IMPROVING USABILITY AND NAVIGATION OF SARAWAK PUBLIC AGENCIES WEBSITES

Syahrul Nizam Junaini

Faculty of Computer Science & Information Technology
University Malaysia Sarawak (UNIMAS)
Kota Samarahan, Sarawak
082 671000 ext. 245

syahruln@fit.unimas.my

ABSTRACT

With the development of Internet and online services, the importance of usability should be the main concern in designing Sarawak Public Agency websites. This paper will highlight the basic of usability that determines site effectiveness. The speaker will present a theoretical framework that emphasizes on the importance of this attribute to attract web users. Suggestions for design and development of better user-focused websites will also be stressed during the talk.

1.0 INTRODUCTION

The burgeoning era of Internet has provided us with a massive amount of information. It offers easy accessibility to the electronic data that makes web more crucial in our life. The number of web page is rising. Progress of the Internet and its rapidly increasing growth has forced the government agencies to utilize it as a medium to extend their service to the public. Meanwhile many companies have also started their online existence by having e-commerce website.

Hence, web sites must be designed to meet the needs of a user. Unfortunately, less consideration has been given on web usability. Therefore, webmasters, designers and perhaps anyone from the Sarawak Government Agencies need to be aware of the importance of web usability.

A well designed website interface, with usability being the main concern in the design process can improve user satisfaction. Thus, persuade the users to engage and use the site to achieve their goal. From the business point of view, usability has become the exclusive outstanding differentiator among ecommerce sites.

The rest of this paper is structured as follows. In the next section, brief review on web usability and its significant effect especially on government agencies website are explained. Sections 3 will discuss the guidelines on page, content and site design usability. Finally, I will conclude with a discussion on the contributing factors towards user satisfaction of government agencies websites.

2.0 WEBSITE USABILITY

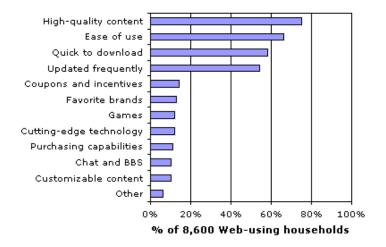
2.1 What is web usability?

In fact, usability is not the only thing, which involves web (Junaini, 2002). Its actually applies in our daily life and it is very essential. The main intention in designing website is to convey information. Designing a website is presenting information through a complicated multimedia interface. The main dilemma is to know whether the site appearance can effectively convey information to the viewers (Faraday and Sutcliffe, 2002). Thus, web presents the opportunity for the designer to predict and provide what the user desires from their site.

Usability is determined by user satisfaction, ease of learning, ability to remember site organization, effectiveness and efficiency. Therefore, web usability is the quality measurement of user interaction with the web.

Why Usability?

Usability is extremely vital for a website. A usable website very much improves users' satisfaction. It decreases errors and guides users to more efficient interaction. A study (Kupper, 2004) among 8600 web users tried to discover why they return to a website (refer to Graph 1). The finding showed that it was primarily because of guality content, followed by the ease of use.



Graph 1: Study Result of a Survey

Take a case of two websites with the same content, functionality and popularity. If the users can have the same thing from those two different sites, they will decide the one that is more effective, efficient and satisfactory. This determining factor will portray the acceptance of the user to exploit the site and get full benefit from it as well. To convince and persuade the user to rush back to a website, the site must be offered according to firm usability principles.

Simplicity is Rule No. 1

By having the homepage and other pages as simple as possible, user effectiveness can be increased. Delivering online information with simplicity as the main concern makes browsing process more convenient. It is to provide easy navigation of the site. In website development, the ultimate goal is to help the user to find what they want and achieve what they need.

In simplifying website content, reducing information will be the best solution.

It does not mean that the designer needs to reduce every information. They need to decide whether that information should appear on the homepage or otherwise. For example, a news report consists of headlines, the main content and followed by the remaining story. Therefore, the solution is just to put the headlines and several first sentences of the news on the homepage, then hide the remaining text on the other page. Link them by using "more..." word.

2.2 Test Your Site with Real user

Since a designer is not the real target user of a site, designing alone is not enough to prove that certain site is usable or easy to use. Hence, real user testing must be done. It should involve a group of target users; ask them to complete a mock task (e.g. finding particular information). The designers must refrain from assisting the user even though they may seem lost or frustrated. If they manage to complete the task in a satisfactory amount of time, then the site designer can claim that his or her design is acceptable or usable.

3.0 PAGE, CONTENT AND SITE DESIGN USABILITY

3.1 Page Design

The page design is a trigger for the user to read the page contents. Once they enjoy the pleasant viewing, they will be urged to explore the content as well. However, the hurdle is sometimes due to the design being too crowded that causes the content to look less significant. The key is simplicity.

Consistent page layout improves eye-flow and information processing. The web surfer starts to establish a visual hierarchy by himself or herself if the site is consistent. The point is to understand the effect of page design. A site should be as friendly as possible to the visitors.

Screen Real Estate

Enough whitespace (blank area, not necessarily white in colour) should be used in the design. Whitespace operates as separator among a group of information so that the user will easily differentiate it. There should be a wide blank space among the pictures and texts. This will help to segregate the information visibly.

Response Time

Graphics images are bulky compared to simple text, and the size matters when discussing about the web page. All graphics and images should only be attached to the site when it adds to the user's understanding of the text. Otherwise, it should be omitted from the site.

