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INTRODUCTION

Internet is a world of sharing information. People find Internet a useful way to get involved in the society. With a browser, everyone could easily read web pages posted by others. But for non-computer skilled users, who want to build and post their own web pages, it is too difficult and time-consuming. Besides, hosting a web site is a technical nightmare and paying someone else to host it is expensive. If the page is launched, there is no cheap and easy way to publicize it. Sites are useless if no one read them.

Some choose the idea of posting in online discussion groups (forum) but it is not an ideal platform because their posts will be limited to a few lines of text and many will be lost among other people posts. Also group administrator can delete their post at any time.

That is why personal portals are gaining increasing attention from Internet content providers and surfers. Personal portal is a web page that offers content and services customized for an user. Users can create a personal web site that displays selected information and materials according to their own needs or taste. Users may not need to know computer skills to build or maintain the sites. Plus, personal portal have given the opportunity for people to express their views to a mass audience.

Thus, the web site may then act as the entry point for the user to access various resources on the Internet.
OBJECTIVES

The aim of this project is to provide information about personal portals. According to the features and technologies of two existing portal publisher, a proposal of a design of a personal portal is created with all the features and technology evaluated.

REQUIREMENT OF THE USER INTENDED

- A basic computer setup and system
- Basic knowledge about Internet
- Internet access
- A web browser (Internet Explorer 6 or above)
- Flash plug-in and JavaScript support.

PERSONAL PORTAL PUBLISHER SELECTED

The following are the personal portal publishers selected:

- XANGA
  Link: www.xanga.com

Xanga is operated by Xanga.com, Inc., based in New York City, USA. On May 3, 2006, Alexa Internet has rated Xanga the 21st most popular English-language website, and the 36th most popular website in the world. Users of Xanga are called as “Xangans”.

- YAHOO! GEOCITIES
  Link: www.geocities.com

Yahoo! Geocities is operated by Yahoo!, Inc., founded by David Bohnett and John Rezner in late 1994. On May 3, 2006, Alexa Internet has rated Yahoo! Geocities the 32nd most popular English-language website, and the 61st most popular website in the world. Users of Yahoo! Geocities are called as “Geocitizens”
**PROBLEMS FACED BY PORTAL USERS**

1. Users may not be able to handle the technologies behind personal portals.
2. Users find difficulties when using building tools provided.
3. Building and decorating a web page is time-consuming for non-skilled users.
4. Little knowledge about scripting language may lead to limited customization of the web site.
5. Use of copyright materials without permission may not be restricted.

**ANALYSIS AND SOLUTION OF THE PROBLEMS**

1. *Students may not be able to handle the technologies used by personal portals*

   It is known that personal portal are websites where people can post information, give comments, customize layout and upload photos as well as add song and videos. Users just write a paragraph, click a button and it is posted on the Internet. But how the information is processed and stored? Certainly all the technologies involved are complicated, but some basic technologies can be evaluated.

   The most important elements of a personal portal are:
   - Server
   - Database
   - Programming language

   *How the server, database and programming language are related to personal portal?*

   Personal portal is a dynamic server-side web page that is written in programming languages. The web page contents are stored in a database which are merged with a template created with HTML codes or/and programs.

   *How do personal portal works?*

   The web page collects data using form. After the “submit” button is pressed, the browser sends the information from the form to the web server, which passes it on to a scripting language. The script is sent to the server for processing. And the result from the server is usually a pure HTML file delivered to the client computers.
<table>
<thead>
<tr>
<th>Portal publisher</th>
<th>Xanga</th>
<th>Yahoo! Geocities</th>
</tr>
</thead>
<tbody>
<tr>
<td>Scripting language</td>
<td>ASP</td>
<td>PHP</td>
</tr>
<tr>
<td>Database</td>
<td>MS-SQL</td>
<td>MySQL</td>
</tr>
</tbody>
</table>

Xanga and Geocities work with different technologies, both of them have their own advantages and disadvantages. ASP and PHP are languages used to build dynamic web sites that can interact with databases and exchange information.

ASP (Active Server Pages) is from Microsoft and is used with IIS (Internet Information Server) that runs on Microsoft Servers and PHP (Hypertext Preprocessor) is an open-source language that runs in different platforms such as Unix, Linux and Windows. PHP is extremely flexible that can connect to various databases; the most popular is MySQL while ASP mainly uses MS-SQL. If we compare the speed of ASP and PHP then PHP code runs faster than ASP.

**Evaluation:**
As to build a personal portal for student, many aspects should be taken in consideration, such as cost, platform compatibility, speed and database connectivity. PHP is an open-source and multiplatform language, it is faster than ASP and it has more flexibility of database connection. Besides, PHP is widely used by many people because of its simple syntax and it is easy to learn.

**Solution:**
Students may not find interesting to learn about programming language and database. However, through practices could be a way to solve the problem. If we set up a database with PHP as the programming language and with the orientation of teachers, students may have a chance to learn how to manage the web site and to create a server-side web page. An IT group can be created with a small group of students responsible for the maintenance and proper function of the school personal portal.

2. **Users find difficulties when using building tools provided.**

People may find building tools difficult and frustrating to manage, Xanga and Geocities has provided different tools for computed-skilled users and non-skilled as well. Each tool has provided detailed instructions about it function and usage. If the information is still not completed, users can make a feedback through FAQ’s section where professional technician will try to solve your problems. It is just a matter of time to familiarize with the tools provided.
◆ Blog tools

Blog tools are tools that create and manage entries posted by a user. Some tools and accessories require only the basic knowledge of using a web browser, while other tools need some knowledge of configuring web scripts, uploading files, and HTML coding. The following are examples of blog tools:

Yahoo! Geocities

HTML codes are ASCII-based and they can be edited by this editor. However, user should have some knowledge of HTML coding.

**Evaluation:**

This tool is easy to use but somehow I found it difficult to manage, for example it is difficult to locate my post into different positions of the page and there are not options to keep my post neither public nor private. The table maker is a pop up window, which is not attractive at all. I do not think that student would want to use this type of tools, which is too simple, and some of the function may require further knowledge of HTML codes.
Xanga
Weblog editor is used to post blogs, HTML codes can be added in “Edit HTML” option.

**Evaluation & Solution:**
This tool is quite useful and convenient because besides of posting blogs in text form, users can add picture, music and even video into the post by just clicking two or three options. Using the tool bar, which is simple and similar to the tool bar of Microsoft Word, student may find it familiar and easy to use.

3. **Building and decorating a web page is time-consuming for non-skilled users**

   ◆ **Page Builder tools**

Page Builder tools are programs that allow people with no html programming knowledge to create a website, using nothing but their browser.

Xanga
**Setup Wizard** is used for an easy, fast and simple customization of the portal. Users can change, edit or choose their profile (e.g. personal information), and the design of the website for example adding a title, selecting a font for the site and choosing a templates from different examples provided by Xanga.

