



10 Information and Software Technology

Hardware Website Assessment

Due Dates:

Planning Milestone: 3:30 pm Wednesday 17th September 2014

Final Submission Date: 3:30 Tuesday 14th October 2014

Weighting: 40%

So far in class you have been working through a number of practical activities that help you to understand how to create the basic structure of a website

In this assessment task you will create a website that will provide an overview of various aspects of computer hardware.

This task will be broken down into three separate marking components

1. Project Planning and Evaluation
2. HTML and related coding skills
3. Website Content

Each of these components will take time and a consistent work ethic throughout the project will be important.

As well as two formal submission phases, you will be expected to upload your weekly progress in a zipped folder every Week.



Component 1: Project Planning and Evaluation

Outcomes assessed in this component

- 5.2.1 describes and applies problem-solving processes when creating solutions
- 5.2.2 designs, produces and evaluates appropriate solutions to a range of challenging problems
- 5.2.3 critically analyses decision-making processes in a range of information and software solutions
- 5.5.2 communicates ideas, processes and solutions to a targeted audience

Overview:

The planning phase is an important part of any project. Various planning tools and techniques will be used by you to communicate the intent and scope of your project.

Evaluation of your project is also important. You will initially set goals for your project and evaluate your project against these goals.

To do this you will need to create three documents

1. Project Plan
2. Project Process Journal
3. Project Evaluation

Criteria

Content Completion and Quality

Elementary:

- Has created three separate documents that have content appropriate to the intent of each document

Basic:

- Elementary+
- Each document has formal formatting such as page numbers, heading levels, a title page and table of contents

Sound:

- Basic+
- The content is an appropriate mix of text, images, tables and diagrams to effectively communicate a range of people.

Thorough:

- Sound+
- The text is written in straightforward English, which is precise and to the point.

Extensive:

- A consistently high level of detail is achieved throughout all content areas



Project Plan (5.2.2 & 5.5.2)

The project plan will be used to set goals, establish a list of tasks to be done, to plan out when those tasks should be done and to provide an overview of how the website will look when complete

Criteria:

Elementary:

- State in words, the intent of the project
- Establish some goals for the project

Basic:

- Elementary+
- Decide how you will organise your content and draw this up in a story board (You will need to check the content component details to do this)

Sound:

- Basic+
- Create a task checklist for your website listing all the things you need to do in some sort of order

Thorough:

- Sound+
- Create a Gantt chart of your project. Measure the time in days

Extensive:

- Thorough+
- Throughout the project, keep track of your project's progress by recording completion dates and creating a planned versus actual Gantt chart.



Process Journal (5.2.3)

A process journal is essentially a record of what you have done during the project.

Eg:

20th August 2014 : Development Phase

- Worked on the design of the graphical user interface. Completed the main product category drop down menu. Had difficulty with the secondary menu not updating. Overcame this by re-writing the SQL statement. The basic dropdown element is of good appearance, but could be better spaced as this needs to be used by touch-enabled devices as well as with a mouse.

Elementary:

- Has created a process journal with entries that describe what has been done during the project

Basic:

- Elementary+
- There is at least two entries per week for the duration of the project

Sound:

- Basic+
- There is at least one entry for every lesson for the duration of the project
- A number of the entries outline not just what was done, but any difficulties encountered, screenshots of significant completed design work and any failures experienced

Thorough:

- Sound+
- Continual evaluation appears throughout the process journal.
- Justifications appear for changes made to the project.

Extensive:

- Thorough+
- The process journal demonstrates skills development and evidence of seeking external inspiration.
- Resources located are well documented so that proper ethical practice can be maintained.



Project Evaluation (5.2.2 & 5.2.3)

Strong evaluation occurs throughout the project, but the formal documenting of evaluation should always occur after the project is complete.

Criteria:

Elementary:

- Has created an evaluation document, which analyses the completed project.

Basic:

- Elementary +
- Consideration of the initial project goals is evident within the evaluation

Sound:

- Basic+
- The evaluation is objective and justified

Thorough:

- Sound+
- Future improvements are recommended and justified

Extensive:

- Thorough+
- The evaluation includes the perspective of an external end user



Component 2: HTML and Related Coding Skills

In order to do well on the construction of your website, you will need to have worked through the practical activities. Students who decide to incorporate other features not covered the practical activities will receive a higher grade.

Using a pre-existing template for your website will not be accepted for this assessment task.

Outcomes Assessed:

5.1.1 selects and justifies the application of appropriate software programs to a range of tasks

5.2.2 designs, produces and evaluates appropriate solutions to a range of challenging problems

Criteria:

Elementary:

- Produces a basic website that contains most of the elements demonstrated in the practical activities

Basic:

- Makes good use of all of the HTML and CSS elements demonstrated in the practical activities

Sound:

- Basic+
- Includes one or more of the jquery features demonstrated in the practical activities.

Thorough:

- Sound+
- Makes appropriate use of a new jquery feature NOT already demonstrated in the practical activities.

Extensive:

- Thorough+
- Make use of the HTML5 drag and drop feature to help people who visit your website test their knowledge



Component 3: Website Content

This document lists the content you will be required to include in your website.

The way in which you organize your content is entirely up to you. It will be part of your planning to make decision about what will go where

Outcomes:

- 5.1.2 selects, maintains and appropriately uses hardware for a range of tasks
- 5.3.1 justifies responsible practices and ethical use of information and software technology
- 5.3.2 acquires and manipulates data and information in an ethical manner
- 5.4.1 analyses the effects of past, current and emerging information and software technologies on the individual and society
- 5.5.2 communicates ideas, processes and solutions to a targeted audience

Elementary:

- Describe the IPO model
- Identify and describe 5 input devices
- Identify and describe 5 output devices

Basic:

- Elementary+
- Identify and describe three storage device
 - Discuss the storage concepts of ROM, RAM, primary and secondary storage, volatile and non-volatile storage
- Identify and describe two processing devices
- Include images where possible

Sound:

- Basic+
- In terms of the internal workings of a computer, define and describe the functioning of the following hardware:
 - motherboard
 - central processing unit (CPU)
 - coprocessor chips
 - memory: random access memory (RAM), read only memory (ROM)
 - hard disk
 - controller cards
 - graphics adapter cards
 - power supply
 - expansion slots
 - bus lines
 - input/output ports
- Include images and or video where appropriate

Thorough:

- Sound+
- Include a maintenance and troubleshooting guide for a desktop computer
- Find a computer that has been designed for gaming and a computer that is designed for office use. Compare and contrast these two machines. What are the significant specifications of these two machines? Explain what those specifications mean and why they are important in relation to the purpose of the machine.

Extensive:

- Frank is going to set up a computer gamers' café. The idea is to have as many hi specification machines for gamers to hire in groups so that they can have fully catered LAN parties. Franks total budget for the gaming machines and network equipment is \$45,000. Using parts sourced from Australian suppliers design a



computer network with the highest specification PCs while still enabling the café to have enough computers to host a decent party. Outline all of the specifications of the network and the budget on a single web page.