The New York Society Library Presents:
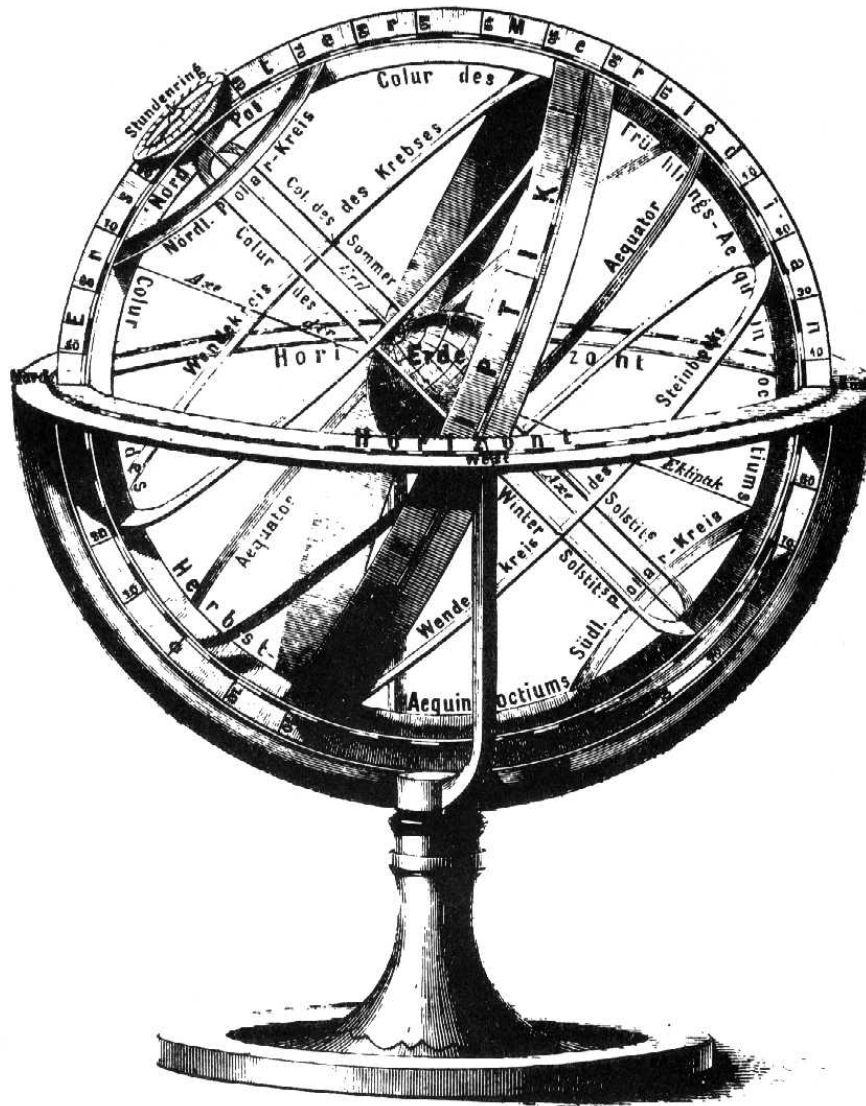

Introduction to the Internet

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INTERNET

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1957:   Russians launch Sputnik. President Eisenhower forms ARPA
             Advanced Research Projects Agency) within Department of Defense.
1969:   ARPANET links four computers for research purposes:
             Stanford Research Institute, UCLA, UC Santa Barbara, & University of Utah.
1977:   Other networks start connecting to ARPANET, using TCP/IP
             Transmission Control Protocol/ Internet Protocol).

1986:   NSFNET (National Science Foundation Net) formed, connecting computers.
             Created regional network to connect schools and universities.
1988:   Creation of the first internet worm by Robert Morris.
             Resulted in IAB's Security and Ethics Statement in 1989.
1989:   Internet Activities Board Security and Ethics Statement:
             The following are unethical and unacceptable on the Internet:
             unauthorized access, disrupting intended use, wasting resources
             (people, computers, etc), destroying integrity of information and compromising
             privacy.

1990:   ARPANET disappears entirely.
1991:   World Wide Web, developed by Tim Berners-Lee, is released by CERN.
1993:   White House goes online for first time. Mosaic, the first web browser,
             brings in a staggering 341,634% increase in traffic

1994:   Netscape Navigator released, allowing download of text &images.
1995:   Microsoft Internet Explorer 1.0 is released, allowing different fonts and color.
             The Communications Decency Act was proposed by Senator Jim Exxon, attempting
             to outlaw the transmission of lewd material on the Internet. Prompted
             development of web filtering tools for parents wishing to restrict websites for their
             children.
1997:   The Supreme Court ruled that the Communications Decency Act
             violated the First Amendment.