Yahoo! Geocities
**PageWizards** is a free web page building program that is fast and easy to use. In between of few minutes users can create a web page. It offers templates that will take users step-by-step through the process of adding text and images to create web pages.
**Evaluation:**
Both tools offer fixed customization to users so it is convenient for those who do not know how to customize and decorate web pages. Geocities PageWizard offer attractive templates, libraries of clipart, photos, background and add-ons while Xanga Setup Wizard does not. PageWizard is more flexible and interactive.

**Solution:**
PageWizards will serve as a guide for those students that have no knowledge about building a personal portal; also it is simple, attractive and provides enough options to create a basic web page.

**Yahoo! Geocities**

**PageBuilder** provided by Yahoo!
Geocities, is a web-based site building tool that runs in web browsers capable of supporting JavaScript. With a point-and-click interface, it makes easier the creation of a full-featured web site. It allows users to customize their content and design, and enhance their pages with add-ons like a guestbook or calendar.

**Evaluation & Solution:**
The PageBuilder functions are similar to Microsoft FrontPage. Students may add, edit or customize the webpage by few clicks. It is very convenient since it’s based on WYSIWYG platform. However, to create such a platform a wide knowledge of programming need to be considered. As a student, I am not able to handle it therefore I would not include this tool in the proposal.
4. **Little knowledge about scripting language may lead to limited customization of the web site**

Xanga provides an advanced design option which is called “Look & Feel”. This section has more customizable features and users can create their own design. Some of the section may require basic knowledge scripting languages.

Users can customize the following features provided:
- Page width and alignment
- Header
- Text and links
- Background
- Music
- JavaScript module: in this area users can add JavaScript codes

For advanced design, user can create their own Xanga skin by adding codes to the skin editor.

**Evaluation:**

When users make changes, each option has a preview so that users can see how text or background will be shown. For some section of the “Look & Feel” and the skin editor, users need to know scripting languages such as JavaScript and HTML codes.

**Solution:**

For those who do not know scripting language is not a problem, because there are many tools that do not need the use of scripting language such as the PageWizard mentioned before. Besides, instructions, examples or tutorials of scripting languages can be provided through out the section.
5. **Addition of copyright materials without permission may not be restricted.**

Some upload services provided may encourage users to upload copyright materials without permission, since it is free, the disk space is large and the transmission speed is fast, user can then upload whatever they want in a few minutes.

**Xanga**
- Photos manager stores all the photos users have uploaded using Xanga Image Hosting. Users also can edit the size of the image and add a caption to the picture. The total disk space storage is 1GB for image hosting with a limit of 100MB uploads per month.
- Audio manager stores all audio files users have upload using Xanga uploader. It accepts .mp3, .wav, .wma as audio file format.
- Video manager stores all videos users have uploaded to Xanga. Video format valid are .asf, .avi, .dv, .flv, .mov, .mp4, .mpeg, .mpeg4, .qt, .wmv.

**Evaluation:**
People who want a song/video to be posted do not need to look for a URL of it, they can just upload it and play it in the site, and comments can be added.

**Solution:**
Even though the tool is very convenient but this encourages people uploading copyright materials without permission. It is illegal and student should be prevented from this. As a solution, song or video should be limited by its duration, e.g. each portal will be able to upload a song of about 30 seconds of duration.

**Yahoo! Geocities**
- Blog manager users can post a new blog entry, review and existing entries, change blog settings (such as blog title and description), view your public blog and change templates.
- File manager is a web-based tool that allows users to see all of the files in their web site (web pages, documents, images, and so on) and to create, edit, copy, rename, and delete HTML and other files. In the File Manager users can access Yahoo! editors, upload files using Easy Upload and locate disk space usage information.
**Evaluation:**
Both managers are interactive and easy to use. It is convenient when a user has more than one web page. But since each student can have only one portal per account, this tool will not be included.

◆ **Summary table**

<table>
<thead>
<tr>
<th>Features/technologies</th>
<th>XANGA (free version)</th>
<th>YAHOO! GEOCITIES (free version)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Programming language</td>
<td>ASP.NET</td>
<td>PHP</td>
</tr>
<tr>
<td>Database</td>
<td>MS-SQL</td>
<td>MySQL</td>
</tr>
<tr>
<td>Page building tools provided</td>
<td>JavaScript module</td>
<td>Page builder</td>
</tr>
<tr>
<td></td>
<td>Setup wizard</td>
<td>Page wizard</td>
</tr>
<tr>
<td>Blog tools provided</td>
<td>Rich text editor</td>
<td>Rich text editor</td>
</tr>
<tr>
<td></td>
<td>HTML editor</td>
<td>HTML editor</td>
</tr>
<tr>
<td></td>
<td>Weblog editor</td>
<td></td>
</tr>
<tr>
<td>Database tools provided</td>
<td>None</td>
<td>Perl, PHP, MySQL</td>
</tr>
<tr>
<td>WYSIWUG post editing</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Site visitor statistics</td>
<td>No Available</td>
<td>Available</td>
</tr>
<tr>
<td>Disk storage</td>
<td>1 GB</td>
<td>15 MB</td>
</tr>
<tr>
<td>Space for Image hosting</td>
<td>1 GB</td>
<td>5 MB</td>
</tr>
<tr>
<td>Max Upload File Size</td>
<td>100 MB per month</td>
<td>5 MB each time</td>
</tr>
<tr>
<td>Upload tools provided</td>
<td>Xanga uploader</td>
<td>Easy upload</td>
</tr>
<tr>
<td>Email account provided</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Advertisement supported</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Add-ons provided</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Availability of RSS service</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Payable version</td>
<td>Premium version: $4/month, $6/15months, $25/12months</td>
<td>Plus version: $4.95/month Pro version: $8.95/month</td>
</tr>
</tbody>
</table>

* Table showing main features of two personal portal publishers.*
Our school is going to set up a personal portal for students. The personal portal will include the features and technologies evaluated as well as multimedia materials and interactive features. Then, students can design their own student personal portal through the customization services provided by the school portal.

The following table is the summary of the elements evaluated from the two personal portals:

<table>
<thead>
<tr>
<th>Features and technologies evaluated</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Blog tool</strong></td>
</tr>
<tr>
<td><strong>Page builder</strong></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td><strong>Programming language</strong></td>
</tr>
<tr>
<td><strong>Database</strong></td>
</tr>
</tbody>
</table>

**DESIGN OF THE WEBSITE**

The next step is to design the layout of the web site. A web site should be easy to read, to navigate and to find. Multimedia materials and interactive features are included so as to create an attractive and interactive web site. To accomplish these tags we have to evaluate the following web design rules:

- **The use of colour scheme.** The colour tone and colour arrangement should fit the purpose of the site
- **Use appropriate multimedia elements** to enrich presentation such as text, graphics, animation, audio and video
- **Consistency and coherence** throughout the site is important, all graphic images and elements, typefaces, headings, and footers should remain consistent throughout the site.
- **Use meaningful contextual hyperlinks** rather than to insert URLs directly to web pages.
- **Group information into tables or list.** With the use of tables, web pages layouts look more or less the same in different browsers and at different screen resolutions
- **The use of tables rather than frames.** Table is an important web design feature in creating page layout. Text graphics can be placed in different table cells for stylish design.
➢ **Use of navigation bar** for easy navigation such as buttons or tabs. It is more important that the navigational buttons and tabs are clearly labelled, easy to read and understand than to have "flashy" effects.

