request from a Browser that includes a Cookie, the Server is able to use the information stored in the Cookie. For example, the

Server might customize what is sent back to the user, or keep a log of particular users' requests.

Cookies are usually set to expire after a predetermined amount of time and are usually saved in memory until the Browser software is closed down, at which time they may be saved to disk if their "expire time" has not been reached.

Cookies do not read your hard drive and send your life story to the CIA, but they can be used to gather more information about a user than would be possible without them.

CSS (Cascading Style Sheet)

A standard for specifying the appearance of text and other elements. CSS was developed for use with HTML in Web pages but is also used in other situations, notably in applications built using XPFE. CSS is typically used to provide a single "library" of styles that are used over and over throughout a large number of related documents, as in a web site. A CSS file might specify that all numbered lists are to appear in italics. By changing that single specification the look of a large number of documents can be easily changed.

Cyberpunk

Cyberpunk was originally a cultural sub-genre of science fiction taking place in a not-so-distant, dystopian, over-industrialized society. The term grew out of the work of William Gibson and Bruce Sterling and has evolved into a cultural label encompassing many different kinds of human, machine, and punk attitudes. It includes clothing and lifestyle choices as well.

Cyberspace

Term originated by author William Gibson in his novel *Neuromancer* the word Cyberspace is currently used to describe the whole range of information resources available through computer networks.

DHCP (Dynamic Host Configuration Protocol)

DHCP is a protocol by which a machine can obtain an IP number (and other network configuration information) from a server on the local network.

DHTML (Dynamic HyperText Markup Language)

DHTML refers to web pages that use a combination of HTML, JavaScript, and CSS to create features such as letting the user drag items around on the web page, some simple kinds of animation, and many more.

Digerati

The digital version of literati, it is a reference to a vague cloud of people seen to be knowledgeable, hip, or otherwise in-the-know in regardsto the digital revolution.

DNS (Domain Name System)

The Domain Name System is the system that translates Internet domain names into IP numbers. A "DNS Server" is a server that performs this kind of translation.

Domain Name

The unique name that identifies an Internet site. Domain Names always have 2 or more parts, separated by dots. The part on the left is the most specific, and the part on the right is the most general. A given machine may have more than one Domain Name but a given Domain Name points to only one machine. For example, the domain names:

matisse.net
mail.matisse.net
workshop.matisse.net

can all refer to the same machine, but each domain name can refer to no more than one machine.

Usually, all of the machines on a given Network will have the same thing as the right-hand portion of their Domain Names (matisse.net in the examples above). It is also possible for a Domain Name to exist but not be connected to an actual machine. This is often done so that a group or business can have an Internet e-mail address without having to establish a real Internet site. In these cases, some real Internet machine must handle the mail on behalf of the listed Domain Name.

Download

Transferring data (usually a file) from a another computer to the computer you are are using. The opposite of upload.

DSL (Digital Subscriber Line)

A method for moving data over regular phone lines. A DSL circuit is much faster than a regular phone connection, and the wires coming into the subscriber's premises are the same (copper) wires used for regular phone service. A DSL circuit must be configured to connect two specific locations, similar to a leased line (howevrr a DSL circuit is not a leased line).

A common configuration of DSL allows downloads at speeds of up to 1.544 megabits (not megabytes) per second, and uploads at speeds of 128 kilobits per second. This arrangement is called ADSL: Asymmetric Digital Subscriber Line.

Another common configuration is symmetrical: 384 Kilobits per second in both directions.

In theory ADSL allows download speeds of up to 9 megabits per second and upload speeds of up to 640 kilobits per second.

DSL is now a popular alternative to Leased Lines and ISDN, being faster than ISDN and less costly than traditional Leased Lines.

Email (Electronic Mail)

Messages, usually text, sent from one person to another via computer. E-mail can also be sent automatically to a large number of addresses.

Ethernet

A very common method of networking computers in a LAN.

There is more than one type of Ethernet. By 2001 the standard type was "100-BaseT" which can handle up to about 100,000,000 bits-per-second and can be used with almost any kind of computer.

Extranet

An intranet that is accessible to computers that are not physically part of a company's own private network, but that is not accessible to the general public, for example to allow vendors and business partners to access a company web site.

Often an intranet will make use of a Virtual Private Network. (VPN.)

FAQ (Frequently Asked Questions)

FAQs are documents that list and answer the most common questions on a particular subject. There are hundreds of FAQs on subjects as diverse as Pet Grooming and Cryptography. FAQs are usually written by people who have tired of answering the same question over and over.

FDDI (Fiber Distributed Data Interface)

A standard for transmitting data on optical fiber cables at a rate of around 100,000,000 bits-per-second (10 times as fast as 10-BaseTEthernet, about twice as fast as T-3).

Finger

An Internet software tool for locating people on other Internet sites. Finger is also sometimes used to give access to non-personal information, but the most common use is to see if a person has an account at a particular Internet site. Many sites do not allow incoming Finger requests, but many do.

Fire Wall

A combination of hardware and software that separates a Network into two or more parts for security purposes.