INTERNET
COMPONENTS

The Internet is a collection of networked computers and servers. Some of the programs and protocols that access the Internet are:

- E-MAIL: Electronic Mail
  (1969) E-mail is an electronic means of sending messages from one Internet user to another.

- TELNET: Telephone Network
  (1972) Telnet is a text-based method of connecting to other computers on the Internet. The New York Society Library's old catalog, Geac Advance, was telnet-based.

- FTP: File Transfer Protocol
  (1972) File Transfer Protocol (FTP) allows for the quick transfer of files between computers on the Internet. This is the protocol that most web sites use to upload (i.e. transfer) files from their local computer to the Internet.

- USENET: User Networks
  (1979) Usenet is a collection of electronic bulletin boards (Newsgroups). These Newsgroups can be viewed online at: http://groups.google.com

- LISTSERV: List Server
  (1986) LISTSERV is a licensed electronic mailing distribution list. Anything you receive and post to these e-mail addresses is distributed via e-mail to everyone else on the subscription list.

- IRC: Internet Relay Chat
  (1988) Internet Relay Chat (IRC) is a text-based program that allows two or more people to type messages to each other in real time. Two common (and free) programs for chatting online are: AOL Instant Messenger (http://www.aim.com) and Yahoo! Messenger (http://messenger.yahoo.com).

- WWW: World Wide Web
  (1993) the web is means of viewing pictures, text and graphics stored on the Internet

INTERNET
GETTING ONLINE

Personal computer
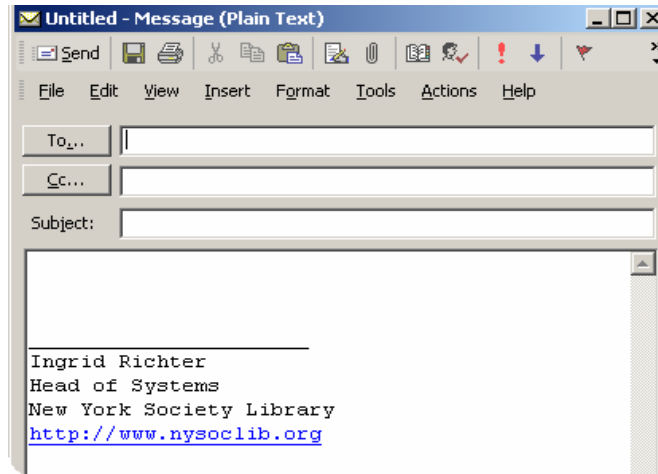Telephone
Modem
Keyboard
Mouse
Program disc

CONNECTION:

- <u>DIAL-UP</u>:   A dial-up account uses your phone line and computer modem to dial up a local (or long-distance) access number. The fastest modem speed is 56K (or 56 kilobytes of data transferred per second).

- <u>CABLE MODEM</u>:   A cable modem modifies your cable TV connection to handle two-way data traffic. The speed is faster than a dial-up connection, but you share the Internet connection with your neighbors (the more people online at the same time, the slower the connection).

- <u>DSL (Digital Subscriber Line</u>):   A DSL connection uses a thicker phone cable for accessing the Internet. Your computer uses an Ethernet card, instead of a modem, to connect to the DSL line. The speed of your connection depends on which DSL service you buy (192K to 1.5M per second).   The New York Society Library has a DSL connection to the Internet.

- <u>WIRELESS</u>: A wireless connection uses radio waves instead of cables to connect to the Internet. The most common use of wireless technology is to remotely connect to the Internet from your laptop, but you can also use wireless networks to send print jobs to remote printers or connect your wireless devices (cell phones, PDA's, etc) together.

SOFTWARE

Once you have the machine and connection, there are two ways to get online: through an Online Service (e.g. AOL) which will include extra features and a different interface (and higher price), or through an Internet Service Provider (e.g. Verizon, Bway.net), which will connect you with minimal fuss. Both types of services will give you full access to the Internet and e-mail. Visit http://www.thelist.com   for a complete list of Internet Service Providers.

