GCSE Coursework for <<Tim Vague >>

Project Title: <<Spreadsheet Project>>

1) Identify

1a) Background to the problem and end user

For my project I am going to do a spreadsheet on a shop that sells things like CD's, dvd's and video games. I will use the spreadsheet to keep track of what the shop buys and sells and what sort of profi t they make. The shop is an online shop so I may have to do things like sort out the deliveries of the items to people's homes. The shop is losing track of all their money, like how much they are spending and the profit they are making. This is why I am do ing this spreadsheet. One sheet will be on what the shop spends their money on and what they buy and stuff, another sheet will be what they sell these items for and the profit they are making. I might have to store addresses for the deliveries and match th e addresses with the membership number, this is for the deliveries of the items.

1b) Possible alternative solutions

There is more than one way of keeping track of financial details like expenditure and profit. You can do a spreadsheet either by hand or on co mputer, you could use things like an account book as well. I could use word on the computer as well by making a table and keeping the financial details there.

1c) Objectives/End user requirements

My objectives are to keep track of the financial details of my online shop. I will try to keep track of all the money spent on the items, all the money received from the sales of the items and then to calculate the profit. I must be able to display all the customers from Kent. I need to keep track of all the deliveri es that I would need to make. I would have to store all the addresses of members and regular customers.

2) Analyse

2a) Choice and justification of software

Microsoft Excel is a spreadsheet program and this is the program I will be using. It will allow me to do calculations in the program so I can take the amount I bought the items for away from the amount I sold the items for to give me my profit. I can also make buttons which when I click them can take me to another page. This can be very useful. I could also use word – a word processing program, to keep my data in. This would be quite good but it would not be as good or as easy to use as excel would be. I could create a table in word to keep the data in but I would have to do all the calculations manually and then fill them in myself. In excel I can add all the data or subtract or do whatever calculation is needed in the program and it is so easy. I can fill in data on any cell on the spreadsheet and then add, subtract, divide or multiply them and get the result to appear in a cell that I have selected. Excel has everything I need for this project.

2b) Choice and justification of hardware

I will be using both Windows XP and Windows 98, as I will be working on two different network systems. The computers with Windows XP on have Pentium 4 processors. I will be using a black laser printer to print off my work.

2c) Data to be input

I will find the prices of the items in my shop by looking at similar shops and looking at what the average sort of price that the items are being sold at is. Fill in the validation table (to stop incorrect data being entered):

Input data to validate	Type of expected data	Range of expected data
Item Prices	Decimals	Minimum 5, Maximum 60
No items in stock	Integer	>=0

2d) How data will be processed by the system

Profit per item – In the cell that will have the profit of the item, I will write the correct formula needed in it. It will be the cell number of the amount the item was sold for, minus the cell number of the amount the item was bought for and then equals. This will calculate the profit per item.

Total profit – I will do the same as above but instead, in the cell which will have the total profit in, it will have a different formula in. It will have all the cell numbers of the profit per item added together and then equals. This will calculate the total profit made.

2e) <u>Forms of output</u>

The data that is going to be output by the program is :

Profit per Item

Total Profit

Stock left over

Tax on each item

Total Tax

2f) <u>Back-up strategy</u>

There are quite a few ways to back up our work and data. These include :

Floppy Disk – 1.44 Mb

Zip Disk – 100/200 Mb

CD-RW – 650-720 Mb

**DVD-ROM – 2-3 GB**

Tape

2g) <u>Security strategy</u>

To keep the data safe I will need to set -up a password system, which has a back up system, and can only be accessed by certain users who the password will be given to.

2h) <u>Need for updates</u>

The system would need to be updated weekly probably. It needs to be updated because maybe someone may have moved house or they may wish to stop receiving information e.g. leaflets, or flyers. Another reason may be that someone may not want there address, email address or phone number known by some stranger.