Flame

Originally, "flame" meant to carry forth in a passionate manner in the spirit of honorable debate. Flames most often involved the use of flowery language and flaming well was an art form. More recently flame has come to refer to any kind of derogatory comment no matter how witless or crude.

Flame War

When an online discussion degenerates into a series of personal attacks against the debators, rather than discussion of their positions. A heated exchange.

FTP (File Transfer Protocol)

A very common method of moving files between two Internet sites.

FTP is a way to login to another Internet site for the purposes of retrieving and/or sending files. There are many Internet sites that have established publicly accessible repositories of material that can be obtained using FTP, by logging in using the account name "anonymous", thus these sites are called "anonymous ftp servers".

FTP was invented and in wide use long before the advent of the World Wide Web and originally was always used from a text-only interface.

Gateway

The technical meaning is a hardware or software set-up that translates between two dissimilar protocols, for example America Online has a gateway that translates between its internal, proprietary e-mail format and Internet e-mail format. Another, sloppier meaning of gateway is to describe any mechanism for providing access to another system, e.g. AOL might be called a gateway to the Internet.

GIF (Graphic Interchange Format)

A common format for image files, especially suitable for images containing large areas of the same color. GIF format files of simple images are often smaller than the same file would be if stored in JPEG format, but GIF format does not store photographic images as well as JPEG.

Gigabyte

1000 or 1024 Megabytes, depending on who is measuring.

Gopher

Invented at the University of Minnesota in 1993 just before the Web, gopher was a widely successful method of making menus of material available over the Internet.

Gopher was designed to be much easier to use than FTP, while still using a text-only interface.

Gopher is a Client and Server style program, which requires that the user have a Gopher Client program. Although Gopher spread rapidly across the globe in only a couple of years, it has been largely supplanted by Hypertext, also known as WWW (World Wide Web). There are still thousands of Gopher Servers on the Internet and we can expect they will remain for a while.

hit

As used in reference to the World Wide Web, "hit" means a single request from a web browser for a single item from a web server; thus in order for a web browser to display a page that contains 3 graphics, 4 "hits" would occur at the server: 1 for the HTML page, and one for each of the 3 graphics.

Home Page (or Homepage)

Several meanings. Originally, the web page that your browser is set to use when it starts up. The more common meaning refers to the main web page for a business, organization, person or simply the main page out of a collection of web pages, e.g. "Check out so-and-so's new Home Page."

Host

Any computer on a network that is a repository for services available to other computers on the network. It is quite common to have one host machine provide several services, such as SMTP (email) and HTTP (web).

HTML (HyperText Markup Language)

The coding language used to create Hypertext documents for use on the World Wide Web. HTML looks a lot like old-fashioned typesetting code, where you surround a block of text with codes that indicate how it should appear. The "hyper" in Hypertext comes from the fact that in HTML you can specify that a block of text, or an image, is linked to another file on the Internet. HTML files are meant to be viewed using a "Web Browser". HTML is loosely based on a more comprehensive system for markup called SGML, and is expected to eventually be replaced by XML-based XHTML standards.

HTTP (HyperText Transfer Protocol)

The protocol for moving hypertext files across the Internet. Requires a HTTP client program on one end, and an HTTP server program (such as Apache) on the other end. HTTP is the most important protocol used in the World Wide Web (WWW).

Hypertext

Generally, any text that contains links to other documents - words or phrases in the document that can be chosen by a reader and which cause another document to be retrieved and displayed.

IMAP (Internet Message Access Protocol)

IMAP is gradually replacing POP as the main protocol used by email clients in communicating with email servers.

Using IMAP an email client program can not only retrieve email but can also manipulate message stored on the server, without having to actually retrieve the messages. So messages can be deleted, have their status changed, multiple mail boxes can be managed, etc.

IMAP is defined in RFC 2060

IMHO (In My Humble Opinion)

A shorthand appended to a comment written in an online forum, IMHO indicates that the writer is aware that they are expressing a debatable view, probably on a subject already under discussion. One of many such shorthands in common use online, especially in discussion forums.

internet (Lower case i)

Any time you connect 2 or more networks together, you have an internet - as in inter-national or inter-state.

Internet (Upper case I)

The vast collection of inter-connected networks that are connected using the TCP/IP protocols and that evolved from the ARPANET of the late 60's and early 70's.

The Internet connects tens of thousands of independent networks into a vast global internet and is probably the largest Wide Area Network in the world.

Intranet

A private network inside a company or organization that uses the same kinds of software that you would find on the public Internet, but that is only for internal use. Compare with extranet.

IP Number (Internet Protocol Number)

Sometimes called a dotted quad. A unique number consisting of 4 parts separated by dots, e.g. 165.113.245.2

Every machine that is on the Internet has a unique IP number - if a machine does not have an IP number, it is not really on the Internet. Many machines

(especially servers) also have one or more Domain Names that are easier for people to remember.