INTERNET
E-MAIL

One of the most popular uses of the Internet, e-mail is short for "electronic mail", a means of sending messages from one Internet user to another. Always assume that other people may see what you type into an e-mail message. Don't send sensitive information (i.e. credit card numbers, social security numbers or passwords) through e-mail.
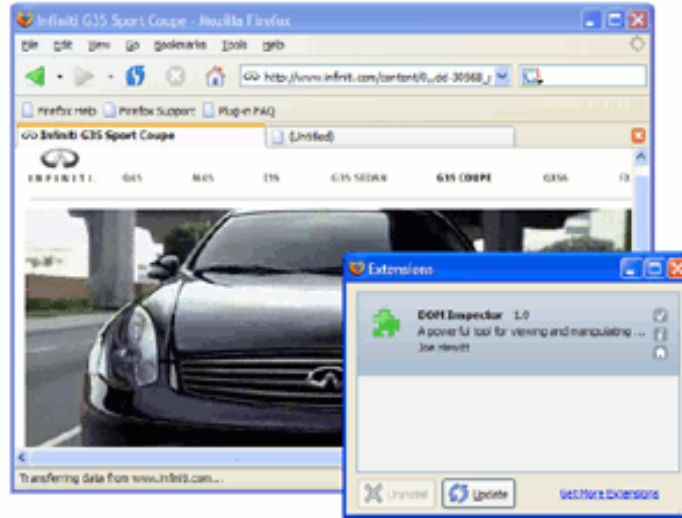
E-mail is broken down into:

To:	Enter e-mail address here (no spaces)
From:	Your e-mail address (automatically filled in)
Subject:	The subject of the e-mail.
Cc:	"Carbon Copy"
Bcc:	"Blind Carbon Copy".
Attached:	Place to attach electronic documents
Under the Line:	This is the substance of your e-mail.
	It's generally 80 characters across and the text wraps to fit.
	Once you are done typing a message, click "Send" to mail.

E-MAIL TRANSLATION:
webmaster@nysoclib.org

webmaster	→	The name or title of a specific person
@	→	Stands for "at"
nysoclib.	→	This is the New York Society Library domain name
org	→	Stands for "Organization"

WEB BROWSERS:

Web browsers are (generally) free software programs that allow you to surf the web.   For AOL users, AOL is the web browser. For most other users, the two major web browsers are: Netscape Navigator and Microsoft Internet Explorer.   Internet Explorer dominates the market, and is installed on all Microsoft operating systems. Two relatively new contenders in the browser field are: Opera (billed as faster than either Navigator or Explorer) and Firefox (from Mozilla, the company to design the first web browser, NCSA Mosaic).

URL (Uniform Resource Locator):
http://www.nysoclib.org/newbooks/newbooks0106.html

http://	→	Stands for "Hypertext Transfer Protocol"; *Hypertext is a mark-up language that allows links within text files to external information.*
www.	→	Stands for World Wide Web
nysoclib.	→	The New York Society Library domain name
org	→	Stands for non-profit "Organization"
/newbooks/	→	Signifies a folder called "newbooks"
newbooks0106	→	The name of a file found in the folder /newbooks/
.html	→	Stands for "HyperText Mark-up Language" *Can also be .htm (older computers)*

Search engines are the primary way to find information on the web. All search engines are free to use. Some search engines work by automatically searching the contents of other systems and creating a database of the results. Other search engines contain only material manually approved for inclusion in a database, and some combine the two approaches.

AltaVista (1995)
http://www.altavista.com
1. Conversion Tool: http://www.altavista.com/help/search/calculator
2. Translation Tool: http://babelfish.altavista.com/

Ask (1998)
http://www.ask.com
1. Ask Kids: http://www.ajkids.com/   A kid-friendly search engine interface.
2. Blog Search: http://blog.ask.com/ Searches a handful of the online web logs
3. Binocular Feature: Hover your mouse above the binocular

Gigablast (2000)
http://www.gigablast.com/
1. Options for 10 through 100 results per page
2. Archive copy, stripped copy and older copies option

Lycos (1994)
http://www.lycos.com
- Lists top-level domain (www.geocities.com) in search results.

Yahoo (1994)
http://www.yahoo.com
- Free e-mail service: http://mail.yahoo.com
- Local weather: http://weather.yahoo.com
- Photo storage option: http://photos.yahoo.com
- File storage option: http://briefcase.yahoo.com

GOOGLE

Google (1998)
http://www.google.com

Name From: "Googol" is the mathematical term for a 1 followed by 100 zeros. Google's play on the term reflects the company's mission to organize the immense amount of information available on the web.