➢ **Date-stamp web pages** so that surfers know when they were last updated.

➢ **Loading time.** Since a number of people are still using 56Kbps Internet access, the size of multimedia files in web pages needs to be kept as small as possible to reduce the downloading time.

➢ **Providing feedback channel to enhance interactivity** such as e-mail, guest books, discussion forums, fill-out forms, etc.

➢ **Make use of the full browser window** so that people with monitors of all sizes can make the most out of their screen real estate.

➢ **Use of functional elements** such as flash movie and JavaScript. Not every visitor wants or has the ability to download and use all scripts and plug-ins.

◆ **Interface design**

The following is a draft layout of the main page that is user-friendly which can be provided to the user with the aid of buttons, animations, graphics, texts and audio.

◆ **File arrangement of the web site:**

A web site usually contains numerous files types that may include image, audio, animation and video files. Therefore it is important to organize them properly. I put files of the same type into the same folders or directories. The following is an example of how I grouped different files into separates folders:
After searching and studying the main page of different schools I have a make a summary of the most relevant information that should be displayed in the main page of my school web site. I have divided the information into different categories:

- **About SEK** contains the welcome message, history, mission and objectives, rules, facilities, campus map, school song, calendar, etc.
- **People** contains the principal, staff, prefects and classes information
- **Activity** contains extracurricular activities, schools trips, events, social work, etc.
- **Welfare** contains the downloadable materials such as parent’s letters.
- **Gallery** is divided into photos and videos.
- **News and events** is arranged by year
- **Portal** contains the school personal portal and forum.
- **Sitemap** list all the web pages of the web site.
- **Contact us** is a feedback channel
- **FAQs** is the section for Frequently Asked Questions
The following is the system flowchart of the main page of my website.
The personal portal provides content and services customized for students. Each student has an own account and password to access their own personal portal. Fill in form is provided to those students who have not created an account. When the account is created, student can start to build their portal; either using the PageBuilder or editing the portal directly.

The flowchart of the personal portal is shown below:
Security

It is always important to backup your files. It will be a tragedy if the files are lost somehow. So, I save the files in different locations:

1. The school’s h:\ drive:
The school has provided us with an account which each is equipped with an h:\ drive. To access the account, a password is needed. The account can be accessed through the Internet, so that I can download and upload information to the account with any computer with Internet access.
2. **School’s intranet:**

Each student in the school is provided with an intranet account which files can be saved. To access the account, a password is also needed.

3. **Flash disk**

Last, I save the files in my USB flash memory so that even if the internet is down, I can still open my files and work on it.

◆ **Hardware to be used**

Since I have made most of the project at home, I am going to present some features of my two computers.

<table>
<thead>
<tr>
<th>Computer setup</th>
<th>Samsung X05 PC Notebook</th>
<th>Dimension™ C521</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Brand</strong></td>
<td>Samsung X05 PC Notebook</td>
<td>Dimension™ C521</td>
</tr>
<tr>
<td><strong>Picture</strong></td>
<td><img src="image1.jpg" alt="Samsung X05 PC Notebook" /></td>
<td><img src="image2.jpg" alt="Dimension™ C521" /></td>
</tr>
<tr>
<td><strong>Processor</strong></td>
<td>Intel Pentium M 1.5 GHz</td>
<td>AMD Athlon™ 64 processor 3200+</td>
</tr>
<tr>
<td><strong>Operating system</strong></td>
<td>Genuine Windows® XP Home</td>
<td>Genuine Windows® XP Home</td>
</tr>
<tr>
<td><strong>Memory</strong></td>
<td>512 MB (DDR SDRAM)</td>
<td>512MB Memory (DDR2 SDRAM)</td>
</tr>
<tr>
<td><strong>Hard drive</strong></td>
<td>40 GB</td>
<td>80GB*Ultra ATA (7200RPM)</td>
</tr>
<tr>
<td><strong>CD/DVD</strong></td>
<td>24x CD-RW/DVD-ROM</td>
<td>48X CD-RW/DVD Combo Drive</td>
</tr>
<tr>
<td><strong>Network type</strong></td>
<td>Integrated 10/100 Network Card. Integrated Wireless LAN</td>
<td>Integrated Network Card</td>
</tr>
</tbody>
</table>
Both computers have large memory space and the overall speed is fast but my choice is Samsung X05 Notebook because it is portable so I can use it anywhere. The project will not occupy a lot of space so that the memory space is not so important.

**Flash memory disk**

<table>
<thead>
<tr>
<th>Creative MuVo™ TX FM</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Features:</strong></td>
</tr>
<tr>
<td>1. 256MB of flash memory</td>
</tr>
<tr>
<td>2. Super fast USB 2.0 interface</td>
</tr>
<tr>
<td>3. Integrated voice recorder with built-in microphone</td>
</tr>
<tr>
<td>4. Stores data files such as photos and presentations</td>
</tr>
</tbody>
</table>

Even though this is an mp3 player, I have used it as a flash memory disk. Thus, I can easily transfer my files to other computers. Transfer speed is fast and no software should be installed to add or delete file from the player.

**Digital camera**

<table>
<thead>
<tr>
<th>Kodak EasyShare CX6330</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Features:</strong></td>
</tr>
<tr>
<td>1. 3.1-megapixel CCD delivering images as large as 2,032 x 1,524 pixels.</td>
</tr>
<tr>
<td>2. 16MB internal memory.</td>
</tr>
<tr>
<td>3. SD/MMC card storage (256MB)</td>
</tr>
<tr>
<td>4. Kodak EasyShare software included</td>
</tr>
<tr>
<td>5. USB cable for connection to a computer</td>
</tr>
<tr>
<td>6. Movie mode with sound.</td>
</tr>
</tbody>
</table>

The camera is used to take pictures and videos. The file sizes of the image and video are quite large, they are compressed later for processing.
◆ Software to be used
The choice of software is very important, so that we can make good use of the tools and features and it saves a lot of time as well.

<table>
<thead>
<tr>
<th>Web Authoring software</th>
</tr>
</thead>
<tbody>
<tr>
<td>Moremotion Web Express 3 version 3.3</td>
</tr>
</tbody>
</table>

Web express 3 is open-source with interface of WYSIWYG design. Web pages can be designed without a need to hand code HTML, and they are displayed in a browser exactly as they appear in the design area.