IPv4 (Internet Protocol, version 4)

The most widely used version of the Internet Protocol (the "IP" part of TCP/IP.) IPv4 allows for a theoretical maximum of approximately four billion IP Numbers (technically 2^{32}), but the actual number is far less due to inefficiencies in the way blocks of numbers are handled by networks. The gradual adoption of IPv6 will solve this problem.

IPv6 (Internet Protocol, version 6)

The successor to IPv4. Already deployed in some cases and gradually spreading, IPv6 provides a huge number of available IP Numbers - over a sextillion addresses (theoretically 2^{128}). IPv6 allows every device on the planet to have its own IP Number.

IRC (Internet Relay Chat)

Basically a huge multi-user live chat facility. There are a number of major IRC servers around the world which are linked to each other. Anyone can create a channel and anything that anyone types in a given channel is seen by all others in the channel. Private channels can (and are) created for multi-person conference calls.

ISDN (Integrated Services Digital Network)

Basically a way to move more data over existing regular phone lines. ISDN is available to much of the USA and in most markets it is priced very comparably to standard analog phone circuits. It can provide speeds of roughly 128,000 bits-per-second over regular phone lines. In practice, most people will be limited to 56,000 or 64,000 bits-per-second.

Unlike DSL, ISDN can be used to connect to many different locations, one at a time, just like a regular telephone call, as long as the other location also has ISDN.

ISP (Internet Service Provider)

An institution that provides access to the Internet in some form, usually for money.

IT (Information Technology)

A very general term referring to the entire field of Information Technology - anything from computer hardware to programming to network management. Most medium and large size companies have IT Departments.

Java

Java is a network-friendly programming language invented by Sun Microsystems. Java is often used to build large, complex systems that

involve several different computers interacting across networks, for example transaction processing systems. Java is also used to create software with graphical user interfaces such as editors, audio players, web browsers, etc. Java is also popular for creating programs that run in small electronic devices, such as mobile telephones.

Using small Java programs (called "Applets"), Web pages can include functions such as animations, calculators, and other fancy tricks.

JavaScript

JavaScript is a programming language that is mostly used in web pages, usually to add features that make the web page more interactive. When JavaScript is included in an HTML file it relies upon the browser to interpret the JavaScript. When JavaScript is combined with Cascading Style Sheets (CSS), and later versions of HTML (4.0 and later) the result is often called DHTML.

JDK (Java Development Kit)

A software development package from Sun Microsystems that implements the basic set of tools needed to write, test and debug Java applications and applets

JPEG (Joint Photographic Experts Group)

JPEG is most commonly mentioned as a format for image files. JPEG format is preferred to the GIF format for photographic images as opposed to line art or simple logo art.

Kilobyte

A thousand bytes. Actually, usually 1024 (2¹⁰) bytes.

LAN (Local Area Network)

A computer network limited to the immediate area, usually the same building or floor of a building.

Leased Line

Refers to line such as a telephone line or fiber-optic cable that is rented for exclusive 24-hour, 7-days-a-week use from your location to another location. The highest speed data connections require a leased line.

Linux

A widely used Open Source Unix-like operating system. Linux was first released by its inventor Linus Torvalds in 1991. There are versions of Linux for almost every available type of computer hardware from desktop machines to IBM mainframes. The inner workings of Linux are open and available for anyone to examine and change as long as they make their changes available to the public. This has resulted in thousands of people

working on various aspects of Linux and adaptation of Linux for a huge variety of purposes, from servers to TV-recording boxes.

Listserv ®

The most common kind of maillist, "Listserv" is a registered trademark of L-Soft international, Inc. Listservs originated on BITNET but they are now common on the Internet.

Login

Noun or a verb.

Noun: The account name used to gain access to a computer system. Not a secret (contrast with Password).

Verb: The act of connecting to a computer system by giving your credentials (usually your "username" and "password")

Maillist

(or Mailing List) A (usually automated) system that allows people to send e-mail to one address, whereupon their message is copied and sent to all of the other subscribers to the maillist. In this way, people who have many different kinds of e-mail access can participate in discussions together.

Mashup

A web page or site made by automatically combining content from other sources, usually by using material available via RSS feeds and/or REST interfaces.

Megabyte

Technically speaking, a million bytes. In many cases the term means 1024 kilobytes, which is a more than an even million.

Meta Tag

A specific kind of HTML tag that contains information not normally displayed to the user. Meta tags contain information about the page itself, hence the name ("meta" means "about this subject")

Typical uses of Meta tags are to include information for search engines to help them better categorize a page.

You can see the Meta tags in a page if you view the pages' source code.

MIME (Multipurpose Internet Mail Extensions)

Originally a standard for defining the types of files attached to standard Internet mail messages. The MIME standard has come to be used in many situations where one computer program needs to communicate with another program about what kind of file is being sent.

For example, HTML files have a MIME-type of text/html, JPEG files are image/jpeg, etc.

Mirror

Generally speaking, "to mirror" is to maintain an exact copy of something. Probably the most common use of the term on the Internet refers to "mirror sites" which are web sites, or FTP sites that maintain copies of material originated at another location, usually in order to provide more widespread access to the resource. For example, one site might create a library of software, and 5 other sites might maintain mirrors of that library.