- **Google Desktop: http://desktop.google.com/**
  More Info: http://desktop.google.com/about.html
  Google Desktop gives you easy access to information on your computer and from the web. It's a desktop search application that provides full text search over your email, computer files, music, photos, chats and web pages that you've viewed

- **Google Maps: http://maps.google.com/**
  More Info: http://www.google.com/help/faq_maps.html
  With Google Maps, you can view a map of your driving directions or a specific location. But you can also access a satellite image of this same location if you'd like. You can zoom in on this image for a closer look at the terrain, zoom out for a grander perspective, or pan in any direction.

- **Google Scholar: http://scholar.google.com/**
  More Info: http://scholar.google.com/scholar/about.html
  Google Scholar enables you to search specifically for scholarly literature, including peer-reviewed papers, theses, books, preprints, abstracts and technical reports from all broad areas of research. Many of these citations require subsequent site registration for the article.

- **Google Video: http://video.google.com/**
  More Info: http://video.google.com/video_about.html
  Google Video offers viewers a way to see material from archived TV programs, educational videos, personal productions and more.   You will need to download the Google Video Viewer in order to watch the videos.

- **Local Search: http://local.google.com/**
  More Info: http://local.google.com/help/faq_local.html
  Sometimes the information you're looking for is related to a particular place – like the all-night doughnut shop that's nearest to your house. Google Local locates neighborhood stores and services by searching billions of pages across the Web, then cross-checking those results with Yellow Pages data to pinpoint the local resources you want to find.

- **Personalized Homepage: http://www.google.com/ig**
  Includes options such as: How-To, News, Weather, Movies, Recipes, Quotes, Sports, Stock Market, Word of the Day. Similar to Yahoo!'s "My Yahoo"

INTERNET
PROBLEMS

HOAXES
http://hoaxbusters.ciac.org
Internet hoaxes and chain letters are e-mail messages written with one purpose; to be sent to everyone you know. Symptoms: The sender is known to the user, the threat sounds realistic, and the urgent nature prompts immediate action. Course of action: ignore and delete.

PHISHING
http://www.antiphishing.org
Phishing sites use 'spoofed' e-mails and fraudulent websites designed to fool recipients into divulging personal financial data such as credit card numbers, account usernames and passwords, social security numbers, etc. Never click on a link in your e-mail to verify information. Be highly skeptical of e-mail notification of account closures, especially from banks, eBay or PayPal.

SPAM
http://spam.abuse.net
Spam is unsolicited e-mail on the Internet. From the sender's point-of-view, it's a form of bulk mail. To the receiver, it usually seems like junk e-mail. It's generally equivalent to unsolicited phone marketing calls except that the user pays for part of the message since everyone shares the cost of maintaining the Internet.

SPYWARE
http://www.safer-networking.org
Spyware is a program installed on your computer that keeps track of your web surfing and sends the information back to the owner. It isn't illegal, but it will compromise your privacy online (by sending pop-up ads geared towards you) and will bog down your Internet connection (by using it, partially, to send and retrieve information about you from your computer).

VIRUSES
http://vil.nai.com/vil/stinger/
To prevent viruses from infecting your computer, never open suspicious e-mail messages, back up your information, download Critical Updates from Microsoft (http://windowsupdates.microsoft.com), install an anti-virus program and keep the definitions up to date.

Internet Movie Database
http://www.imdb.com
"The Internet Movie Database (IMDb) is a HUGE collection of movie information. We try to catalog every pertinent detail about a movie, from who was in it, to who made it, to trivia about it, to filming locations, and even where you can find reviews and fan sites on the web. We then do our best to present this information in a manner that is easy to search and access."

Kayak.com
http://www.kayak.com
"Kayak.com is a new kind of web site. It is a travel search engine. We help you find travel products, and you buy them from other people. Kayak.com is not a travel agent. Web sites like Expedia, Orbitz and Travelocity are all travel agents. They are plane ticket stores: you give them money and they give you plane tickets. You don't give any money to Kayak.com"

LibraryThing
http://www.librarything.com
"LibraryThing is an online service to help people catalog their books easily. Because everyone catalogs together, you can also use LibraryThing to find people with similar libraries, get suggestions from people with your tastes and so forth."

WebCams
http://www.webcam-index.com
"Webcams are live cameras from around the world, projecting images onto the Internet. The Times Square streaming webcam is at: http://www.earthcam.com/usa/newyork/timessquare/ "

Wikipedia
http://www.wikipedia.com
"Wikipedia is a free-content encyclopedia, written collaboratively by people from all around the world. The site is a wiki, which means that anyone can edit articles simply by clicking on the edit this page link."