**Opinion:** Since it is free, it is very popular among users. I used this software at the fist beginning and I find it very simple and easy to use, but by the time that I wanted to add more complicated scripts I could not know how to. It seems to have a very thorough help and does not clearly explain the instructions.

**Screenshot**

<table>
<thead>
<tr>
<th>Nvu version 1.0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nvu is a freeware made by Linspire. Its cross-platform architecture makes it available on a wide variety of other platforms.</td>
</tr>
</tbody>
</table>

**Opinion:** This software is recommended by my IT teachers because its good and customizable interface, multiple wizards, CSS, XML, DTD, PHP, JavaScript support and it is very easy to use. Best of all, it's a free product and works on all operation system. But still, it is not the ideal platform to design complex web sites.
FrontPage is licensed software where users can create pages with a normal WYSIWYG view or write code in HTML view. Users can compose web pages readily as if using a word processor. FrontPage does not provide a trial version.

**Opinions:** FrontPage is a great tool to get started and its familiar interface will certainly save me a lot of time. However, FrontPage writes messy codes which are very difficult to understand and to deal with.
Macromedia Dreamweaver 8/MX

Dreamweaver is an integrated platform for creating, building and managing a web site. It is winning great popularity among web creators as it supports the highly flexible design of page layout with relatively optimized HTML codes. Provided by 30 days trial which can be download it from [www.macromedia.com](http://www.macromedia.com)

**Opinion:** It is the best tools between all the mentioned before. Since my school is using this software, it would be better for me to work with the same platform so that in case of any problems, my teachers will be able to explain it to me in the school.

<table>
<thead>
<tr>
<th>Features:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Used for typing markup languages</td>
</tr>
<tr>
<td>Easy to read presentation of all HTML data</td>
</tr>
<tr>
<td>Easy to use graphical front-end</td>
</tr>
<tr>
<td>No complex button bar for functions</td>
</tr>
<tr>
<td>Low memory foot print</td>
</tr>
<tr>
<td>Universal application for all versions of Windows</td>
</tr>
<tr>
<td>Small application size and simple installation</td>
</tr>
<tr>
<td>Compatible with HTML1, HTML2, HTML3, HTML4</td>
</tr>
</tbody>
</table>
### Microsoft word 2003

<table>
<thead>
<tr>
<th><strong>Output File Format:</strong></th>
<th>DOC. files</th>
</tr>
</thead>
</table>

**Features:**
- More complex and more functions
- Allow users to change text size, style, font, color.
- Equipped with spell check function
- Allow editions with graphics.
- Organize texts in aids of simple markup codes

### Image editing software

#### Windows Paintbrush

<table>
<thead>
<tr>
<th><strong>Output File Format:</strong></th>
<th>BMP, JPEG, GIF, PNG and TIFF</th>
</tr>
</thead>
</table>

**Features:**
- Used to create and edit graphics data
- High file compressing option
- Easy and simple applications
- Loading time is fast
- Difficult to edit size of the images

### Microsoft Office Picture Manager

<table>
<thead>
<tr>
<th><strong>Output File Format:</strong></th>
<th>BMP, JPEG, GIF, PNG and TIFF</th>
</tr>
</thead>
</table>

**Features:**
- Used for compressing image size
- Easy and simple applications
- Easy to edit size of images
- Cannot add elements to the image

![Screenshot](image.png)
### Ulead PhotoImpact 8.0

**Features:**
- Used to create and add effect on images
- Free Digital Photography Guide
- Video Tutorial on Getting Started
- Manage photo, video and sound files
- Advanced image adjustment controls
- Equipped with graphical EasyPalettes with numerous examples of pictures
- Component Designer Wizard which aides the user to design Web components, e.g. banners, buttons, etc.

**Output File Format:**
- BMP, JPEG, GIF, PNG and TIFF

### Video and audio editing software

**Microsoft Window Movie Maker**

**Features:**
- Used for audio and video editing
- Simple applications
- It is free, comes with Microsoft Windows.

**Output File Format:**
- wma, mp3, mpeg files
## CyberLink Powerdirector 3.0

### Output File Format:
Mpeg-1 files

### Features:
- Enhance camcorder videos and produce professional home movies
- Great for both advanced or entry-level video editors
- Video editing features such as cuts, trim, clips and sound adding
- Audio editing is included
- Advanced video adjustment controls

## Others applications

### Macromedia Flash MX

### Output File Format:
SWF files

### Features:
- Allows designers and developers to integrate video, text, audio, and graphics into a stunning, sensory experience
- Simplify common timeline and scripting tasks with new Timeline Effects and behaviours
- Reduce the need to script simple tasks such as media and navigation controls by using behaviours
**Microsoft Power point 2003**

**Output File Format:**
- pdf. files

**Features:**
- Create dynamic presentations using graphics capabilities in a streamlined user interface.
- Good results with a redesigned user interface.
- Create powerful, dynamic SmartArt diagrams

**IMPLEMENTATION**

**Interface**
- The screen resolution is set to 1024x768 pixels, which is the most common screen resolution used.
- Fixed page width is used so that the page layout is independent of the size of the browser window.
- Two set of solid background colour is used for two different parts of the website.

<table>
<thead>
<tr>
<th>Personal Portal</th>
<th>Main page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beige background with dark red for contrasting</td>
<td>Solid light green as background colour</td>
</tr>
</tbody>
</table>

---

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Table and nested tables are used throughout the website. Even though CSS technology is very popular among layout designs, I did not rely on it, because I am not familiar with it. But after reading and learning more about CSS I made an example design with CSS.

Example 3 design layout using CSS

Navigation bar is placed on the left of the web page as most websites put their menu on the left.

Support of my design

I have set the screen resolution to 1024x768 because according to the table below, there are more users using a screen size of 1024x768 pixels or more.

<table>
<thead>
<tr>
<th></th>
<th>2006 Higher</th>
<th>1024x768</th>
<th>800x600</th>
<th>640x480</th>
<th>Unknown</th>
</tr>
</thead>
<tbody>
<tr>
<td>July</td>
<td>19%</td>
<td>58%</td>
<td>17%</td>
<td>0%</td>
<td>6%</td>
</tr>
<tr>
<td>January</td>
<td>17%</td>
<td>57%</td>
<td>20%</td>
<td>0%</td>
<td>6%</td>
</tr>
</tbody>
</table>

*The statistics above are extracted from W3Schools' log-files

To produce attractive web site, the colour tone and colour arrangement should fit the purpose of the site. It is desirable to create HTML text, background images, and the text in graphic images with the highest possible contrast. Solid colours that contrast strongly with text colours are really the only way to ensure legibility.

The popular solution available for beginner designers to lay out a webpage is by using tables. Many web templates in Dreamweaver and other WYSIWYG editors still use this technique today. However, for designers who are used to table-based layouts, developing websites in CSS often becomes a matter of trying to replicate what can be done with tables, leading some to find CSS design rather troublesome due.
to lack of familiarity. For example, it is rather difficult to produce vertical positioning, and full-length footers in a design using absolute positions.

