Online Website Builder for Non-Programmers

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Dissertation submitted in partial fulfillment of

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CERTIFICATE OF ORIGINALITY

This is to certify that I am responsible for the work submitted in this project, that the original work is my own except as specified in the references and acknowledgments, and that the original work contained herein have not been undertaken or done by unspecified sources or persons.

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NUR SHAMSIYATI BINTI MUHAMMAD GARIB

ABSTRACT

Developing a website is not simple. One must have some basic knowledge in programming to build a website from scratch. That is why the author has developed an *Online Website Builder for Non-Programmers* to help non-programmer to develop website on their own. The objectives of this project is to develop a system that can really help in building a website with less programming knowledge and website development skills. This system is using basic approach where the user will follow a step-by-step method in developing their website. The system is to be used by any level of society from who do not have the basic in programming. This will also stimulate the numbers of websites in the internet when every one no matter with programming knowledge or not can develop website on their own. The author used 4 major phases in development methodology. The phases are Planning and Analysis, Designing, Coding and Development and Delivery. As the result, an online system has been built to help the people with no programming background to build their own website besides encouraging Malaysian business people to build a static website that will help them in terms of their business marketing. The system has some limitation and a few future enhancements could be done to make this system more reliable.

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Bismillah ar-Rahmani ar-Raheem

In the Name of Allah, the Most Compassionate, the Most Merciful

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ABBREVIATIONS AND NOMENCLATURES

HTML	:	Hypertext Markup Language
SME	:	Small and Medium Enterprise
XHTML	:	Extensible Hypertext Markup Language
HTTP	:	Hypertext transfer Protocol
VML	:	Virtual Markup Language
URL	:	Uniformed Recourse Locator
PDF	:	Adobe Acrobat Reader extension file
AOL	:	America Online
FTP	:	File Transfer Protocol
FYP	:	Final Year Project
SQL	:	Standard Query Language
PHP	:	Personal Home Page
CSS	:	Cascade Style Sheet
FAQ	:	Frequently Asked Question
PERL	:	Practical Extraction and Report Language

CHAPTER 1

INTRODUCTION

1.1 BACKGROUND OF STUDY

Website development phases are the same as system development phases where there are five important phases. The phases are planning and analyzing, designing, coding and development, testing and finally implementation.

Any project development requires lots of time, money, energy and knowledge besides managerial process of the development process. Same goes to website development.

To build a website there are essentially three options that can be consider, depending on the amount of customization and flexibility wanted and on how much people willing to learn.

1. Web design package for novices. One should look for a package that includes lots of professional looking templates that they would feel comfortable using.

2. Advanced web design package, like Microsoft's Front Page. With this solution one will need to learn a little more about HTML, but it will also have the flexibility to express them self any way they want.

3. Hire a professional web design house to create the site. This option is more attractive to businesses than to individuals, but if they're looking to accept orders on the sites or have very sophisticated graphics, this is a good way to go.

1.2   PROBLEM STATEMENT

1.2.1   Problem Identification

Website has been a very popular advertising medium now days. That is why almost every business in the world should have a website at least a static website.

To build a website, at least a basic knowledge on web programming language is required. For people who interested in having a website but do not have the knowledge, they have to get freelance web designers or a web design house service to develop their website.

To get a freelancer or a web design house service is very costly now days. Even a simple static website can cost hundreds of dollars. But the outcome is normally not up to the client requirement and satisfaction level.

Besides that, to develop a website takes such a long time since it requires core codes of programming. It would take weeks to complete a website with core codes of programming language.

To get a website publish, a hosting server is required. Not all hosting service providers provide web design service to their customers. This will actually incurred the website development cost when a hosting for the website and its design are done separately.

1.2.2 Significant of the Project

With Online Website Builder for Non-Programmers, the development of a website will be much easier, cheaper and shorter development time. The user can now develop their website without any basic knowledge on programming is needed.

The user will also be able to take a one-stop solution where they can develop and host their website on only one platform. This will reduce the burden and the user's time in searching the website hosting and designing services.

Now, everybody can have website with less cost and time. This will encourage the Malaysian SME mainly to build their website since internet is now one of the most popular media for marketing and advertising.

1.3 OBJECTIVES

By the end of this project, the author should accomplish the objectives of this project. There are three main objectives for this project:

i.   To develop an online system where by can be accessed through the internet from any side of the world and also to develop a step-by-step instruction to develop a static website.

ii.   To apply beginners-basic approach to develop a static website, so that can be used by Malaysian SMEs and any level of society from children to oldies and from non-programmer to professionals.

iii.   To stimulate the numbers of website in the internet by encourage people to develop website on their own.

1.3.1 The Relevancy of the Project

It is not to deny that there were too many website builders in the internet. But mostly are developed by people outside our country, Malaysia. Malaysian business people especially involved in small and medium business do not want to use the current systems available in the market since it is very costly.

The online website builder will help the Malaysians mostly the SMEs to get to use a simple static website builder at a very low cost. The builder will also help to encourage Malaysian entrepreneurs to have a website to advertise their company and product.

1.3.2 Feasibility of the Project within the Scope and the Time Frame

It takes 32 weeks to complete the whole project. Basically, there are two main parts to be taken into consideration when it comes to a website. Website development and website management is a collaborative task in providing good and successful website. In this case, the author has decided to minimize the scope by concentrating on the website development part.

1.4 SCOPE OF PROJECT

The Online Website Builder for Non-Programmers is developed to help people in developing their website on their own without need to get any professionals services. The builder will be used to develop a static website from scratch without requiring any knowledge on any web programming languages. The users can build their website just by following the steps given in the builder. Besides building a website, a website builder must also cater the website management part.

As decided, the author focused only on the website builder it self. User will start developing the website by following the steps given. Since the builder is located in the Internet, the users can use the builder 24-hours per day, 7 days a week. The builder will also include some graphical elements for the user to use on their website.

CHAPTER 2

LITERATURE REVIEW

2.1 INTRODUCTION

Internet adoption, in both large and small firms (SMEs), is promoted as a means to improve competitiveness as encouraged by the European Union and various national governments. [10]

The task of this project is to build an online system that being used to create or develop a website called Online Web Builder for Non-Programmers. The author focuses on the development process of a website. In order to get better understanding on the website development process, the review centers on what is the main or major processes that are being adopted by other professional developers. Besides planning the website, it will also focus on the building part of a website.

2.2 DEFINITION OF WEBSITE

In general, a website means a collection of World Wide Web or WWW files. To be more specific, website is a collection of web pages that is HTML or XHTML documents accessible generally via HTTP on the internet. [1] Website is also known as Web Presence but less frequently used. [14] It is an Internet Marketing Tools in which is now a major, multi-billion dollars industry.