Modem (MOdulator, DEModulator)

A device that connects a computer to a phone line. A telephone for a computer. A modem allows a computer to talk to other computers through the phone system. Basically, modems do for computers what a telephone does for humans. The maximum practical bandwidth using a modem over regular telephone lines is currently around 57,000 bps.

mod_perl

An add-on for the Apache web server software, mod_perl makes it possible to use the Perl language to add new features for the Apache server, and to increase the speed of Perl applications by as much as 30 times.

MOO -- (Mud, Object Oriented)

One of several kinds of multi-user role-playing environments.

Mosaic

The first WWW browser that was available for the Macintosh, Windows, and UNIX all with the same interface. Mosaic really started the popularity of the Web. The source-code to Mosaic was licensed by several companies and used to create many other web browsers.

Mosaic was developed at the National Center for Supercomputing Applications (NCSA), at the University of Illinois in Urbana-Champaign, in Illinois, USA. The first version was released in late 1993.

MUD (Multi-User Dungeon or Dimension)

A (usually text-based) multi-user simulation environment. Some are purely for fun and flirting, others are used for serious software development, or education purposes and all that lies in between. A significant feature of most MUDs is that users can create things that stay after they leave and which other users can interact within their absence, thus allowing a world to be built gradually and collectively.

MUSE (Multi-User Simulated Environment)

One kind of MUD - usually with little or no violence.

Netiquette

The etiquette on the Internet.

Netizen

Derived from the term citizen, referring to a citizen of the Internet, or someone who uses networked resources. The term connotes civic responsibility and participation.

Netscape

A WWW Browser and the name of a company. The Netscape (tm) browser was originally based on the Mosaic program developed at the National Center for Supercomputing Applications (NCSA).

Network

Any time you connect 2 or more computers together so that they can share resources, you have a computer network. Connect 2 or more networks together and you have an internet.

Newsgroup

The name for discussion groups on USENET.

NIC (Network Information Center)

Generally, any office that handles information for a network. The most famous of these on the Internet was the InterNIC, which was where most new domain names were registered until that process was decentralized to a number of private companies. Also means "Network Interface card", which is the card in a computer that you plug a network cable into.

NNTP (Network News Transport Protocol)

The protocol used by client and server software to carry USENET postings back and forth over a TCP/IP network. If you are using any of the more common software such as Netscape, Nuntius, Internet Explorer, etc. to participate in newsgroups then you are benefiting from an NNTP connection.

Node

Any single computer connected to a network.

Open Content

Copyrighted information (such as this Glossary) that is made available by the copyright owner to the general public under license terms that allow reuse of the material, often with the requirement (as with this Glossary) that

the re-user grant the public the same rights to the modified version that the re-user received from the copyright owner.

Information that is in the Public Domain might also be considered a form of Open Content.

Open Source Software

Open Source Software is software for which the underlying programming code is available to the users so that they may read it, make changes to it, and build new versions of the software incorporating their changes. There are many types of Open Source Software, mainly differing in the licensing term under which (altered) copies of the source code may (or must be) redistributed.

Packet Switching

The method used to move data around on the Internet. In packet switching, all the data coming out of a machine is broken up into chunks, each chunk has the address of where it came from and where it is going. This enables chunks of data from many different sources to co-mingle on the same lines, and be sorted and directed along different routes by special machines along the way. This way many people can use the same lines at the same time.

You might think of several caravans of trucks all using the same road system to carry materials.

Password

A code used to gain access (login) to a locked system. Good passwords contain letters and non-letters and are not simple combinations such as virtue7. A good password might be:

5%df(29)

But don't use that one!

PDF (Portable Document Format)

A file format designed to enable printing and viewing of documents with all their formatting (typefaces, images, layout, etc.) appearing the same regardless of what operating system is used, so a PDF document should look the same on Windows, Macintosh, linux, OS/2, etc. The PDF format is based on the widely used Postscript document-description language. Both PDF and Postscript were developed by the Adobe Corporation.

Perl (Practical Extraction and Report Language)

Perl is a programming language that is widely used for both very simple, small tasks and for very large complex applications. During the 1990s it became the de-facto standard for creating CGI programs. Perl is known for providing many ways to accomplish the same task, with "there's more than one way to do it" being something of a motto in the Perl community.

Because it is so easy to perform simple tasks in Perl it is often used by people with little or no formal programming training, and because Perl provides many sophisticated features it is often used by professionals for creating complex data-processing software, including the "server-side" of large web sites. Perl does not provide significant support for creating programs with a graphical user interface.

Permalink

A "permanent link" to a particular posting in a blog. A permalink is a URI that points to a specific blog posting, rather than to the page in which the posting original occurred (which may no longer contain the posting.)