In the homepage, there should be a navigation bar showing all the topics about the theme. Hyperlinks are used to bring users to other related web pages, within or outside your web site. A clear content design for each web page of a web enhances surfer’s browsing.

◆ Data collection and processing

1. Text:
Text data was collected from other related websites and book. Some basic points were thought and typed into Microsoft word.

1. Select the information that you want to copy
2. Right click and select “Copy” or just press “Ctrl+c”
3. Open a new page in Microsoft word
4. Right click and select “Paste” or just press “Ctrl+v”
2. **Graphics**

Graphics, images and photos are collected from:

a. **The internet**

1. Right click in the picture and click **“Save picture As”**
2. Save the file into a folder. The name should be short, meaningful and without white spaces.

b. **Taking photo with a digital camera**

1. The digital camera is connected to the computer.
2. The pictures are transferred and saved in a folder.
3. **Animation**

Useful animation such as GIF or SWF files, are collected from:

**a. Free animation sites:**

The following web site URL is www.friendster-tweakers.com

1. Right click in the animation selected
2. Click “Save picture as”
3. Save the GIF animation into a separated folder for animation only.

Some free animation sites provide a code to embed the animation into the web page. The following is an example:

```html
```

The code should be copied and pasted in between `<BODY>` of the HTML section of the web page. But it is not desirable to embed it because if the site provider is not working, the animation will not work as well.
b. Some animations are made by Macromedia Flash MX

This is an example of a simple banner

1. A new flash file is opened
2. The file is saved into a folder of animations only
3. The dimensions of the banner is set to 468px (width) x 60px (height)
4. Images is added to the banner
5. A keyframe is inserted at the timeline number 20
6. A new layer called “layer1” is created
7. In layer1 timeline, step 4 is repeated
8. SEK in yellow colour is typed on the banner at time 0
9. A keyframe is inserted at time 10 in layer1
10. SEK in purple colour is typed in the banner at time 10
11. In properties, the option “Motion” is chosen
12. Now the word “SEK” will move from one side to another and changing its color at the same time
13. The flash movie is tested and saved as swf format.
4. **Video**

Video and animations can provide a much better learning instruction than texts as sometimes the instructions are difficult to be described in texts.

I took video with the help of a digital camera and video editing software to edit and add elements to it.

1. My digital camera is connected to the computer
2. The video file is transferred to the computer.
3. The video file is opened with Cyberlink PowerDirector
4. Transition effects, titles, voice, and music are added to the video.
5. Audio

Due to the problem of using copyright materials without permission, the selection of audio is quite sensitive. I have collected audio from:

a. **Free music downloads websites**

Some websites offers free music. Some are very old and some are short part of a song.

![Free mp3 music can be downloaded from www.mp3.com](image)

b. **From my music CDs.**

Since music CD’s song are copyrighted materials. However, it is permitted to publish a short section of the song. That is why I cut the song duration using Microsoft Movie Maker.

![A song is copied from a CD music](image)

| 1. A song is copied from a CD music |
| 2. The song is loaded into Microsoft Window Maker |
| 3. The song is cut to 30 seconds |
| 4. The edited song is saved as mp3 file. |
Finally, all collected data, graphic, animation, video and audio were sorted, matched and organized into different categories. Useful information was entered into the web pages according to their contents and format.

◆ **Input Data**

1. **Text**

   - Text is set to Arial, Helvetica, sans-serif; size 12px.
   - Headings are set to 16 or 14px depending on the contents.
   - Main text are aligned to the left in paragraph of about 40 to 60 characters per line
   - Hyperlinks are set with different colours to normal text. They are underlined as well.

**Support of my design**

- Arial and Time New Roman fonts are the most legible typefaces. Italicized, oblique, cursive or condensed fonts which are more difficult to read than standard typefaces. Typefaces and style chosen should be cohesive and readable.

- Use suitable font size according to the contents. Tiny letters are hard to read. However, too large or capitalized letters gives the appearance of shouting at the visitors.

- Main text should be aligned to the left, not centered. Center-aligned text is best used in headlines

- Text links should be unique and underlined; they should not look the same as any other text in your web pages. So that users will know which one is a hyperlink and which is normal text. Link colours in your text should be familiar to your visitor e.g.: blue text usually indicates an unvisited link and purple or maroon text usually indicates a visited link.
Example:

Different colour of text is used so as to make contrast with different colour of backgrounds.

The size of this section is 14px.

Different typefaces is used depending on the contents.

Hyperlinks are underlined and their colours are different from normal text.

2. Graphics

Graphics are always essential for websites. They give people a more understanding picture of the texts. They also make the design more attractive.

- Images and graphics are saved as JPEG files because of its small file size and it supports true colour graphics. BMP is not used as the file size is very large.
- Each image is given a description name, so that people accessing the page in a non-graphic way can still understand what is important or
relevant about the image.

- The size of each image is adjusted according to their content

The following example is the background layout of a web page. It is created with Ulead PhotoImpact 8.0 and the output layout is saved as a JPEG

1. A new image is created of size 600x440 pixels.
2. A gray background colour is chosen.
3. The car image is opened
4. By using the standard selection tool, I set the soft edge to 100 and part of the image is selected
5. The image selected is dragged and dropped in the new image created in step 1.
6. A rectangular box is created using the path drawing tool
7. Another car image is opened
8. By using the lasso tool, I have selected the edge of the car.
9. The image selected is dragged and dropped to the background image.

Example:
10. Other images are added in the same way
11. The background image is saved as JPEG file in a folder

In this case, I have used Microsoft Office Picture Manager instead of Paint because it is easier to resize and cut the image. However, the result is the same, the image is highly compressed.
Input graphic data into Dreamweaver

There are 3 ways to do it:

1. Click Insert/Image or press “Ctrl+alt+l”. Select the image and click OK

2. Drag and drop the image file from the file management tree.

3. Insert the tag `<img src="location of the image"/>` into the HTML code

3. Animations

Animation is one of the major ingredients of multimedia presentations. Animation makes web pages more vivid and attractive. Different animation file formats are suitable for different situations.

- Animated GIFs are very easy to create and therefore suitable for user to build simple buttons in web pages.
- Flash movie are especially suitable for presenting sophisticated animations on the web owing to its small file size, multimedia and interactivity support. Flash files can be resized without any loss of quality

Supports of my design

Animation are used to:

- Draw the audience's attention or alert people to new information.
- Indicate the function of a hot spot.
- Draw attention to changes from one state to another
- Demonstrate navigation in a particular direction.
Create icons for actions that cannot be adequately expressed with a flat, static picture.

Permanently moving (looping) animations should rarely be included on a Web page because they make it hard for users to concentrate on the page content. Research suggests that movement in our peripheral vision can dominate our attention.

1) These are animated GIFs download it from www.friendster-tweakers.com

The banner is made with Macromedia Flash MX.