2.3   DEFINITION OF ONLINE WEBSITE BUILDER

Generally, online is connected to, served by, or available through a system and especially a computer or telecommunications system besides it is done while connected to such a system. [11] Builder is the one that create an object assembled from more than one element, or the object itself. [1] In computer programming, building is the process by which source code is converted into executable object code.[1] Online Website Builder is a connected creator that converts source code such as HTML into a collection of web pages and World Wide Web via HTTP on the internet.

2.4   WEBSITE PLANNING

2.4.1   Definition of Planning

Planning is the management function that is concerned with defining goals for future organizational performance and deciding on the tasks and resources needed to be used in order to attain the said goals. [1] Planning somehow or rather is very important in developing a website since the planning can actually gives the overview of the website and its content.

2.4.2   Website Planning Strategies

2.4.2.1 Determining Content

To determine the content, the reason of being online and the audience must be determine first. What to include in the first version of your site, must be decide. [12] About Us and Testimonial is the most important page that needs to be included in a webpage. About Us page will give a brief explanation about the company or business while the testimonial is to give their client good impression about the business and its company. Consider what existing materials that have

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be the web site such as brochures, course outlines and reports, what additional materials needed to develop, and what external resources such as other web sites relating to your subject area you need to identify if applicable. Take into consideration "How often the material will need to be updated" and "Who will be responsible for updating and developing the site". [8]

2.4.2.2 Structuring the Website

Structuring a website is the subtask of identifying or determining the website content. Some steps that can be used to structure a website as written in Yenza! are as follows:

- Play around with the content and see what categories suggest themselves
- Develop a "map" of the site
- Decide what navigational help should be provided on each page - consistency in navigation will make the site much easier to use
- Decide what other information such as contact details that should be provided on each page

2.4.2.3 Plan the website layout

A web page can normally contains text, graphics, audio, interactive multimedia content that requires a plug-in such as Flash, Shockwave or VML, and applets a subprograms that run inside the page which often provide motion graphics, interaction, and sound

It is really important to have a good layout or interface. Here are some general guidelines being listed on "Learning the Net" website.

- The home page should draw the audience in, not overwhelm them with information. Keep the layout simple and the text brief. Add graphics to communicate your image.

- Reproducing existing brochures or other documents on the Web usually doesn't work well. People have short attention spans and don't particularly like to read copious mounts of text on a computer screen. Use only the most compelling information. Add headings and bold text, where appropriate, to make reading easier. Try to limit the length of a web page to three screens.

- If it is must to include lengthy documents, break them up into sections with headings. Create an index or table of contents at the top of the page, with links to each section. If want to provide access to a lot of documents, add a search feature or provide them as PDF files that can be easily downloaded for reading off-line.

- Use graphics to enhance the site, but minimize graphics file sizes whenever possible. Include only those images that add value. Not every photo needs to be in color; not every catalog item needs a picture; not every picture needs to be full screen.

- A layout that looks good when viewed in the favorite web browser may look different to people accessing the site from an online service such as AOL. Check the web page by viewing it in a number of browsers, including Internet Explorer, Netscape Navigator and AOL's.

- Consider adding links to related websites to expand information. Be sure to send courtesy notices to webmasters at the sites that link to.

- If have the time to respond, encourage feedback via e-mail. It will get invaluable information from the audience.

- Measure traffic to the site. Track viewers' paths through the web pages, so that adjustment can be made to the content accordingly.

2.4.2.4 Questions to be asked

In planning a website it is important to answer some question. Here is the question listed as in ITeachYou.com website:

1. What is your budget?
2. What is your intended launch date?
3. How will your online presence differ from your current business model?
4. Who will be hosting your website?
5. Who is (are) your audience(s)?
6. Why are people going to come to your site?
7. Who will be designing and developing website?
8. Who are the primary content experts?
9. Who will be managing the process?
10. Who will function long-term as the webmaster or senior site editor?

2.5   WEBSITE DESIGNING

2.5.1   Definition of Designing

It is usually considered in the context of the applied arts, engineering, architecture, and other such creative endeavors. Designing normally requires considering aesthetic, functional, and many other aspects of an object, which usually requires considerable research, thought, modeling, iterative adjustment, and re-design. Design as a process can take many forms depending on the object being designed and the individual or individuals participating. [1]

2.5.2 Ways to Get Superior Sales

[13] Lois Divine in his articles titled The Site Mechanics, listed five (5) tips for a web site to get superior sales or to drive people into the website. Below are the tips shared by Lois Divine:

(1) *Content*

The less is more crisp copy that conveys your message succinctly is vital. Short paragraph and clear delineation between heading and content help visitors to understand and get to where they want to go. Style is important. The use of language that is more person-to-person and less business-to-customer create connection with the tone and draw your customer close to you.

(2) *Blind Spots*

There are parts of web pages that visitors tend to overlook. Commonly this affects the right hand portion of pages, so be careful how you use them. Information about how to purchase, fundamental to building trust in the site, got list in the right hand menu. Keep key information where it can be easily found, in prominent and well-defined navigation position.

(3) *Usability*

(4) *Search*

Search function is not a bonus. It is a necessity. It's a key factor in whether your site succeeds or not.

(5) *Color*

What does the color of a site says about you? Colors can set a mood and draw visitors in.

2.5.3 Proposed Template Layout

Divine has also proposed the best template layout to be use for a website to drive customers and visitors in the web site. Below are the layout proposed by Divine. [13]