3) Design

3a) <u>Initial Designs for project</u>
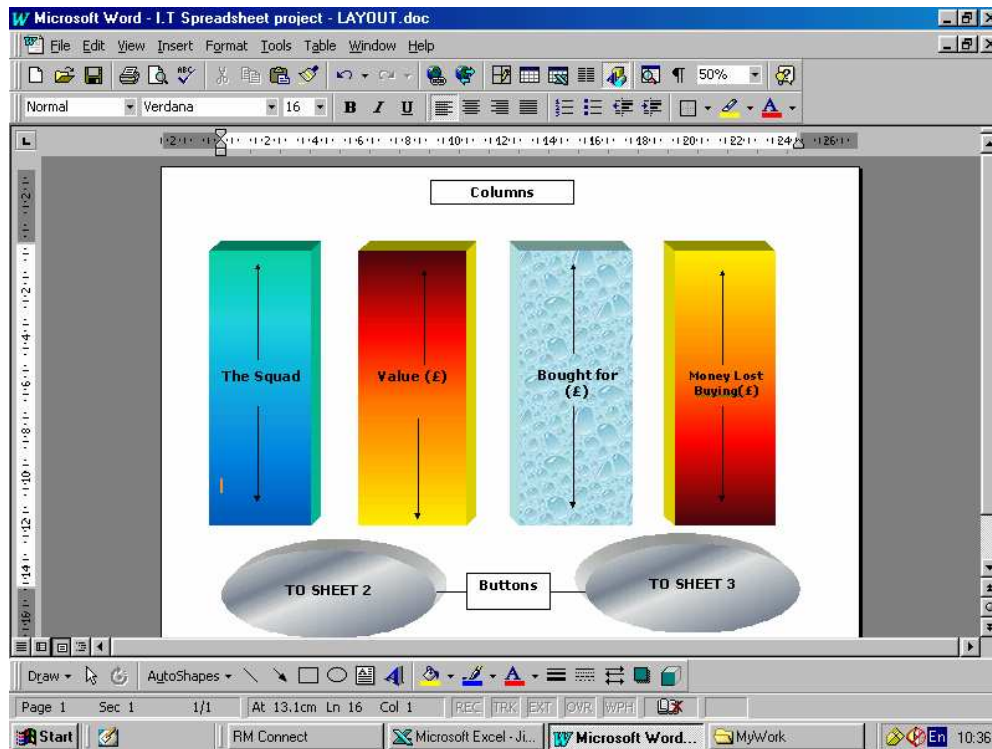
This is my first initial design for my spreadsheet. I have so rt of followed the layout of this but it is slightly different.
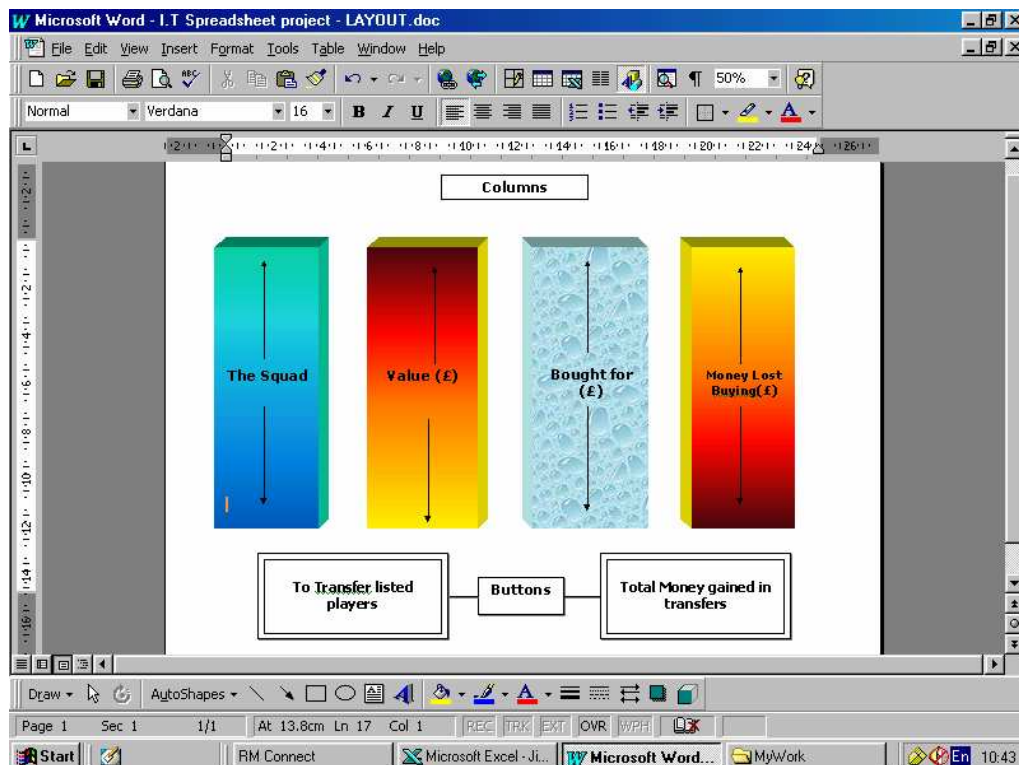
This is my second initial design. It is pretty much the same as design 1, but the buttons are different. They are more like my actual ones.