PHP (PHP: Hypertext Preprocessor)

PHP is a programming language used almost exclusively for creating software that is part of a web site. The PHP language is designed to be intermingled with the HTML that is used to create web pages. Unlike HTML, the PHP code is read and processed by the web server software (HTML is read and processed by the web browser software.)

ping

To check if a server is running. From the sound that a sonar systems makes in movies, you know, when they are searching for a submarine.

Plug-in

A (usually small) piece of software that adds features to a larger piece of software. Common examples are plug-ins for the Netscape® browser and web server. Adobe Photoshop® also uses plug-ins.

PNG (Portable Network Graphics)

PNG is a graphics format specifically designed for use on the World Wide Web. PNG enable compression of images without any loss of quality, including high-resolution images. Another important feature of PNG is that anyone may create software that works with PNG images without paying any fees - the PNG standard is free of any licensing costs.

podcasting or pod-casting

A form of audio broadcasting using the Internet, podcasting takes its name from a combination of "iPod" and broadcasting. iPod is the immensely popular digital audio player made by Apple computer, but podcasting does not actually require the use of an iPod. Podcasting involves making one or more audio files available as "enclosures" in an RSS feed. A pod-caster creates a list of music, and/or other sound files (such as recorded poetry, or "talk radio" material) and makes that list available in the RSS 2.0 format. The list can then be obtained by other people using various podcast "retriever" software which read the feed and makes the audio files available to digital audio devices (including, but not limited to iPods) where users may then listen to them at their convenience.

POP (Point of Presence, also Post Office Protocol)

Two commonly used meanings: Point of Presence and Post Office Protocol.

A Point of Presence usually means a city or location where a network can be connected to, often with dial up phone lines. So if an Internet company says they will soon have a POP in Belgrade, it means that they will soon have a local phone number in Belgrade and/or a place where leased lines can connect to their network.

A second meaning, Post Office Protocol refers to a way that e-mail client software such as Eudora gets mail from a mail server. When you obtain an account from an Internet Service Provider (ISP) you almost always get a POP account with it, and it is this POP account that you tell your e-mail software to use to get your mail. Another protocol called IMAP is replacing POP for email.

Port

3 meanings. First and most generally, a place where information goes into or out of a computer, or both. E.g. the serial port on a personal computer is where a modem would be connected.

On the Internet port often refers to a number that is part of a URL, appearing after a colon (:) right after the domain name. Every service on an Internet server listens on a particular port number on that server. Most services have standard port numbers, e.g. Web servers normally listen on port 80. Services can also listen on non-standard ports, in which case the port number must be specified in a URL when accessing the server, so you might see a URL of the form:

```
gopher://peg.cwis.uci.edu:7000/
```

This shows a gopher server running on a non-standard port (the standard gopher port is 70).

Finally, port also refers to translating a piece of software to bring it from one type of computer system to another, e.g. to translate a Windows program so that it will run on a Macintosh.

Portal

Usually used as a marketing term to describe a Web site that is or is intended to be the first place people see when using the Web. Typically a "Portal site" has a catalog of web sites, a search engine, or both. A Portal site may also offer email and other service to entice people to use that site as their main "point of entry" (hence "portal") to the Web.

Posting

A single message entered into a network communications system.

PPP (Point to Point Protocol)

The most common protocol used to connect home computers to the Internet over regular phone lines.

Most well known as a protocol that allows a computer to use a regular telephone line and a modem to make TCP/IP connections and thus be really and truly on the Internet.

Protocol

On the Internet "protocol" usually refers to a set of rules that define an exact format for communication between systems. For example the HTTP protocol defines the format for communication between web browsers and web servers, the IMAP protocol defines the format for communication between IMAP email servers and clients, and the SSL protocol defines a format for encrypted communications over the Internet. Virtually all Internet protocols are defined in RFC documents.

Proxy Server

A Proxy Server sits in between a Client and the "real" Server that a Client is trying to use. Clients are sometimes configured to use a Proxy Server, usually an HTTP server. The client makes all of its requests from the Proxy Server, which then makes requests from the "real" server and passes the result back to the Client. Sometimes the Proxy server will store the results and give a stored result instead of making a new one (to reduce use of a Network). Proxy servers are commonly established on Local Area Networks

PSTN (Public Switched Telephone Network)

The regular old-fashioned telephone system.

RDF (Resource Definition Framework)

A set of rules (a sort of language) for creating descriptions of information, especially information available on the World Wide Web. RDF could be used to describe a collection of books, or artists, or a collection of web pages as in the RSS data format which uses RDF to create machine-readable summaries of web sites.

RDF is also used in XPFE applications to define the relationships between different collections of elements, for example RDF could be used to define the relationship between the data in a database and the way that data is displayed to a user.

REST (REpresentational State Transfer)

A loosely defined specification for HTTP-based services where all of the information required to process a request is present in the initial request and where each request receives only a single response, and where the response is in a machine-readable form. An example could be a service that accepts HTTP requests for a search and returns the result as an XML document.