Banner *(Related Graphics)*	
Navigation *(Menu, Pages* *Or* *Functions)*	*Content* *(Search, Text, Images)*
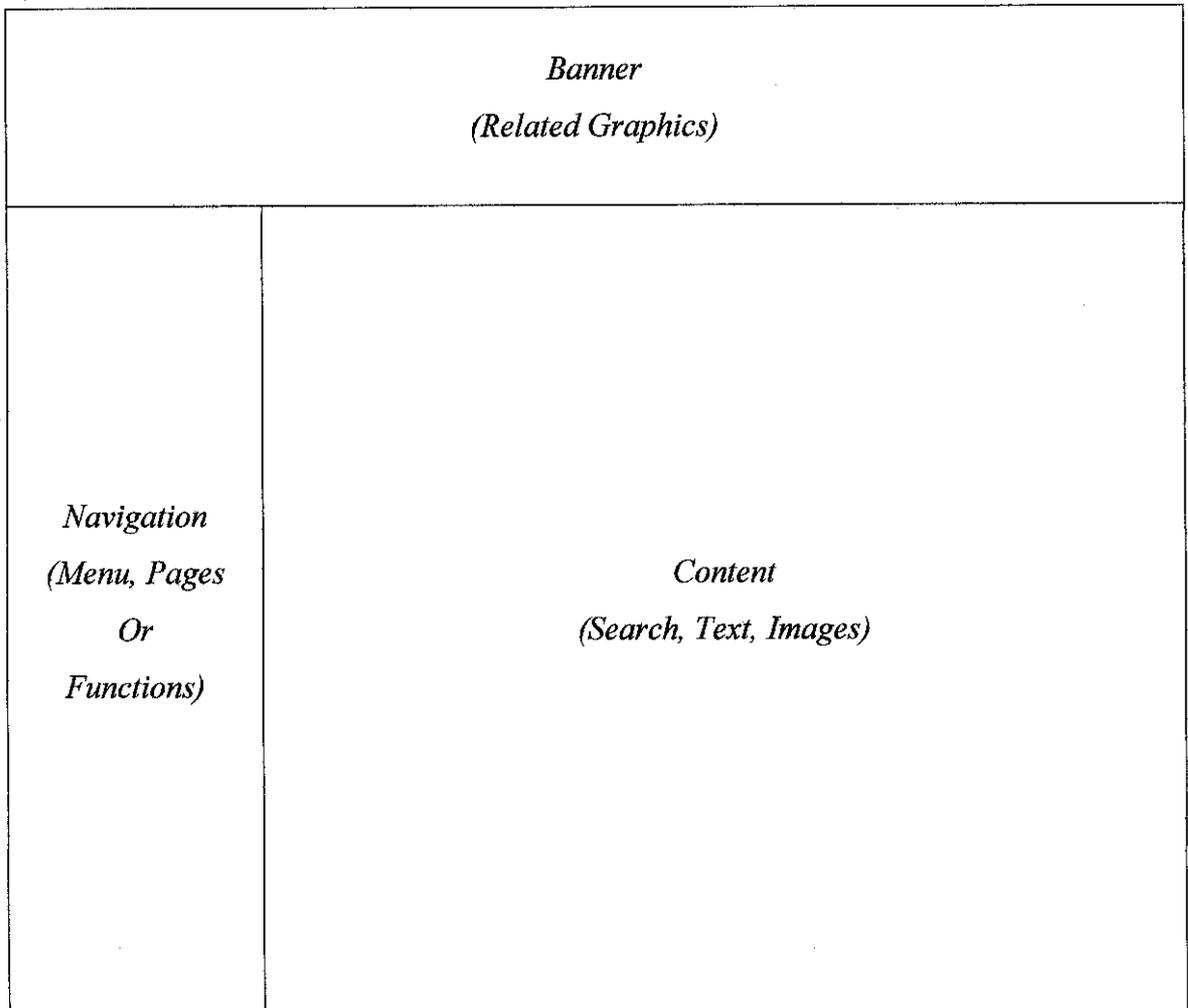
2.6 WEBSITE DEVELOPMENT

2.6.1 Definition of Development

Development in the context of software development is a process of developing software through successive phases in an orderly way. This process includes not only the actual writing of code but also the preparation of requirements and objectives, the design of what is to be coded, and confirmation that what is developed has met objectives. [9]

2.6.2 Get Professional Help

It is easy to get professionals. There is thousands of web design house worldwide. To get to hire the professionals is not a big problem. But the problem is working with them. Every single thing must be put in writings including the price quotes and the "work for hire" agreement. [3] Besides that, the cost will also increase depending on the website rather than building it in-house. Learn the Net has listed up common charges for developing a website by professionals.

- A basic website with a few graphics and no forms: US $200 to US $1,000
- More advanced site with custom graphics: US $1,000 to US $5,000
- Complex site with custom graphics, image maps, forms, search capabilities: US $5,000 and up
- Site Planning: US $75 to US $200 per hour
- Programming: US $75 to US $200 per hour
- Graphic Design: US $25 to US $75 per hour
- Site Maintenance: US $75 to US $300 per month and up

Prices vary considerably, depending on geographic location and complexity of the site. These days, sophisticated e-commerce enabled sites can cost millions of dollars to develop.

2.6.3 Tools and Languages

To create a web page, one needs a general text editor or a special HTML editor like Microsoft FrontPage, Macromedia Dreamweaver, Mozilla Composer and so on, and a FTP program to upload the page to the web server. One can use the web browser to upload the web page file to the server.

One can also use a pre-made web template to create a web page. Web Templates let web page designers edit the content of a web page without having to worry about the overall esthetics.

There are many tools that can be used in developing a website. Hyper Text Markup Language or HTML is one of the famous languages normally being used by programmers to develop a website. It is the authoring language used to create documents on the World Wide Web. [5] Originally, PHP stood for "Personal Home Page". But today, the official meaning is the recursive acronym "PHP Hypertext Preprocessor". However, some fans of this language use also label "Pretty Hypertext Preprocessor". [1] PHP is an embedded scripting language for HTML documents. [6] It is a popular open-source; reflective programming language used mainly for developing server-side applications and dynamic web content, and more recently, other software. [1] Cascading Style Sheets or formally known as CSS is a simple mechanism for controlling the style of a Web document without compromising its structure. [7] It is a style sheet language which is used to describe the presentation of a document written in a markup language. With CSS, designers and users can create style sheets that define how different elements, such as headers and links, appear. These style sheets can then be applied to any Web page. [5] It is used to define colors, fonts, layout, and other aspects of document presentation.

JavaScript is the Netscape-developed object scripting language used in millions of web pages and server applications worldwide. [8] The language is best known for its use in websites, but is also used to enable scripting access to objects embedded in other applications.

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Besides programming languages and script, graphic editor is also important. Adobe Photoshop is one of the tools that commonly been used in editing graphics. Although primarily designed to edit images for paper-based printing, Photoshop is used increasingly to produce images for the World Wide Web. [1] Besides Adobe Photoshop, Macromedia flash is also commonly used by web designers in developing animated graphics for a website. The Flash files (or "Movies"), which usually have an SWF file extension, may appear in a web page for viewing in a web browser. Flash files occur most often as animations, advertisements or design elements on web pages and, more recently, Rich Internet Applications. [1]

2.6.4   Website Checking

It is important to check the web site before publishing it. At least twice it has to be checked, before and after it is being uploaded to the web server. Based on Yenza!'s website, below are the criteria that need to be check:

- Do all the images appear, or are there "broken" images?
- What do the pages look like with the images turned off?
- Do all the links work?
- Are there any "leftover" HTML tags? Tags which haven't been opened or closed properly won't do their job, but *will* appear on screen: e.g. /B> or <
- Do the page titles match the contents?
- Is the necessary navigational information provided? Is it consistent?
- Are there any spelling mistakes or grammatical errors?
- Have contact details been provided?
- Are key URLs given in their full form, not just as links?
- What information will need to be updated, and when?

