Business Sites

**Ice page** - a page in which the primary content has a fixed width and is “frozen” to the left margin

**Jello page** - fixed width but “wiggles and jiggles” to center itself on the screen

**Liquid page** - a web page that will re-flow to fit no matter what you “pour” it into
**E-Commerce: Retail Sites**

Electronic commerce - buying and selling over the Internet.
Retail sites allow the purchase of practically anything over the Internet.

**Adding Content**

Retail sites are now adopting content to attract visitors and boost sales.
The difference between content and commerce sites is quickly becoming narrower.
Only Flirting With the Internet

Though manufacturers know the Internet could be an effective sales tool, they fear that selling from their own site will alienate sales representatives and stores with whom they have connections. Jittery corporate strategists are trying to venture onto the Net without alienating physical sales as well.

Portals and Advertising

Like television, radio, etc., the networks collect revenue from advertising. Web sites often wish to be a visitor’s portal to the Internet, to attract first-stop visitors who use the site to venture forth on the Web.
Getting Personal

A good portal site supplies the visitor with many links to different subjects of interest (i.e., film, entertainment, business, etc.)

Portal sites often have means of visitor personalization to attract repeat visits.

Some portals go further and offer instructions on how to make the portal site the default page loaded by a browser.

Another Source of Money

The portal web site offers the news and other features from affiliates, which the portal chooses.

The affiliates pay for the privilege.

The portal gets a portion of the profits made by their affiliates’ sales.

The ultimate goal of each portal is to make its site your one-stop site on the Internet.
More Advertising

Most Web advertisement is in the form of **banner ads**, so named for their horizontal-rectangle shape.

Banners do not work as well as advertisers would hope because visitors are often reluctant to leave sites of interest.

One solution to this is the **live banner**, which gives a user more information than a conventional banner.

Payments and Taxes

You want to make a purchase on an E-commerce site, but you may have questions:

- How will you pay for it?
- Will you have to pay taxes on your purchase?

The next two sections will likely provide you with answers.
E-Commerce Payments

Some retail sites allow you to phone or fax your order.
Though Internet transactions involve submitting one’s credit card, it would take a skilled programmer to undo the encryption.
The de facto standard for online transaction payments is the Secure Sockets Layer (SSL) protocol.

E-Commerce Taxes

Taxation of E-commerce has long been debatable; Internet business “presence” in any land is a difficult concept.
E-Commerce Taxes

The Internet Tax Freedom Act has four components:

- Prohibits state, local government from imposing tax on Internet access charges
- Prohibits tax from being imposed on out-of-state business through defined concept of “presence”

- Creates temporary commission to study taxation of E-commerce and report to Congress on whether Internet ought to be taxed
- Calls on executive branch to demand foreign governments keep Internet free of taxes, tariffs.
Entrepreneurs

Individuals can gain access to people, markets - even global markets - not readily affordable/available elsewhere. Even though anyone can get in on E-business, the Internet is not a level playing field.

Success Factors

The body of your site is the content; what does the site offer? A recommendation for success is to have a specialty, something not offered anywhere else. Self-help features are both useful and a winning strategy. A sense of community is the key to a commercial site’s success.
My Mother, the Conglomerate

Mom-and-pop businesses have learned that, on the Web, anybody can look like a conglomerate. The same is true for teenagers, college students, stay-at-homes, and anyone else who is operating a business from a den or garage. Success online is never automatic - but it is always a possibility.

Traffic Jams

Numerous solutions to the Internet speed problem are proposed, such as expanding “the pipes” with alternatives to 56K modem:

- Satellite transmission - wireless, widely available, but expensive and potentially clogged at peak hours.
Traffic Jams, cont.

- **Integrated Services Digital Network (ISDN)** is very speedy and widely available, transmitting data at up to 128,000 bps. It requires special equipment and is complicated to set up and somewhat expensive.

- **Digital subscriber lines (DSL)** use advanced electronics to send data over conventional telephone wires, operating much like modems. However, DSL lacks industry standards, and various manufacturers are imposing their own variations.

Traffic Jams, cont.

- **Cable modem** is another approach, using the coaxial television cables already in place without interrupting normal cable reception. Some cable modems can be as fast as 10 million bps.
Streaming

Streaming, the downloading of live audio/video/animation content, is the most notable bandwidth user. Streamed sound, images usually appear via browser plug-in, greatly accelerating streaming to mere seconds at times.

Multicasting

Suppose you work for a company that develops documentary packages. You have written a report to be shown to a few dozen select individuals. Your options for transmission:
- Unicasting - sending a separate copy of a file from your computer to each desired recipient, one at a time. This wastes bandwidth unnecessarily and is inconvenient.
Multicasting, cont.

- Broadcasting - sending only one copy of the file, but sending it to every computer on the network, regardless of who it was intended for. This is wasteful and compromises security.
- Multicasting - sending only one copy of each file, but dropping it off only with appropriate recipients. The best method by far.

Push Technology

Push technology refers to E-commerce that delivers, or **pushes**, the goods **to you**, as opposed to **pull**, such as **you going** to the newsstand to get a newspaper.

This concept also refers to Web sites and Web software that bring requested information **to you**, as opposed to **you having to navigate** many web pages to get your information.
Intranets

Intranet - an internal, private, Internet-like network of computers, common throughout companies in the workplace. Every Fortune 500 company either has an intranet or is planning one.

Setting Up an Intranet

The TCP/IP protocols must be in place. The server needs its own software. Each access computer needs a browser. The pages must be well designed and easy to follow (function over glitz)
A well-designed intranet can be used by most employees from day one. For example:

- Employees can easily access information they desire or require (i.e. benefits status)
- Rather than mass-E-mailing employees, Managers can post notices or other information on their own web site for employees to check.

An intranet can remain private, but can still be linked to the Internet. Companies may choose to link some parts of their intranets together. Such a hookup is called an extranet.
Virtual Private Networks

**Virtual private network (VPN)** - provides technology that uses the public Internet backbone as a channel for private data communication.

A VPN essentially carves out a private passageway through the Internet.

**Tunneling** - a.k.a. **encapsulation**, a way to transfer data between two similar networks over an intermediate network.

Microsoft, 3Com, and several other companies have proposed a standard tunneling protocol called **Point-to-Point Tunneling Protocol (PPTP)**. (The original protocol was the Internet TCP/IP protocol.)

Before encapsulation takes place, the TCP/IP packets are encrypted so the data cannot be read by outsiders.
Consolidation of the Web

The WWW started out as - and still is - a freewheeling place where anyone with a web page could participate.

Today, the Net is a trillion-dollar industry, with business changes occurring at a blinding pace.

The Internet represents a new and important business model, a whole new way of looking at industry and commerce.