RFC (Request For Comments)

The name of the result and the process for creating a standard on the Internet. New standards are proposed and published on the Internet, as a Request For Comments. The proposal is reviewed by the Internet Engineering Task Force (<http://www.ietf.org/>), a consensus-building body that facilitates discussion, and eventually a new standard is established, but the reference number/name for the standard retains the acronym RFC, e.g. the official standard for e-mail message formats is RFC 822.

Router

A special-purpose computer (or software package) that handles the connection between 2 or more Packet-Switched networks. Routers spend all their time looking at the source and destination addresses of the packets passing through them and deciding which route to send them on.

RSS (Rich Site Summary or RDF Site Summary or Real Simple Syndication)

A commonly used protocol for syndication and sharing of content, originally developed to facilitate the syndication of news articles, now widely used to share the contents of blogs. Mashups are often made using RSS feeds. RSS is an XML-based summary of a web site, usually used for syndication and other kinds of content-sharing. There are RSS "feeds" which are sources of RSS information about web sites, and RSS "readers" which read RSS feeds and display their content to users. RSS is being overtaken by a newer, more complex protocol called Atom.

RTSP (Real Time Streaming Protocol)

RTSP is an official Internet standard (RFC 2326) for delivering and receiving streams of data such as audio and video. The standard allows for both real-time ("live") streams of data and streams from stored data.

SDSL (Symmetric Digital Subscriber Line)

A version of DSL where the upload speeds and download speeds are the same.

Search Engine

A (usually web-based) system for searching the information available on the Web.

Some search engines work by automatically searching the contents of other systems and creating a database of the results. Other search engines contains only material manually approved for inclusion in a database, and some combine the two approaches.

Security Certificate

A chunk of information (often stored as a text file) that is used by the SSL protocol to establish a secure connection.

SEO (Search Engine Optimization)

The practice of designing web pages so that they rank as high as possible in search results from search engines.

There is "good" SEO and "bad" SEO. Good SEO involves making the web page clearly describe its subject, making sure it contains truly useful information, including accurate information in Meta tags, and arranging for other web sites to make links to the page. Bad SEO involves attempting to deceive people into believing the page is more relevant than it truly is by doing things like adding inaccurate Meta tags to the page.

Server

A computer, or a software package, that provides a specific kind of service to client software running on other computers. The term can refer to a particular piece of software, such as a WWW server, or to the machine on which the software is running, e.g. "Our mail server is down today, that's why e-mail isn't getting out."

A single server machine can (and often does) have several different server software packages running on it, thus providing many different servers to clients on the network.

Sometimes server software is designed so that additional capabilities can be added to the main program by adding small programs known as servlets.

Servlet

A small computer program designed to be add capabilities to a larger piece of server software.

Common examples are "Java servlets", which are small programs written in the Java language and which are added to a web server. Typically a web server that uses Java servlets will have many of them, each one designed to handle a very specific situation, for example one servlet will handle adding items to a "shopping cart", while a different servlet will handle deleting items from the "shopping cart."

SGML (Standard Generalized Markup Language)

Developed in 1986 SGML provides a rich set of rules for defining new data formats. A well-known example of using SGML is XML, which is a subset of SGML: The definition of XML is all of SGML minus a couple of dozen items. SGML is an International Standards Organization (ISO) standard: ISO 8879:1986.

SLIP (Serial Line Internet Protocol)

A standard that was popular in the early 1990's for using a regular telephone line (a serial line) and a modem to connect a computer as a real Internet site. SLIP has largely been replaced by PPP.

SMDS (Switched Multimegabit Data Service)

A standard for very high-speed data transfer.

SMTP (Simple Mail Transfer Protocol)

The main protocol used to send electronic mail from server to server on the Internet.

SMTP is defined in RFC 821 and modified by many later RFC's.

SNMP (Simple Network Management Protocol)

A set of standards for communication with devices connected to a TCP/IP network. Examples of these devices include routers, hubs, and switches.

SNMP is defined in RFC 1089

SOAP (Simple Object Access Protocol)

A protocol for client-server communication that sends and receives information "on top of" HTTP. The data sent and received is in a particular XML format specifically designed for use with SOAP. SOAP is similar to the XMLRPC protocol except that SOAP provides for more sophisticated handling of complex data being sent between a client and a server. SOAP actually grew from the work that created XMLRPC. Microsoft's ".NET" system is largely based on SOAP.

Spam (or Spamming)

An inappropriate attempt to use a mailing list, or USENET or other networked communications facility as if it was a broadcast medium (which it is not) by sending the same message to a large number of people who didn't ask for it. The term probably comes from a famous Monty Python skit which featured the word spam repeated over and over. The term may also have come from someone's low opinion of the food product with the same name, which is generally perceived as a generic content-free waste of resources.

(Spam® is a registered trademark of Hormel Corporation, for its processed meat product.)

Spyware

A somewhat vague term generally referring to software that is secretly installed on a users computer and that monitors use of the computer in some way without the users' knowledge or consent. Most spyware tries to get the user to view advertising and/or particular web pages. Some spyware also sends information about the user to another machine over the Internet. Spyware is usually installed without a users' knowledge as part of the installation of other software, especially software such as music sharing software obtained via download.