3b) <u>User feedback on initial designs</u>

Jon Bown ~ I really liked the first layout and the design really appealed to me. The pictures were great and so was the layout.

Jake Kimpton ~ I thought the 2 nd layout was appealing. The square buttons were better than the circular ones.

Dave Wood ~ I thought both t he layouts were really good, but I probably preferred design 2 because of the square buttons.

3c) <u>Final designs</u>

	A	B	C	D	E	F	G	H
1								
2	**The Squad**	**Value**	**Bought For**	**Money Lost (Buying)**				
3								
4	Fabien Barthez (GK)	£9,000,000	£8,000,000	-£1,000,000				
5	Roberto Carlos (DEF)	£20,000,000	£20,000,000	£0				
6	Rio Ferdinand (DEF)	£18,000,000	£21,000,000	£3,000,000				
7	Mickael Silvestre (DEF)	£14,000,000	£6,000,000	-£8,000,000				
8	Lilian Thuram (DEF)	£22,000,000	£18,000,000	-£4,000,000				
9	David Beckham (MID)	£35,000,000	£3,000,000	-£32,000,000				
10	Luis Figo (MID)	£37,000,000	£42,500,000	£5,500,000				
11	Rivaldo (MID)	£18,000,000	£19,000,000	£1,000,000				
12	Zinedine Zidane (MID)	£32,000,000	£31,000,000	-£1,000,000				
13	Ruud Van Nistelrooy (STR)	£19,000,000	£19,000,000	£0				
14	Ronaldo (STR)	£35,000,000	£36,000,000	£1,000,000				
15	Alex Ferguson (Manager)	£15,000,000	£2,000,000	-£13,000,000				
16	Buffon (Sub GK)	£14,000,000	£11,000,000	-£3,000,000				
17	Fabio Cannavaro (Sub DEF)	£17,000,000	£19,000,000	£2,000,000				
18	Ryan Giggs (Sub MID)	£25,000,000	£5,000,000	-£20,000,000				
19	Ronaldinho (Sub STR)	£22,000,000	£22,000,000	£0				
20								
21	To Transfer Listed PLayers		To Total Money Gained In Transfers					
22								
23								
24								

The Squad / Transfer listed players / Total Money Gained In Transfers /

This is my final design for my spreadsheet. I think it is fairly similar to design 2. I am pleased with the way it has turned out. I have used f ormulas to get the profit and the V.A.T. I have made buttons (macro's) for quick access to the other sheets.