CHAPTER 3

METHODOLOGY

3.1   PROCEDURE IDENTIFICATION

For this project, the author decided to apply a few phases for the development of the project. This model provides sequential approach to software development. If an error occurred on one of the phase, then refer back on the previous phase. This model is not the same as the waterfall model since the error can be corrected at any phases without needing to wait until the implementation phase. Figure 3.1 shows the flow of the process of the model being adopted for the project. Detailed timeline of the projects are in Appendix A, Project Gantt Chart.
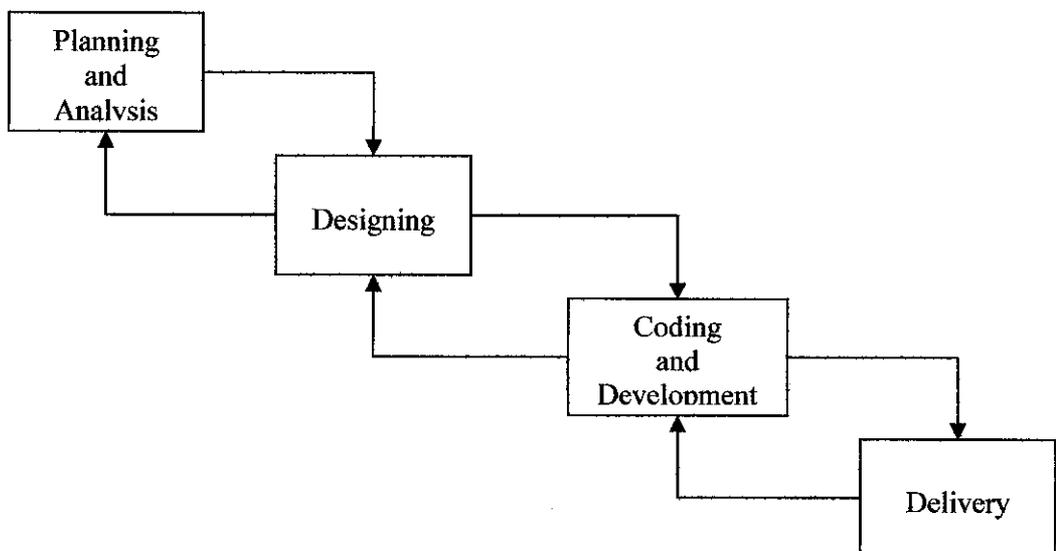
Figure 3.1: Phases of Development Process Adopted for the Project

3.1.1 Planning and Analysis

Planning and analysis phase is an initial state of any types of system development. It is somehow or rather important since the planning will give the brief idea on how the whole system should be. By planning and analyzing, developers can identify what are the processes involved in the system and what type of programming language to be used. Besides that, planning and analyzing will help in designing the whole system. Table 3.1 shows the activities that will take place in the planning and analyzing phase.

Table 3.1: Activities on the Planning and Analysis Phase

Activities	Descriptions
Proposal Submission	The author submitted the project proposal to get approval from the FYP committee.
Project Scheduling	The author designed the project schedule to make sure that the project complete by the presentation time.
Problem Analysis	The author analyzed the problem statement of the project as well as its appropriate solutions.
Data Gathering	The author gathered all the necessary information about the project via internet and searching method.
Requirement Analysis	The author analyzed the system requirement based on the research made about the processes of developing a website.
Feasibility Studies	The author studied the scope and the time line of the project to check whether it is necessary or not.

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3.1.2 Designing

Designing sound simple, but the processes are complicated. There are too many criteria to be taken into consideration such as the human computer interaction, and also the basic processes that cannot be missed. Design is important for the coding and development phase. With good design, the system being develop is less errors. Table 3.2 shows the activities that will be taken place in the designing phase.

Table 3.2: Activities on the Designing Phase

Activities	Descriptions
System Flow	To design the flow of the whole system together with its data to be included and also the databases that are required.
Interface Flow	To design the flow of the interface based on the designed system flow.
Application Interface	To design the story board of the interface of the system for the view of users in the future.

3.1.3 Coding and Development

Coding and development phase are the most critical part. In this phase all the coding will be done from scratch based on the system flow and design. This phase is the phase that will show the end product of the project. There are a few activities that will be run to complete this phase. The activities are shown in table 3.3.

Table 3.3: Activities on the Coding and Development Phase

Activities	Descriptions
Graphic Designing	The author designed all the necessary graphics that need to be included in the system.
Development Process	The author will do the coding from scratch to develop the interfaces, processes, interactions and also the databases.
Interface Testing	To test the interfaces whether it follows the sequences as stated in the interface flow design.
Code Testing	To check whether all the process are being followed and to check whether there is any error in coding or not.

3.1.4 Delivery

Delivery is the final phase of the project. Delivery is most likely as the touch up activities that will complete the whole project. The activities on this phase are as shown in table 3.4.

Table 3.4: Activities on the Delivery Phase

Activities	Descriptions
Project Presentation	The author will present the project to the examiners and also the supervisor.
Report Submission	The author documented the entire task done, findings and also discussions.

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3.2   TOOLS

3.2.1   Software to be used

Without software, a system cannot be developed. There are many type of software in the market that can be used to develop a system. There are five major software that been used for this project. They are:

- Adobe Photoshop CS –used as graphic editor
- CSS – used to make a fixed style for the system
- PHP –used as the programming language
- MySQL –used as the database platform
- Apache –used as the in-house server

3.2.2   Hardware needed

As an online system, obviously it should have hardware that is important. They are:

- Server – is to be used as a place to put all the system
- Client computer – is to be used to browse and use the system

CHAPTER 4

RESULT AND DISSCUSSION

4.1   RESULT

In total works at all the development stages that the author has performed, the system developed has a few functions that must be followed by the system user. The results and findings of what the author has discovered during and after the system development will be discussed

4.1.1   System Design

The system design for the Online Website Builder for Non Programmers are mostly based on the design steps of a website where ones have to categorized their website then choose the template design and lastly start inserting data before they can preview it. The steps being used are the common steps used in static website development.

The steps usually are varying between different developers. But the steps being followed in the Online Website builder for Non Programmers are the most commonly being used by majority of the developers. The flow of steps being used by the Online Website Builder for Non Programmers is shown in Appendix B.

Besides the system flow, interface flow is also very important to develop the system since the system is a step by step approach where system users do not have options to choose the next thing to do. Refer to Appendix C and D to look at the interface flow of

the system and the story board design for the system. Both interface flow and story boarding is very crucial to get the system interface to look nice, simple and understandable since the system target users are the non programmers and people who do not have enough knowledge in web programming besides to save the user's time.

4.1.2 System Functions

4.1.2.1 Choose Template Category and Design

This function will require the system user to choose the template category for their website. The categories are such as medical, Child Care, Business, General and many more. Each template category has different template design to be chosen by the system user. Each category has its own page to be displayed. Besides that each category will have different main index but pages such as *About Us* and *Contact Us* is a must which will be include in most of the category. Table 4.1 shows each category provided in the system and its pages.