SQL (Structured Query Language)

A specialized language for sending queries to databases. Most industrial-strength and many smaller database applications can be addressed using SQL. Each specific application will have its own slightly different version of SQL implementing features unique to that application, but all SQL-capable databases support a common subset of SQL.

A example of an SQL statement is:

```
SELECT name,email FROM people_table WHERE contry='uk'
```

SSL (Secure Socket Layer)

A protocol designed by Netscape Communications to enable encrypted, authenticated communications across the Internet.

Sysop (System Operator)

Anyone responsible for the physical operations of a computer system or network resource. For example, a System Administrator decides how often backups and maintenance should be performed and the System Operator performs those tasks.

T-1

A leased-line connection capable of carrying data at 1,544,000 bits-per-second. At maximum theoretical capacity, a T-1 line could move a megabyte in less than 10 seconds. That is still not fast enough for full-screen, full-motion video, for which you need at least 10,000,000 bits-per-second. T-1 lines are commonly used to connect large LANs to theInternet.

T-3

A leased-line connection capable of carrying data at 44,736,000 bits-per-second. This is more than enough to do full-screen, full-motionvideo.

Tag

The term "tag" can be used as a noun or verb. As a noun, a tag is a basic element of the languages used to create web pages (HTML) and similar languages such as XML. Another, more recent meaning of tag is related to reader-created tags where blogs and other content (such as photos, music, etc.) may be "tagged" which means to assign a keyword, such as "politics" or "gardening", this enables searches for "all the blog postings in the past week that are tagged 'prenatal care'"

TCP/IP (Transmission Control Protocol/Internet Protocol)

This is the suite of protocols that defines the Internet. Originally designed for the UNIX operating system, TCP/IP software is now included with every major kind of computer operating system. To be truly on the Internet, your computer must have TCP/IP software.

Telnet

The command and program used to login from one Internet site to another. The telnet command/program gets you to the login: prompt of another host.

Terabyte

1000 gigabytes.

Terminal

A device that allows you to send commands to a computer somewhere else. At a minimum, this usually means a keyboard and a display screen and some simple circuitry. Usually you will use terminal software in a personal computer - the software pretends to be (emulates) a physical terminal and allows you to type commands to a computer somewhere else.

Terminal Server

A special purpose computer that has places to plug in many modems on one side, and a connection to a LAN or host machine on the other side. Thus the terminal server does the work of answering the calls and passes the connections on to the appropriate node. Most terminal servers can provide PPP or SLIP services if connected to the Internet.

TLD (Top Level Domain)

The last (right-hand) part of a complete Domain Name. For example in the domain name www.matisse.net ".net" is the Top Level Domain.

There are a large number of TLD's, for example .biz, .com, .edu, .gov, .info, .int, .mil, .net, .org, and a collection of two-letter TLD's corresponding to the standard two-letter country codes, for example, .us, .ca, .jp, etc.

Trojan Horse

A computer program is either hidden inside another program or that masquerades as something it is not in order to trick potential users into running it. For example a program that appears to be a game or image file but in reality performs some other function. The term "Trojan Horse" comes from a possibly mythical ruse of war used by the Greeks sometime between 1500 and 1200 B.C.

A Trojan Horse computer program may spread itself by sending copies of itself from the host computer to other computers, but unlike a virus it will (usually) not infect other programs.

UDP (User Datagram Protocol)

One of the protocols for data transfer that is part of the TCP/IP suite of protocols. UDP is a "stateless" protocol in that UDP makes no provision for acknowledgement of packets received.

Unix

A computer operating system (the basic software running on a computer, underneath things like word processors and spreadsheets). Unix is designed to be used by many people at the same time (it is multi-user) and has TCP/IP built-in. It is the most common operating system for servers on the Internet.

Apple computers' Macintosh operating system, as of version 10 ("Mac OS X"), is based on Unix.

Upload

Transferring data (usually a file) from a the computer you are using to another computer. The opposite of download.

URI (Uniform Resource Identifier)

An address for s resource available on the Internet.

The first part of a URI is called the "scheme". the most well known scheme is http, but there are many others. Each URI scheme has its own format for how a URI should appear.

Here are examples of URIs using the http, telnet, and news schemes:

`http://www.matisse.net/files/glossary.html`

`telnet://well.sf.ca.us`

`news:new.neusers.questions`

URL (Uniform Resource Locator)

The term URL is basically synonymous with URI. URI has replaced URL in technical specifications.

URN (Uniform Resource Name)

A URI that is supposed to be available for along time. For an address to be a URN some institution is supposed to make a commitment to keep the resource available at that address.

USENET

A world-wide system of discussion groups, with comments passed among hundreds of thousands of machines. Not all USENET machines are on the Internet. USENET is completely decentralized, with over 10,000 discussion areas, called newsgroups.

UUENCODE (Unix to Unix Encoding)

A method for converting files from Binary to ASCII (text) so that they can be sent across the Internet via email.

