

UNIT 2 – Web Design

Web Design Issues

Browser & Operating Systems

- ❖ Web pages are written using different HTML tags and viewed in browser window.
- ❖ The different browsers and their versions greatly affect the way a page is rendered, as different browsers sometimes interpret same HTML tag in a different way.
- ❖ Different versions of HTML also support different sets of tags.
- ❖ The support for different tags also varies across the different browsers and their versions.
- ❖ Same browser may work slightly different on different operating system and hardware platform.
- ❖ To make a web page portable, test it on different browsers on different operating systems.

To create a cross-browser compatible website

- Use only standard compliant coding.
- Don't use browser specific (proprietary) HTML tags and features.
- Validate your web pages.

Bandwidth and Cache

- ❖ Users have different connection speed, i.e. bandwidth, to access the Web sites.
- ❖ Connection speed plays an important role in designing web pages, if user has low bandwidth connection and a web page contains too many images, it takes more time to download.
- ❖ Generally, users have no patience to wait for longer time than 10-15 seconds and move to other site without looking at contents of your web page.
- ❖ Browser provides temporary memory called cache to store the graphics.
- ❖ When user gives the URL of the web page for the first time, HTML file together with all the graphics files referred in a page is downloaded and displayed.
- ❖ Most web browsers perform caching to hold copies of web pages and downloaded files. Web resources come in different kinds or formats, including text, HTML, CSS, JavaScript, JPEG, GIF and PNG, but they are all cached and retrieved.

Display Resolution

- ❖ Display resolution is another important factor affecting the Web page design, as we do not have any control on display resolution of the monitors on which user views our pages.
- ❖ Display or screen resolution is measured in terms of pixels and common resolutions are 800 X 600 and 1024 X 786.
- ❖ We have three choices for Web page design.
- ❖ Design a web page with fixed resolution.
- ❖ Make a flexible design using HTML table to fit into different resolution.
- ❖ If the page is displayed on a monitor with a higher resolution, the page is displayed on left- hand side and some part on the right-hand side remains blank. We can use centered design to display page properly.
- ❖ Use a set of Icons of Different size for Different resolution.

Look & Feel

- ❖ Look and feel of the website decides the overall appearance of the website.
- ❖ It includes all the design aspects such as
 - Web site theme
 - Web typography
 - Graphics
 - Visual structure
 - Navigation etc...
- ❖ The look is defined by the following components of your website :
 - Color palette
 - Images
 - Layout & Font choices
 - Gallery

Page Layout and Linking

- ❖ Website contains of individual web pages that are linked together using various navigational links.
- ❖ Page layout defines the visual structure of the page and divides the page area into

different parts to present the information of varying importance.

- ❖ Page layout allows the designer to distribute the contents on a page such that visitor can view it easily and find necessary details.
- ❖ Webpage is viewed on a computer screen and the screen can be divided into five major areas such as center, top, right, bottom and left in this particular order.
- ❖ The first major area of importance in terms of users viewing pattern is the center, then top, right, bottom and left in this particular order.

Making Design user-Centric

- ❖ It is very difficult for any Web designer to predict the exact behavior of the Web site users.
- ❖ However, idea of general behavior of common user helps in making design of the Web site user- centric.
- ❖ Users either scan the information on the web page to find the section of their interest or read the information to get details.

Activities that can be used to make Website User Centric

- ✓ The design is based upon an explicit understanding of users, tasks and environments.
- ✓ Users are involved throughout design and development.
- ✓ The design is driven and refined by user-centred evaluation.

Sitemap

- ❖ Many a times Web sites are too complex as there are a large number of sections and each section contains many pages.
- ❖ It becomes difficult for visitors to quickly move from one part to other.
- ❖ Once the user selects a particular section and pages in that section, user gets confused about where he/she is and where to go from there.
- ❖ To make it simple, keep your hierarchy of information to few levels or provide the navigation bar on each page to jump directly to a particular section.
- ❖ **There are two types of site maps html sitemap and xml sitemap. XML sitemap can be submitted to Google, Bing, Yahoo and other search engines to help them crawl your website better. HTML site map to allow human visitors to easily navigate on your site.** XML sitemaps provide all kinds of helpful information for

the crawlers.

Designing Effective Navigation

- ❖ Navigation means how a user can go from one page to another web page and how the links are provided.
- ❖ There are three types of Navigation
 - Hierarchical
 - Global
 - Local
- ❖ If navigation is done poorly it will confuse your visitors. To help your visitors find what they want it is essential to have clear, concise and carefully planned navigation.
- ❖ If your site is large then you may also want to consider adding a search engine to it, providing your visitors with a search box on every page means that they can jump from one place to another without having to follow the logical links.
- ❖ A good navigation system will give the user three important pieces of information.
 - Where they are?
 - Where they were?
 - Where they can go?

Tips for Effective Navigation.

- ❖ Navigation links are either text based, i.e. a word or a phrase is used as a link, or graphical, i.e. a image, i.e. a icon or a logo is used as a link.
- ❖ Navigation links should be clear and meaningful.
- ❖ It should be consistent.
- ❖ Link should be understandable.
- ❖ Organize the links such that contents are grouped logically.
- ❖ Provide search link, if necessary, usually on top of the page. Use common links such as 'about us' or 'Contact us'.
- ❖ Provide the way to return to first page.
- ❖ Provide the user with information regarding location
- ❖ Horizontal navigation bar can be provided on each page to directly jump to any section