Examples

2) These are flash buttons created by free flash maker sites. URL: www.buttongenerator.com

This is an embedded flash slideshow offered by www.picturetrail.com

This is an animated GIF downloaded from www.smileycentral.com
Personal Portals

3) These are free flash games provided by www.pyzam.com

4) These are animated GIFs with glitter effects.
URL: www.myspacescripts.com

This is a flash slideshow provided by www.photobucket.com

This is a flash clock downloaded from www.clocklink.com

Input animation into Dreamweaver

The input animated GIFs into Dreamweaver is the same as the input of graphical images, the only difference is the extension of the file, animated GIFs are .gif files while graphical data are jpeg or png files.

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The following show how to input flash movies into Dreamweaver

1. Click Insert/Media/Shockwave or press “Ctrl+Alt+d”. Select the flash movie and click OK.

2. Drag and drop the flash movie from the

3. Insert the code of the flash movie directly into the HTML code of the page.

4. **Audio**

   Audio mainly is used in this project as a decorative effect.
   - Volume and mute control is provided
   - Provide plug-in download for users
   - Audio file size is small since the song duration is reduced.
   - Audio are saved as mp3 files.

**Support of my design**

- It is not desirable to play background music that the user can't control because user may find the music disturbing.
- Copy the audio file on the server rather than link it to a file on another server. Not only will this avoid the possibility that your sound suddenly disappears, it saves servers being overloaded.
- MP3 is high compressing audio encoding and apart from Windows Media Player, MP3 files can be played using MPlayer, Winamp, RealPlayer, and many other media players.
Input song into Dreamweaver
There are 3 ways to input a song file into Dreamweaver

1. Click Insert/Media/Shockwave.
   Select the audio file and click OK

2. Insert the tag
   `<embed src="location of the audio file"/>` into
   the HTML code of the

3. Drag and drop the audio
   file into the page directly

◆ Other multimedia and interactive elements

   Animated cursor
   A cursor is a moving marker or pointer that indicates a position. A cursor can be
   colorful and animated to make the web page more attractive and unique. I have
   used three different cursors which are downloaded from www.cursormania.com.
   The examples are the following:

   This cursor is used in the Main page

   This cursor is used in “example 2” of the personal portal

   This cursor is used in “example 3” of the personal portal

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Some free animated cursor sites provide a code to embed the animated cursor into the web page. For example:

```html
<style type="text/css">
  body {cursor: url(http://plugin.smileycentral.com/http%253A%252F%252Fplugin%252Esmileycentral%252Ecom%252Fassetserver%252Fcursor%252Ehtml%252Fimage.\gif", !important; }
</style>
```

The code should be copied and pasted between the `<HEAD>` section of an HTML document, for example:

```html
<HEAD>
  <style type="text/css">
  body {cursor: url(http://plugin.smileycentral.com/http%253A%252F%252Fplugin%252Esmileycentral%252Ecom%252Fassetserver%252Fcursor%252Ehtml%252Fimage.\gif", !important; }
  </style>
</HEAD>
```

Another way to embed the code in the web page is to copy and paste the code in the body attribute of a separated cascade style sheet (CSS). For example:

```html
/* CSS Document */
body {cursor: url(http://plugin.smileycentral.com/http%253A%252F%252Fplugin%252Esmileycentral%252Ecom%252Fassetserver%252Fcursor%252Ehtml%252Fimage.\gif");}
```

The style sheet is saved with a .css extension and the tag `<link rel="stylesheet" type="text/css" href="location of the stylesheet" />` is embedded in between `<head>` of the HTML section of the web page. This way is better because it can simplify the HTML markup of the web page.

- **JavaScript and CSS**

  Traditionally, JavaScript has been the domain of programmers while CSS was for designer. In other words, JavaScript provide the behaviour functionality while CSS the look and feel of a web page.

  I can create an attractive and colourful web page just using HTML. But without some scripting languages, the page will not responsive to user actions. The most widely used scripting language is JavaScript.

  JavaScript is a client-side scripting language developed by Sun Microsystems, which is designed to create small and efficient applications such as animated...
Personal Portals

graphics, scrolling messages, calendars and banners. JavaScript add interactivity to web pages and it is embedded in the HTML codes.

I find very interesting to use JavaScript in my website, even though it is not required to use it. Thanks to the many cut-and-paste JavaScript web sites, I could add JavaScript functions without any concept of how they work. But if I want to go beyond cut-and-paste to create my own cool effects, I need to understand JavaScript.

The following are examples of simple JavaScript complements:

This is a calendar written in JavaScript. I found this code in http://javascript.internet.com

This is the most common type of form validation. The JavaScript code inserted will perform a basic check to see if a given HTML input is correct and not empty.

Cascading Style Sheets (CSS) is a style sheet language used by the designer to define colours, fonts, layout, background styles, element alignments, borders, sizes, spacing and many other typographic characteristics.

CSS style information can be either attached as a separate document or embedded in the HTML document. The attachment of CSS in separate document can improve content accessibility, provide more flexibility and control in the specification of presentational characteristics, and reduce complexity and repetition in the structural content.
The following is an example of a CSS style sheet used in my web site:

```css
.normal {
  font-family: Arial, Helvetica, sans-serif;
  font-size: 12px;
  color: #000000;
}

.head {
  font-family: Arial, Helvetica, sans-serif;
  color: #FFFFFF;
  font-weight: bold;
  font-size: 10px;
}

date {
  font-family: Arial, Helvetica, sans-serif;
  color: #006600;
  font-weight: normal;
}

.frame {
  position: absolute;
  left: 705px;
  top: 310px;
  width: 63px;
  height: 57px;
  z-index: 1;
}

.navJump { font-family: Arial; font-size: 10pt; color: #0000ff; text-decoration: none; }

a.navJump { color: #0000ff; }

a:visited.navJump { color: #0000ff; }

a:active.navJump { text-decoration: none; color: #9900ff; }

a:hover.navJump { text-decoration: none; color: #9900ff; }
```

This is a specific font typeface with an attribute name given. Any text assigned to this name will follow the characteristics chosen.

This control the position, margin and size of a specific layer.

This assigns the color and font typeface of specific hyperlinks.

The CSS style sheet above can be used in several web pages, so that it would facilitate the consistence throughout the website. To embed the CSS documents the tag `<link rel="stylesheet" type="text/css" href="location of the stylesheet"/>` should be inserted between `<HEAD>` of the HTML documents.

But JavaScript and CSS technologies can and should work together to improve users’ experiences. After all, we can do amazing things with CSS, but when we start to use CSS in concert with JavaScript, there is almost no limit to what we can achieve. For example:
1) This is a mixture of JavaScript and CSS widget that displays pop-up box with notes (also known as tooltips or hints) when you click in any note of the notice board. The script is downloaded from www.softcomplex.com.

2) The following example is part of a webpage of the personal portal; the webpage is “example 2”.