Veronica (Very Easy Rodent Oriented Net-wide Index to Computerized Archives)

Developed at the University of Nevada, Veronica was a constantly updated database of the names of almost every menu item on thousands of gopherservers. The Veronica database could be searched from most major gophermenus.

Now made obsolete by web-bases search engines.

Virus

A chunk of computer programming code that makes copies of itself without any concious human intervention. Some viruses do more than simply replicate themselves, they might display messages, install other software or files, delete software or files, etc.

A virus requires the presence of some other program to replicate itself. Typically viruses spread by attaching themselves to programs and in some cases files, for example the file formats for Microsoft word processor and spreadsheet programs allow the inclusion of programs called "macros" which can in some cases be a breeding ground for viruses.

VOIP (Voice Over IP)

A specification and various technologies used to allow making telephone calls over IP networks, especially the Internet. Just as modems allow computers to connect to the Internet over regular telephone lines, VOIP technology allows humans to talk over Internet connections. Costs for VOIP calls can be a lot lower than for traditional telephone calls. Because the IP networks are packet-switched this allows for vastly different ways of handling connections and more efficient use of network resources.

VPN (Virtual Private Network)

Usually refers to a network in which some of the parts are connected using the public Internet, but the data sent across the Internet is encrypted, so the entire network is "virtually" private.

WAIS (Wide Area Information Servers)

Developed in the early 1990s WAIS was the first truly large-scale system to allow the indexing of huge quantities of information on the Web, and to make those indices searchable across networks such as the Internet. WAIS was also pioneering in its use of ranked (scored) results where the software tries to determine how relevant each result is.

WAN (Wide Area Network)

Any internet or network that covers an area larger than a single building or campus.

Web

Short for "World Wide Web."

Web page

A document designed for viewing in a web browser. Typically written in HTML. A web site is made of one or more web pages.

WebDAV (Web-based Distributed Authoring and Versioning)

A set of extensions to the HTTP protocol that allows multiple users to not only read but also to add, delete, and change documents residing on a web server. In order to use WebDAV you need WebDAV client software to connect to a HTTP server that has the WebDAV extensions installed. Virtually all common HTTP servers have WebDAV extensions available to them.

Website

The entire collection of web pages and other information (such as images, sound, and video files, etc.) that are made available through what appears to users as a single web server. Typically all the pages in a web site share the same basic URL, for example the following URLs are all for pages within the same web site:

<http://www.baytherapy.com/>
<http://www.baytherapy.com/whatis/>
<http://www.baytherapy.com/teenagers/>

The term has a somewhat informal nature since a large organization might have separate "web sites" for each division, but someone might talk informally about the organizations' "web site" when speaking of all of them.

Wi-Fi (Wireless Fidelity)

A popular term for a form of wireless data communication, basically Wi-Fi is "Wireless Ethernet".

Worm

A worm is a virus that does not infect other programs. It makes copies of itself, and infects additional computers (typically by making use of network connections) but does not attach itself to additional programs; however a worm might alter, install, or destroy files and programs.

WWW (World Wide Web)

World Wide Web (or simply Web for short) is a term frequently used (incorrectly) when referring to "The Internet", WWW has two major meanings:

First, loosely used: the whole constellation of resources that can be accessed using Gopher, FTP, HTTP, telnet, USENET, WAIS and some other tools.

Second, the universe of hypertext servers (HTTP servers), more commonly called "web servers", which are the servers that serve web pages to web browsers.

XHTML (eXtensible HyperText Markup Language)

Basically HTML expressed as valid XML. XHTML is intended to be used in the same places you would use HTML (creating web pages) but is much more strictly defined, which makes it a lot easier to create software that can read it, edit it, check it for errors, etc. XHTML is expected to eventually replace HTML.

XML (eXtensible Markup Language)

A widely used system for defining data formats. XML provides a very rich system to define complex documents and data structures such as invoices, molecular data, news feeds, glossaries, inventory descriptions, real estate properties, etc.

As long as a programmer has the XML definition for a collection of data (often called a "schema") then they can create a program to reliably process any data formatted according to those rules. XML is a subset of the older SGML specification - the definition of XML is SGML minus a couple of dozen items.

XMLRPC (XML Remote Procedure Call)

A protocol for client-server communication that sends and receives information "on top of" HTTP. The data sent and received is in a particular XML format specifically designed for use with XMLRPC.

XPFE (Cross Platform Front End)

A suite of technologies used to create applications that will work and look the same on different computer operating systems. A widely used XPFE application is the Mozilla web browser and its derivatives, such as the Netscape web browser in version 7 and later. The primary technologies used in creating XPFE applications are Javascript, Cascading Style Sheets, and XUL.

XUL (eXtensible User-interface Language)

A markup language similar to HTML and based on XML.

XUL used to define what the user interface will look like for a particular piece of software. XUL is used to define what buttons, scrollbars, text boxes, and other user-interface items will appear, but it is not used to define how those items will look (e.g. what color they are).

The most widely used example of XUL use is probably in the Firefox web browser, where the entire user interface is defined using the XUL language.