Template design for a website is one of the crucial parts in website development because it gives first impression to people who browse the website. That is why system user needs to choose the best and appropriate template to give good and better impression to other people. Choosing a template design function helps the system users to choose an appropriate design to show their image. For a start each category is having one (1) to three (3) template designs each. This is to ensure that the system user gets what they want. Refer to Appendix E for some of the template design samples.

Table 4.1: Website Categories and its Pages

Website Categories	Pages
General	- About Us - History - What We Do - Contact Us
Accounting	- About us - Contact Us - Company - FAQ - Site Map
Business	- About Us - Contact Us - Services/Products - Location
Insurance	- About Us - Contact Us - Company - Insurance Plan - FAQ
Child Care	- About Us - Contact Us - Child Education - FAQ - Location

Health & Beauty	• About Us • Contact Us • Services and Products • Beauty Tips • Location
Music	• About Us • Contact Us • Music Tips • Location
Real Estates	• About Us • Contact Us • Company • Services Provided

4.1.2.2 Create Website Profile

'Create Website Profile' function is for the website identification where some user information is required such as contacts details together with website information such as website name, website description and so on.

The website profile is important to direct the websites to their correct folder or technically known as sub domain. Sub domain makes things easier, where system user can promote their website developed by Online Website Builder for Non Programmers just by giving people their as-if-their-own-domain.

Crone job must be done to get the sub domain functioning as in figure 4.2(a). This method will redirect the sub domain to the related website page.

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Yahoo! Mail - The best web-based email! - Mozilla Firefox

File Edit View Go Bookmarks Tools Help

http://mail.yahoo.com/

Getting Started Latest Headlines Sign In

Figure 4.2(a) Sub Domain Example using redirecting method
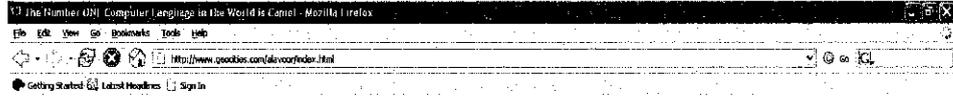
Figure 4.2(b) Sub Domain example using folder method

Figure 4.2(b) shows an example of a domain that used folders name at the end of the URL. To get this method working a folder directory must be created to save all the related information in the folder so that all the information will be saved properly in the right folder.

4.1.2.3 Insert Website Content

Inserting website content can be very easy if user just cut and paste the information to the system. But it can be very tedious job when the user have to create new information them self. Usually people tend not to read the whole writings. That is why a short and brief content must be used rather then long sentences.

All the information keyed in by users can be saved to the back end system or so-called server by using two medium:

1. Database – by using database data can be saved to the server by updating the database with new data. The fields of the database that would hold the data must be in LongText data type which depends on the configured maximum packet size in the client/server protocol and available memory.

2. Text File – saving all the inserted data into a text file as in *.txt requires more than one text file. Each page data inserted must be saved in different text file so that it can be called in the future.

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The author chooses to use database as the medium to save all the content data together with the information data in a single table in a database. This can be done because the system requires only ten fields as shows in table 4.2

Table 4.2: Database Fields Created and the Data-to-be-Inserted

Table Fields	Data-To-Be-Inserted
template	template chosen by user
webname	web name chosen by user
ctcname	contact person name given by the user
ctcno	contact person contact number given by user
descp	web description given by the user
pg1	first page content data provided by user
pg2	second page content data provided by user
pg3	third page content data provided by user
pg4	forth page content data provided by user
pg5	fifth page content data provided by user

4.1.2.4 Preview Website

To preview the website created by the user, actually need some tedious and complicated back end service where the URL will send the web name parameter to the back end system and the system will search the parameter in the database table to get related information such as the template being choose, and the content data of each page that being inserted by the user.

If the author were to use given hosting with cPanel-ready, a crone job must be made so that the URL are linked to the back end server. The crone job coding is totally different from the coding commonly being used. This method is also known as redirecting the URL.

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4.2   Discussion

4.2.1   System Limitation

Not everything in this world is perfect so do this system. Even though the system has been completed there is still some limitation that should be taken into consideration for future enhancement.

The system is limited to only the development of a static website. It means that the system only allow user to create their website. The users cannot update nor do any maintenance to their created-website. Meaning the user can only do the website once. Once they click the final save button after inserting the website content that's the final of their website and they do not have the ability to edit their website if there is any problem such as spelling error or grammatical error unless the user creates a new website with different website name.

Besides all the above, the system also is limited to designs provided in the system. Users have to choose one of the template design given. They cannot create one on their own. Meaning only fixed template design is allowed. Besides template design, pages included for their website are also fixed base on what category they have chosen.

All this limitation can somehow or rather being reduced by enhancing some of the functionality.

4.2.2   System Testing

All created-system must be test before delivery. So do this system. For this system, the author decided to test the system the whole way through the development. It means that the author tests each interface and each code of line every time the interface and codes of each function is completed. The author saves time if any problems occur in the middle of the development process by using the testing method. There are two types of testing that have been conducted. The testing and results are as in table 4.3 below.

Table 4.3: Testing Types and the Test Result

Testing Type	Testing Result
Interface Testing	All necessary graphics are shown on all the pages. The flow of the interface follows the design of the interface flow. There are no broken links in the system. The testing runs well and the outcome result is as expected with less error.
Code testing	The codes have less syntax error and the codes do process and give expected outcome except for some function coding such as the copy file and select function from the database.

Besides all the above, the author also have made some minor testing on the connection between the database and the system. Lorem Ipsum dummy text has been used in this case to check whether there are connection between the system and the database. Lorem Ipsum dummy text been chosen by the author because, it is a long established fact that a reader will be distracted by the readable content of a page when looking at its layout. The point of using Lorem Ipsum is that it has a more-or-less normal distribution of letters, as opposed to using 'Content here, content here', making it look like readable English. Many desktop publishing packages and web page editors now use Lorem Ipsum as their default model text, and a search for 'lorem ipsum' will uncover many web sites still in their infancy.

4.2.3 System Implementation

The system is an online system, as clearly stated in the project title. The system is a server based system where it is important to have a server, a database and also a PHP platform to makes the system works. The system must be put on an independent platform which has two different computers, one for the server and another one for the client side. But as for the demonstration purposes, only one computer that equipped with desired platform of integrated server is used. Foxserv v3.0 has been chosen as the platform. Foxserv 3.0 is an application where it integrates apache server, mySQL and PHP besides some other programming language that requires a server platform to run such as PERL and Python.

The whole system is installed at the back end, also known as the server. On the client side the system can be used by using the internet browser such as the Internet Explorer or the Mozilla Firefox. The system is compatible with both browsers.