By just clicking on the sign, the drop down menu will reveal or hide contents of the webpage. This combination of CSS and JavaScript save valuable spaces. Downloaded from http://javascript.internet.com
2) This is a slideshow written in JavaScript and CSS. Downloaded from www.creatingonline.com

3) This is a colour picker which is written in JavaScript and CSS. Downloaded from www.pagetutor.com

4) Using a combination of CSS and JavaScript, each module can be moved all over the page. The script is downloaded from http://javascript.internet.com
Server-side scripting language
Server-side scripting is a web server technology in which a user's request is fulfilled by running a script directly on the web server to generate dynamic HTML pages.

One of the main applications of server-side scripting languages is the production of server-side dynamic web pages. As a Form 5 student, I have not learned yet how to work with that kind of technologies, but the basic working principle can be studied.

One of the cases which we can make use of the server-side scripting language is when we fill in a form and press the click the submit button, then the data inputted in the form and the form action specified in the <FORM> tag will be sent to the server. The form action tells the server the location of the program that can process the collected.

There are two methods to send the data: get method is used if the form is designed for obtaining information only and post method is used for storing and updating information on the server.

For example:

```html
<form id="form2" method="post" name="form2" action="Signup.html">
  What are you waiting for!<br/>
  <input type="submit" name="Submit2" value="Sign in!" />
</form>
```

This is the form action of a form used in my web site. In a real form, the action should be a file with extension .php or .asp. instead of a link.

Personal information is sent from the form to the server thus post method is used because it is more secure that get method.
Special features

- **Index page**

Since some users are using old browsers which cannot handle advanced features, I have included a **text only version** of the website which contains all of the information but in text format. This feature is also useful for access over low-bandwidth connections.

- **Back to top link**

Different options of **languages** improve the variety of the web page. Users can select their own preference languages.

This **footnote** is to advise users how to view the web page as to avoid problem with the page resolution and browser version.

Back to top link help user navigates very long pages with one mouse click.
Personal Portals

- **Customization**

  This tool lets students choose the background, text, link, visited link or active link colours by clicking on the colour chart.

  Students can change the font and font size as they wish, along with rendering bold and italic. Also, students can choose a background image from the hard drive and have it displayed in the right frame.

  The right frame will preview student choices at the same time they are selecting it.

- **Breadcumb trail**

  The breadcrumb trail is a series of links that represents the current page's location in my webpage. Also, users can click a link to go directly to the corresponding page. For example:

  ![Breadcrumb Trail Example](image-url)

  Begin < Step 1 < Step 2 < Step 3 < Step 4 < Step 5 < Step 6

  Address: 22 Hoi Fan

  SEK> Login > Create your portal ID
Notice board

The notice board makes the site more informative and interactive. Users can click on any notes and a pop up window will appear showing up detailed information. And also it is easy to use while saving valuable space. Students may then be updated with school homework and even in an interactive way.

Mailto link

Mailto link allows users to send email directly from the web page. Users can have it add a subject line, send copies to multiple recipients or even write the entire email message.
Modules customization

Modules customization is user-friendly so that student can arrange each module wherever they like.

Forum

A forum is a facility for holding discussions and posting user generated content. Forum is very useful when student have more than one post to discuss with. Other students may then participate in the discussion as well. Posts remain saved on the forum website for future reading or until deletion by a moderator.

Date-stamp

Date-stamp web pages let surfers know when the web site was last updated.
Output Result

The following is the output result of my web site.

<table>
<thead>
<tr>
<th>Index page</th>
<th>Main page</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image1.png" alt="Index page Image" /></td>
<td><img src="image2.png" alt="Main page Image" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>About SEK</th>
<th>Gallery</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image3.png" alt="About SEK Image" /></td>
<td><img src="image4.png" alt="Gallery Image" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Video gallery</th>
<th>Sitemap</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image5.png" alt="Video gallery Image" /></td>
<td><img src="image6.png" alt="Sitemap Image" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Contact us</th>
<th>SEKSS forum</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image7.png" alt="Contact us Image" /></td>
<td><img src="image8.png" alt="SEKSS forum Image" /></td>
</tr>
</tbody>
</table>
Personal Portals

Personal portal

Sign up fill in form

Forgot password section

Notice board

PageBuilder (step 1)

PageBuilder (step 2)

PageBuilder (step 3 & 4)

PageBuilder (step 5 & 6)

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<table>
<thead>
<tr>
<th>Edit portal section</th>
<th>Edit profile</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image1" alt="Edit portal section" /></td>
<td><img src="image2" alt="Edit profile" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Post blog</th>
<th>Customization section</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image3" alt="Post blog" /></td>
<td><img src="image4" alt="Customization section" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Module customization</th>
<th>Edit photo album</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image5" alt="Module customization" /></td>
<td><img src="image6" alt="Edit photo album" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Script’s corner</th>
<th>Example 1</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image7" alt="Script’s corner" /></td>
<td><img src="image8" alt="Example 1" /></td>
</tr>
<tr>
<td>Example 2 (part I)</td>
<td>Example 2 (part II)</td>
</tr>
<tr>
<td>-------------------</td>
<td>---------------------</td>
</tr>
<tr>
<td><img src="image" alt="Example 2 (part I)" /></td>
<td><img src="image" alt="Example 2 (part II)" /></td>
</tr>
<tr>
<td>Example 3</td>
<td>Under construction</td>
</tr>
<tr>
<td><img src="image" alt="Example 3" /></td>
<td><img src="image" alt="Under construction" /></td>
</tr>
</tbody>
</table>
TESTING AND EVALUATION

Now that I finished my website, I shall test it and detect any clash or error. I will test the text, buttons, links, layout & design, and the effectiveness of the site.

A third person was asked to browse through the website and test every small bit of the website components.

1) Grammar and spelling mistakes were found throughout the site
Since I have pre-typed the texts in Microsoft Words and I spell checked it. But my teacher found some grammar mistakes and spelling mistakes, which were hardly detectable.
As a solution, I went back to the website in Dreamweaver, and I correct the words, which my teacher found mistakes in them.

2) A message in the information bar appears when loading the main page using Internet Explorer.