To accelerate download time, use multiple occurrences of images. For instance, the top logo of the agency websites can be used repeatedly. Hence, the reuse of image of buttons all over the page also aids in slashing the download time.

Credibility

It is obvious that graphical presentation moulds the first impression of a first timer. Great looking and stunning images and graphics will improve the credibility of the site. Use of agency corporate colour for instance, is a good practice to give a sense that the browsers are still on that site. Bullets, background colour and menu style must be consistent throughout the sites. Carefully designed visible interface can shore up the integrity of the site therefore the credibility of the site increases.

Printing

When it is at snail's pace, sometimes the user takes a long time to read a long document through the monitor. The user can then decide to print out the document in Portable Document File (.pdf) format. This will create much convenience for the user who chooses not to have the on-screen view.

3.2 Content Design

Content is king!. Excellent content design determines the site's quality and usability. Careful attention must be paid to make sure that the user gets what they want and the way they want to get it.

Writing for the web

To achieve scannability, the text must be chunked into smaller portions by a certain way. Use bullet points or cut the text into shorter paragraphs. The designer can also put some information inside the box and bold print the important words. Meaningful heading helps the user to read the page effortlessly.

Images and Photographs

Crop photo or picture helps to optimize its appearance. Resize and crop process helps to do this. The visual design of websites intends to enhance the interaction design and to enable the user to clearly see the object of the image. Use only real image of real people and real object that has connection with the text.

Animated Gif and Flash

Even though the sequence of animated gif image looks nice, the usage should be limited. To add interactivity, 2-D animations can also be designed using Flash. Careful selection of the appropriate media (graphics, animations, etc.) for designing the website is very crucial. In this case if animations are going to be employed it should be considered carefully to ensure that the user obtains maximum effectiveness.

3.3 Site Design

The way the information is demonstrated and designed on the site is critical. If the site design is perfect, a user will be able to arrive directly at their required page.

The Home Page

The home page is the doorway for the user before they manage to land on the other pages. The first question to answer is "Where am I?" Clear agency logo and name on the top of the page answers this question. This system must be consistent all the way throughout the site so that the user is aware that they are still on that site. This is the most prominent design or element that must be embedded on the top-left corner of a page.

The other question is "What can the site do for me?". Any features must be highlighted clearly. The news and events should be constantly updated. The search box must also be available on every site.

Home Page Vs Interior Pages





Figure 1: (a) One click to the home page (b) home button

For other interior pages, the same system applies i.e. the agency's logo and name is always on the top of the page. The home page should be one-click away from any interior pages. The solution is by making the agency's logo clickable which brings the user to the home page and by placing the home link at the breadcrumbs list.

Navigation

While navigating the site, the question of "Where am I?" must be answered first. Attach the agency's logo and identity on every page and on the same location. Clear page title and headline can also help the user to answer this question.

The standard link colour is important to preserve because the user has already stick to this system since the first time they have browsed the Internet. To answer "Where have I been?" question, the visited link's purple colour is a default setup (figure 2). Keep to this convention.



Figure 2: Visited link is coloured in purple

The usage of breadcrumbs helps the user to realize from where they came and they can go back easily just by clicking the page title on the breadcrumbs list (figure 3). Other than that, to reduce navigational clutter, the truncation system is the best solution. The user can click on "More..." link to have the rest of the document.

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** You are here: home > programmes > undergraduates > interactive multimedia

Interactive Multimedia
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Figure 3: Breadcrumbs

Next, to help the user to manage large amount of information, the site map is very beneficial (Figure 5). From the site map, users can easily access to other pages. This is another important navigational feature.

Search Function

Search should be easily available for every page. The user can link to the search button/page even from anywhere (figure 4). The home page should clearly show the search box and not link to the search page. This feature

must be a type-in field and not a link. The search input field should be wide enough to contain the search query but if the box is too small, the query will scroll and weaken usability.



Figure 4: Link to the search page



Figure 5: Site map

4.0 Conclusion

As a conclusion, web usability among Sarawak Public agency website is very important. It reflects the credibility of the agency in serving the public as how physical building serves their tenants. Focusing on design usability will enhance the aspects of user interaction with the site. This is to improve user satisfaction.

Usability is primarily regarding ease of use. The aim is to understand how the system of the site works. The website is meant for the user not for the designer. The problem arises when the designer develops the website without considering the user's views and feelings.

This paper proposes the earlier mentioned design guidelines to improve the usability and navigation of the site. Individuals involved in website design are also advised to improve the aesthetics, attractiveness and appearance of their sites as well as the interactivity factor.

To fulfil the requests of the user, a website must be usable. An organization's web site should serve the needs of the user to access the information, products and services with ease. Usability is vital to achieve a website's purpose.

5.0 References

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6.0 Speaker's Biodata



Syahrul Nizam Junaini is a lecturer of web-based system development and Multimedia Technology at Universiti Malaysia Sarawak (UNIMAS). He received his MSc in Electronic Imaging and Media Communications (Multimedia Systems) from University of Bradford, UK. His main focus is in the area of website usability. The research project being done by him is regarding ecommerce usability. Other than that he is the author for the Internet Tips Column, Utusan Sarawak.

His area of interest includes multimedia design, HCI and accessibility. He has published his works in numerous international conference proceedings. He is also involved in consultancy work to encourage the public to develop usable website. He can be contacted through e-mail at syahruln@fit.unimas.my.