CHAPTER 5

CONCLUSION AND RECOMMENDATION

5.1 CONCLUSION

Website have been one of the most popular and reliable media of advertising. Besides advertising, website can also be categorized as one of the marketing tools of a business called internet marketing tools. For some people, they already realize that having a website is an advantage. Having a website will make their business available world wide.

To have a website is easy for company and business that do not tied up with small budget, they just pay certain amount of money to get the professionals service. But for the company and business that are tied up with small budget it seems to be very costly for them to have a website. If they were to pay thousands of dollars, whereby they can use the money to operate their business they would think that it is better for them to use the money to operate their business rather than to spend on website development.

Online Website Builder for Non-Programmers is developed to facilitate this small company and business that are tied up with small budget. They can do their website on their own without having any knowledge in programming. This will help them to cut their cost besides having an online presence. The most important thing is that the Online Website Builder for Non Programmer is to encourage people and businesses to use the internet as a marketing tool.

5.2 RECOMMENDATION

Recommendations allow the project to be improved and make it more useful and reliable. For this system, there are a few recommendations that can be done. In order to enhance it usage, a few new features should be consider to be implemented in future use.

For future enhancement of the Online Website Builder for Non Programmer, adding the maintenance part is the best enhancement to get the Online Website Builder for Non Programmer meets the standard of high corporate identity so that it can be used by corporate people and company. Not only that, it can also add more features and function such as inserting images and pictures to the website besides choosing the specific color.

To make the Online Website Builder for Non Programmer more efficient the template design must always be updated frequently. To update the system frequently, the easiest way is to update the database. The database needs to be stronger in terms of the capacity limit to get the system running well and give better performance.

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APPENDIX A:

Project Gantt Chart

GANTT CHART – Online Website Builder Development

Tasks	January 1	2	3	4	February 1	2	3	4	March 1	2	3	4	April 1	2	3	4	May 1	2	3	4	June 1	2	3	4
Design Planning																								
- Story Board																								
Environment Setup																								
System Development																								
- Graphic Designing																								
- Interface Coding																								
- Database Development																								
Presentation Preparation (pre-EDX)																								
pre-EDX Presentation																								
Continue Development Process																								
- Database Development (cont)																								
- Database Connectivity																								
Full System Testing																								
Final report Preparation																								
System Error Correction																								
Final Presentation Preparation																								
Final Dessertation Preparation																								

APPENDIX B:

Project System Flow

```
┌──────────────┐          ┌──────────────┐           ┌──────────────┐          ┌──────────────┐
│ User Choose  │          │    Insert    │           │    Insert    │          │   Preview    │
│   Template   │   Next   │   Website    │  Submit   │   Website    │   Save   │   Website    │
│ Category and │ ───────► │ Information  │ ────────► │ Data/Content │ ───────► │              │
│    Design    │          │              │           │              │          │              │
└──────────────┘          └──────┬───────┘           └──────┬───────┘          └──────────────┘
                            Insert│                    Update│                          ▲  │
                                  │                          │                          │  │
                                  │                          │                  Request │  │
                                  ▼                          ▼                          │  │
                            ┌──────────────┐                                            │  │
                            │  ╭────────╮  │ ◄──────────────────────────────────────────┘  │
                            │  │        │  │                                                │
                            │  Database   │                                                │
                            │  │        │  │                                                │
                            │  ╰────────╯  │                                                │
                            └──────┬───────┘            Send                               │
                                   └────────────────────────────────────────────────────────┘
```
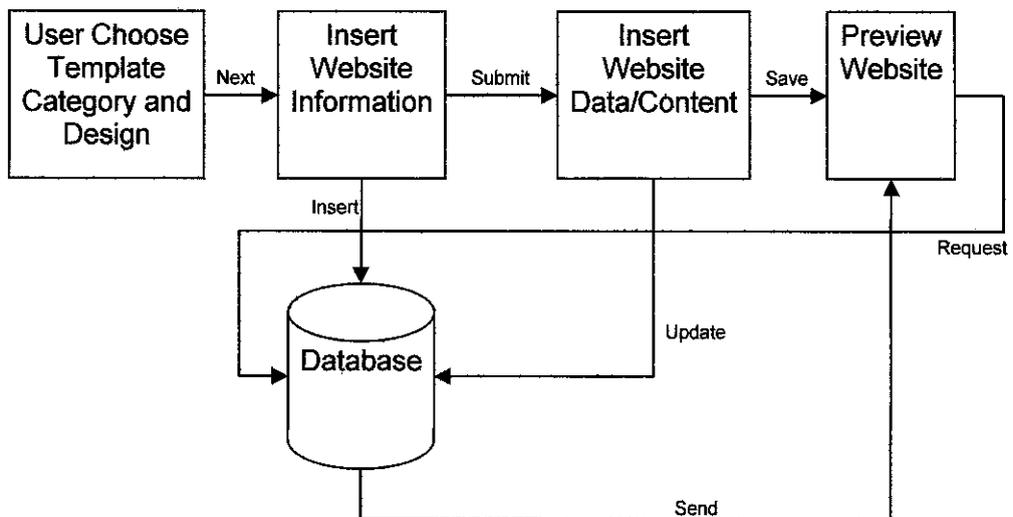
APPENDIX C:

System Interface Flow

```
┌─────────────────────┐              ┌─────────────────────┐
│  Choose Template     │    NEXT      │  Insert Website      │
│  Category and Design │◄────────────►│  Information          │
│                      │              │                      │◄──┐
└─────────────────────┘              └─────────────────────┘   │
                                                                │ SUBMIT
┌─────────────────────┐              ┌─────────────────────┐   │
│  Update Data         │    SAVE      │  Insert Website      │   │
│  Confirmation        │◄────────────►│  Data / Content      │◄──┘
│                      │              │                      │
└──────────┬──────────┘              └─────────────────────┘
           │ VIEW
           ▼
┌─────────────────────┐
│                      │
│  View Website        │
│                      │
└─────────────────────┘
```
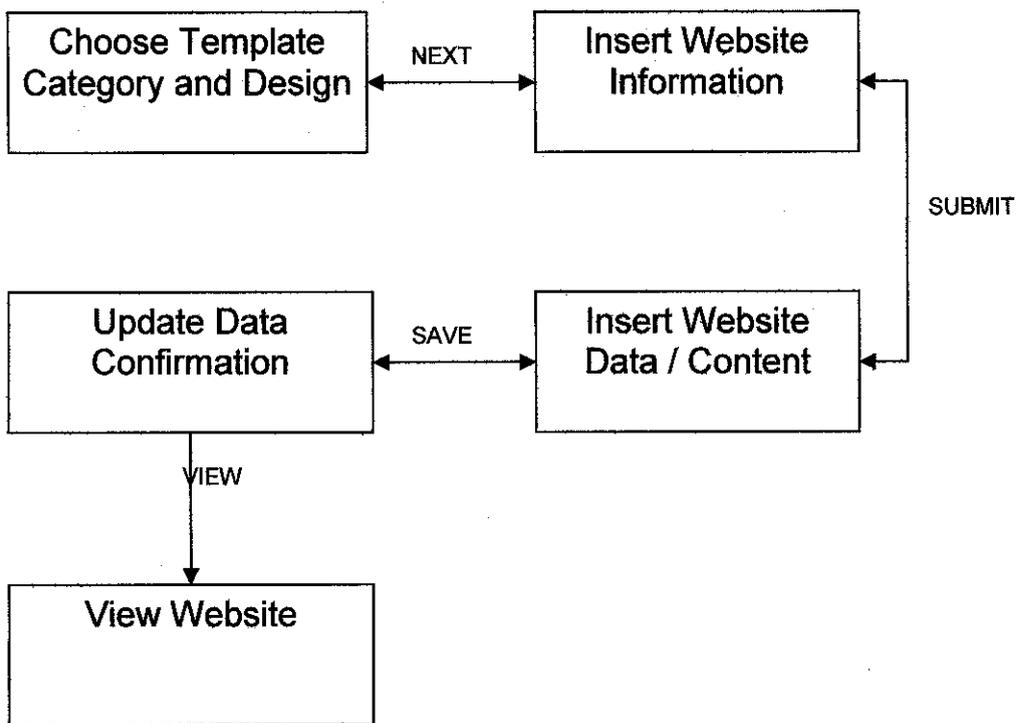
APPENDIX D:

System Story Board

Step 1 Page Arrangement

```
┌─────────────────────────────────────────────────────┐
│                                                       │
│                    INSTRUCTION                        │
│                                                       │
│                                                       │
└─────────────────────────────────────────────────────┘

┌─────────────────────────────────────────────────────┐
│                  CATEGORY TABS                        │
├─────────────────────────────────────────────────────┤
│  ┌─────────────────────────────────────────────────┐ │
│  │          CATEGORY INTRODUCTION                   │ │
│  └─────────────────────────────────────────────────┘ │
│  ┌────────────────┐                                   │
│  │  PAGES FOR      │                                  │
│  │ THE CATEGORY    │                                  │
│  │                 │                                  │
│  │                 │                                  │
│  └────────────────┘                                   │
│  ┌─────────────────────────────────────────────────┐ │
│  │           CATEGORY TEMPLATES                     │ │
│  │                                                  │ │
│  │                                                  │ │
│  │                                                  │ │
│  └─────────────────────────────────────────────────┘ │
│                                      ┌─────────────┐  │
│                                      │ NEXT BUTTON │  │
│                                      └─────────────┘  │
│                                                       │
└─────────────────────────────────────────────────────┘
```
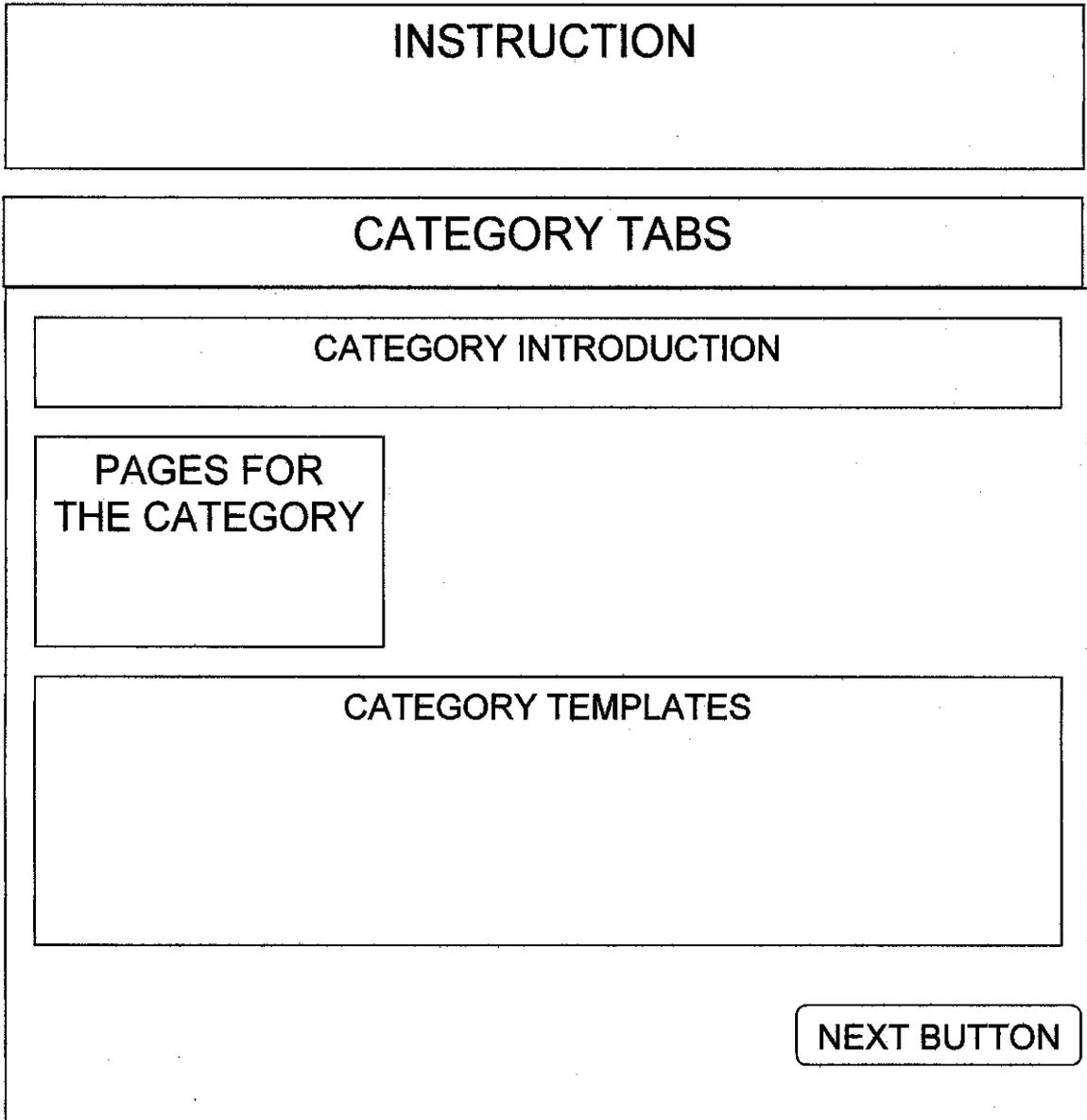
Step 2 Page Arrangement

Template chosen
(as background)