<table>
<thead>
<tr>
<th>Problem</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image.png" alt="Image of message in information bar" /></td>
</tr>
<tr>
<td>The message says “to help protect your security, Internet Explorer has restricted this webpage from running scripts or ActiveX controls that could access your computer”</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Explanation</th>
</tr>
</thead>
<tbody>
<tr>
<td>The information bar appears because the website tries to run interactive or animated content on the computer. But Internet Explorer restricts these contents because occasionally they can cause malfunction.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Since my website is safe and reliable, allow interactive contents in the computer would not be any problem. Then, “allow blocked content” is selected.</td>
</tr>
</tbody>
</table>
3) **An image could not load** in the index page

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image1.png" alt="Index Page" /></td>
<td>I opened the index page with Dreamweaver to check whether the location of the image is correct and I found that the extension of the image was wrong. Thus, I corrected it to .jpeg extension.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Result</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image2.png" alt="Result" /></td>
<td></td>
</tr>
</tbody>
</table>

4) **Dead links** were found in the main page

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image3.png" alt="Main Page" /></td>
<td>I opened the main page with Dreamweaver to check whether the link is correct and I found that the link was wrong written. Thus, I changed it to <a href="http://www.eng-class.com">www.eng-class.com</a></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Result</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image4.png" alt="Result" /></td>
<td></td>
</tr>
</tbody>
</table>
5) **Too large spaces between tables** were found in the editing portal

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>![Image of table alignment issue]</td>
<td>I opened the page with Dreamweaver to check the alignment of the table and row. I found that the vertical alignment was wrong. I changed the alignment from bottom to top.</td>
</tr>
<tr>
<td>![Image of table alignment correction]</td>
<td></td>
</tr>
</tbody>
</table>

6) **Text size** were found suddenly too large in the script’s corner page

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>![Image of text size issue]</td>
<td>I opened the page with Dreamweaver to check whether the class assigned to the text is correct. I found that the class assigned was wrong. Then, I changed to the correct one.</td>
</tr>
<tr>
<td>![Image of text size correction]</td>
<td></td>
</tr>
</tbody>
</table>
7) **A submit button was not working** in the school personal portal entrance

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image" alt="This button was not working" /></td>
<td>I opened the page with Dreamweaver to check the form action. And I found that nothing was wrong. Then I checked the action of the button in properties and I found that the wrong option was chosen. Then, I changed “none” to “submit form”</td>
</tr>
</tbody>
</table>

**Result**

![Action: Submit form](image)

| ![Action: None](image) | ![Action: Reset form](image) |

8) **Flash elements cannot be loaded** in the main page

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image" alt="The flash element" /></td>
<td>The flash element used in the main page is a flash slideshow services provided by free slideshow website. Therefore, Internet connection is a must. But the third person was connected to the Internet and the flash elements did not load. So the problem could be the version of the Flash player. Then the Flash Player was updated.</td>
</tr>
</tbody>
</table>

**Result**

![Adobe Flash Player version 9 can be downloaded from](image)

[www.adobe.com/shockwave/download](http://www.adobe.com/shockwave/download)
CONCLUSION

I found that one of the most impressive aspects of the Internet is that not only can we browse multimedia information on the web, but we can also create, post and share our own information there. All we need are the contents that we want to publish, web building and uploading software, and Internet access. In the web, everyone with Internet access possesses the power to publish his/her work. So that web building site has to provide very attractive features to those who want to post information in the web.

Besides, building a web site is not an easy task; there are many things that have to be considered such as the colour palette, style and page layout, navigation bar, backgrounds, the use of client-side and server-side processing technologies and the use of suitable multimedia elements such as text, graphic, animation, audio and video. All of these elements are evaluated with one purpose; the web site should fit one’s needs.

◆ Limitation

The main limitation in this project is the lack of software sources. At the beginning, I did not know which kind of web authoring software to use. The one I have tried in the school was Dreamweaverr but the fact is, Dreamweaver software is expensive and working in the school would not be enough time to do the project. As a result I had to try free web authoring tools such as Moremotion Web Express 3 and Nvu which functions are too simple and incomplete. Since they are freeware, many features cannot be used and sometimes it is troublesome and annoying to reject messages telling you to purchase a new version.

Next, I used FrontPage to build my website. At the beginning was fine but after when I had to work in the school with Dreamweaver, incompatibility problems came out. After all, I had no choice that to use the trial version of Dreamweaver MX which gives me 30 days of use. Fortunately, I have two computers at home, so actually I had 60 days of use.

During all this period I wasted a lot of time and effort. I hope that in a future there would be better preparation and orientation from teaches and the EA department to the students for the development of IT projects.
Second main limitation is the **lack of knowledge of scripting programming languages**. To build an attractive and interactive web site, scripting programming languages is needed. Since I have only learned the basic concept of them, I could not manage those languages.

After reading more about scripting languages such as JavaScript and with the help of many tutorials and free example in the Internet, I could make good use of it.

However, the use of JavaScript leads to another problem which is the **differences of web browsers**. Different web browsers accept different rules, hence they displays different results. Even though some JavaScript worked in Internet Explorer 6, it does not mean that it would work in other browsers. But not only JavaScript does not work; table alignment and text sizes were also affected. Here I have some examples:

<table>
<thead>
<tr>
<th>Web browsers</th>
<th>Internet Explorer 7</th>
<th>Mozilla Firefox</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall view</td>
<td><img src="image1.png" alt="Internet Explorer 7" /></td>
<td><img src="image2.png" alt="Mozilla Firefox" /></td>
</tr>
<tr>
<td>Table alignment</td>
<td><img src="image3.png" alt="Internet Explorer 7" /></td>
<td><img src="image4.png" alt="Mozilla Firefox" /></td>
</tr>
</tbody>
</table>
Further development and plans

There are many places that can be improved and further developed. If the launch of the school personal portal is a success, many students would be willing and hoping new ideas, services and features provided by the school portal, for example:

- Provision of more than one personal portal to each student, such as Yahoo! Geocities does. The advantage is that student can make different personal portal based on different topics (e.g. sport, music, hobbies) or subjects (e.g. Chemistry, Physics, Mathematics). Certainly these kinds of arguments can be posted in forum, but the chance of having a post lost in a multitude of other’s students post is very high.

- Teacher can also participate by having a personal portal. Not only will encourage students to participate as well, both students and teachers will enrich their IT knowledge.

- A new web page would be created which students can express their ideas by writing and posting an article in the page. This gives an opportunity to students to become cybernetic journalists. Topic that can be included are: Survey of the best food in HK, best places to go in HK, best seller books, best movie of the time, map and address of all public libraries in HK, public and social activities in HK, etc.
REFERENCE

Information of personal portal publisher
- www.w3school.com
- www.webopedia.com
- www.wikipedia.com
- www.searchsecurity.com
- www.xanga.com
- www.geocities.com
- www.pcmag.com

Web design information
- www.grantasticdesigns.com
- www.firelily.com
- www.pcmag.com
- www.wikipedia.com
- www.saila.com

Hardware and Software information
- www.epinions.com
- www.dell.com
- www.download.com
- www.nvu.com
- www.moremotion.com
- www.frontpage2002.com
- www.macromedia.com

Multimedia Elements
- www.seksswk.edu.hk
- www.myspaceglitter.com
- www.siggiez.com
- www.animationonline.com
- www.gifanimations.com
- www.smileycentral.com
- www.creatingonline.com
- www.friendster-tweakers.com
- www.cooltext.com
- www.Flickr.com
- www.picturetrail.com
- www.photobucket.com
- www.buttongenerator.com
- www.cursormanija.com

**JavaScript**

- www.softcomplex.com
- www.tizag.com
- javascripts.internet.com
- www.javascriptkit.com
- www.guistuff.com