3d) Test plans

Test No	What is to be tested (Sheet 1)	Type of test	Data to be entered	Predicted result
1	Validation in Cell C13	extreme	£0	£0
2	Validation in Cell B14	normal	£1,000	£1,000
3	Decimals into Cell D6	extreme	0.01	Error message
4	Decimals into Cell B10	extreme	1.25	Error message
5	Words into Cell B6	erroneous	A b c	Rejected
6	Words into Cell C5	erroneous	seventeen	Rejected
7	Testing Macro	Normal	Clicking	Correct
8	Testing Macro	Normal	Clicking	Correct
9	Formulas	Normal	13+12	Rejected
10	Formulas	Normal	100+10	Rejected
Test No	What is to be tested (Sheet 2)	Type of test	Data to be entered	Predicted result
1	Validation in Cell C6	extreme	£0	£0
2	Validation in Cell D10	normal	£2,000	£2,000
3	Decimals into Cell D14	extreme	0.02	Error
4	Decimals into Cell E11	extreme	1.55	Error
5	Words into Cell E12	erroneous	A B C	Rejected
6	Words into Cell C5	erroneous	Hello	Rejected
7	Testing Macro	Normal	Clicking	Correct
8	Testing Macro	Normal	Clicking	Correct
9	Formulas	Normal	1+1+2	Rejected
10	Formulas	Normal	1+5	Rejected
Test No	What is to be tested (Sheet 3)	Type of test	Data to be entered	Predicted result
1	Validation in Cell C13	extreme	£0	£0
2	Validation in Cell B14	normal	£1,000	£1,000
3	Decimals into Cell D6	extreme	0.15	Error message
4	Decimals into Cell B10	extreme	10.75	Error message
5	Words into Cell B6	erroneous	A B C	Rejected
6	Words into Cell C5	erroneous	seven	Rejected
7	Testing Macro	Normal	Clicking	Correct
8	Testing Macro	Normal	Clicking	Correct
9	Formulas	Normal	19+12	Rejected
10	Formulas	Normal	112+112	Rejected

4) Implement and Test

4a) Evidence of the final system that has been created

*Get a **first** printout of your system to help show a sequence of development*

- *Go through work and annotate by underlining and explaining any errors or problems*
- *If your work has changed since your final design explain why you had to change it*

Printout of any further developments you did (and may have even failed at) – need to be annotated

***Final** printout of system*

4b) Evidence of testing (and correcting) of system

Annotate testing to show how the expected and actual results compare. Provide proof where possible by using screen shots

Even if your corrections don't work, make sure that you provide evidence of you trying to correct them and the problems/error messages that you encountered.

5) Evaluate

5a) Original objectives

I think I met all of my objectives. I kept track of the financial det ails of my shop. I kept track of how much money I have spent, how much I have received and the profit made. I have calculated how many items were sold. I have stored members and regular customer's addresses.

5b) User feedback on system
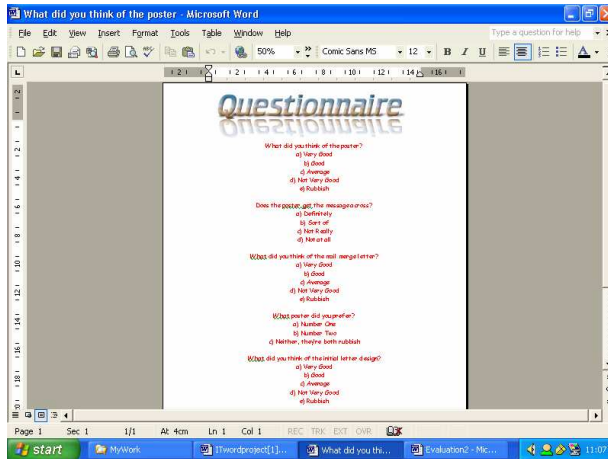
See Questionnaire

5c) Further improvements

Respond to the comments made by your end user - whether you disagree or agree with them.

If you have disagreed with the comments made by your end user then you also need to find at least a couple of improvements that would make your system better.