INSTRUCTION

INFORMATION REQUIRES

SUBMIT BUTTON
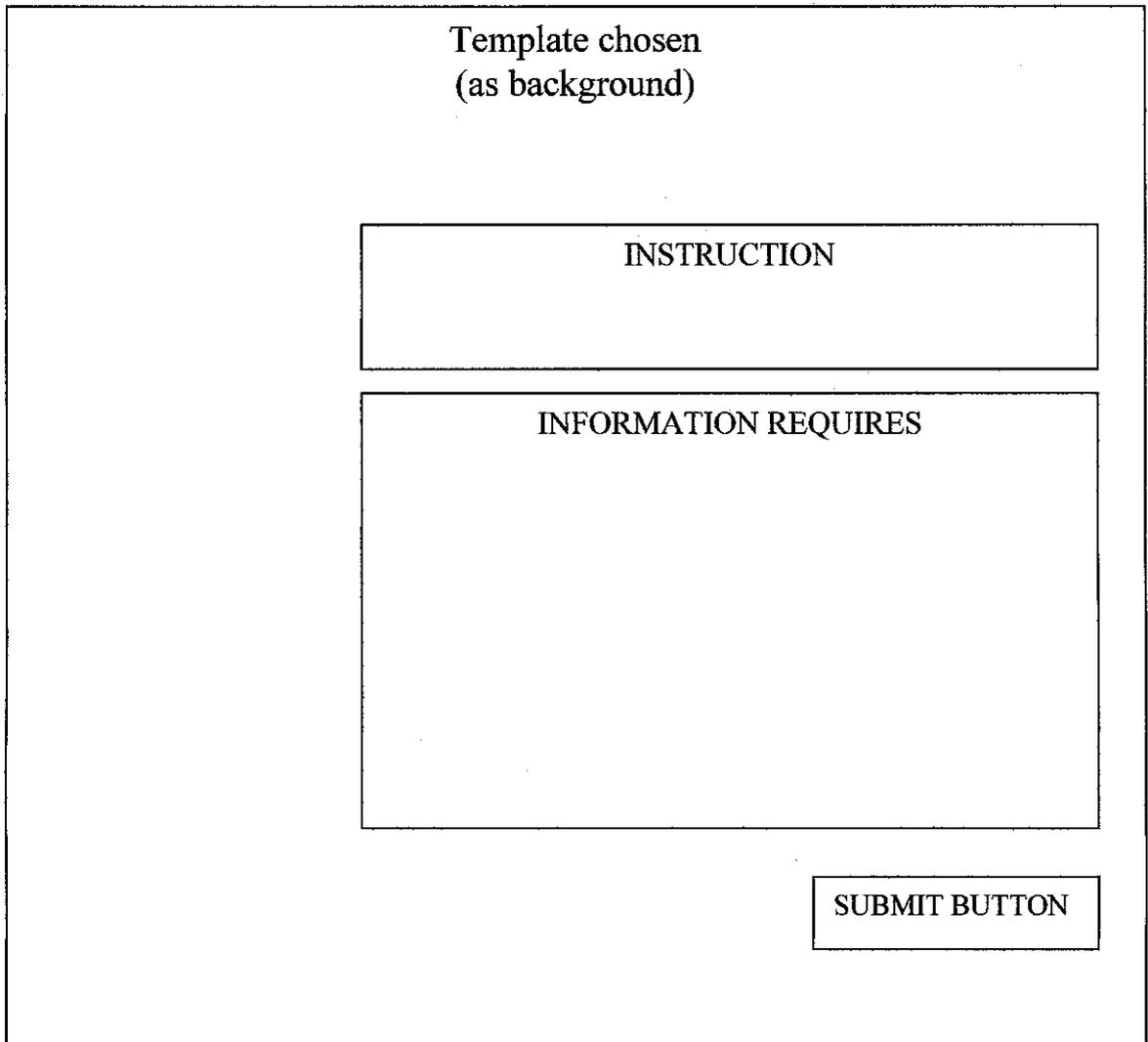
Step 3 Page Arrangement

INSTRUCTION

PAGE TABS
CONTENT TO BE INSERTED AREA (Text area)

SAVE BUTTON

APPENDIX E:

Sample Template Design

Child Care

Accounting

About Us

Contact Us

Company

FAQ

Sitemap

Business

About Us

Contact Us

Company

FAQ

Sitemap

General

About Us

Contact Us

Company

FAQ
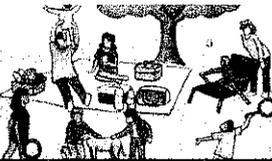
Sitemap

APPENDIX F:

System Screen Shots

Examples of system screen shots

# Step 1: Choose website category and design
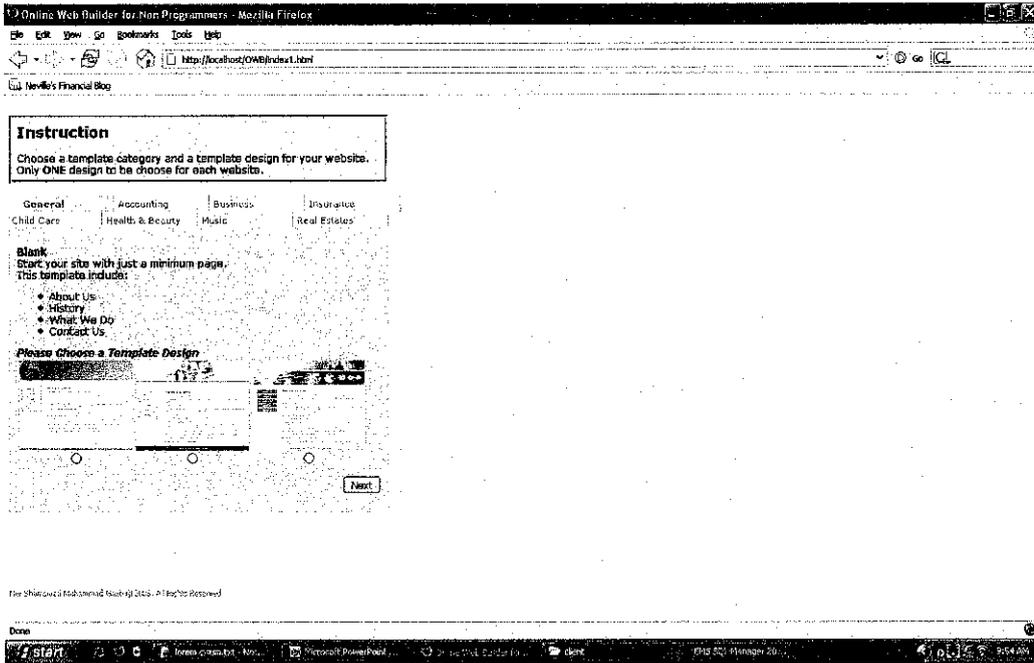
Step 2: Insert Website Information

Step 3: Insert Website Content

Step 4: Preview Website