

# TU STUDIES

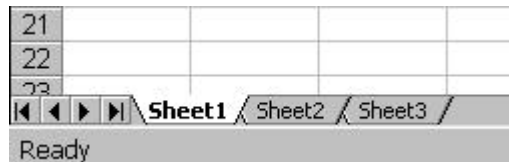
## Using Computers

### Spreadsheet Module

#### Task 7

#### Using Multiple Worksheets

Every Excel® file (or Workbook) is sub divided into Worksheets. Excel® creates 3 sheets in a workbook, more can be added as you require them using Insert + Worksheet. The 3 worksheets are shown by tabs at the bottom left hand corner of the screen (shown below).



Worksheets can be used to prevent your spreadsheet becoming over complicated. Information on a worksheet can be used in calculations on another. To name a worksheet double click or right click on the worksheet tab and type in a new name.

When renaming a worksheet, you can use any names as long as they abide by the following rules:

- they can have a length of upto 31 characters
- they can consist of digits, letters, special characters and empty spaces
- none of the following characters must be use: ? / \ \*

Confirm the entry of the new name by pressing the 'enter' key.

**Task 7**

The table below shown the expenses incurred by three Branch Officers over the last year.

	Travel	Meals	Stationery	Postage	Other
<b>Branch Secretary</b>	£328.75	£248.65	£148.95	£176.54	£36.88
<b>Treasurer</b>	£168.56	£69.54	£52.00	£15.25	£8.65
<b>Chairman</b>	£294.65	£132.54	£19.50	£12.00	£39.54

- 7a Create a worksheet for each of the officers showing the above data. I include a pie chart on the worksheet to show a breakdown of the expenses.
- 7b Create a worksheet called 'totals' to calculate the total expenditure for each category and for each officer.
- 7c Produce pie charts showing the breakdown of expenditure by officer and expense category.
- 7d Produce a combined chart showing the expenses incurred by each officer in the various categories.

Save the above task all under the file name Task 7.

**Methodology: -**

- 7a *Create a worksheet for each of the officers. I include a pie chart on the worksheet to show a breakdown of the expenses.*

*Open a new spreadsheet and save this as 'Task 7'. Name sheet 1 'Branch Secretary' and layout like this:*

	A	B
1		<b>Branch Secretary</b>
2	Travel	328.75
3	Meals	248.65
4	Stationary	148.95
5	Postage	176.54
6	Other	36.88
7		<b>=SUM(B2:B6)</b>
8		

Next select all the information as shown below and produce a pie chart. Look back at task 1 for methodology. Print out both your table and pie chart.

	A	B
1		<b>Branch Secretary</b>
2	Travel	£328.75
3	Meals	£248.65
4	Stationary	£148.95
5	Postage	£176.54
6	Other	£56.88
7		<b>£939.77</b>
8		

Then select sheet 2 and rename this 'Treasurer'. Repeat the above process. Do the same for the Chairman.

7b Create a worksheet called 'totals' to calculate the total expenditure for each category and for each officer.

7c Produce pie charts showing the breakdown of expenditure by officer and expense category.

Use Insert + Worksheet to add a further sheet to the file. Name this new sheet "Totals" and lay it out as follows.

B7		=	=SUM('Branch Secretary'!B2+Chairman!B2+Treasurer!B2)
	A		B
1			<b>Total Expenses</b>
2	Branch Secretary		=SUM('Branch Secretary'!B7)
3	Treasurer		=SUM(Treasurer!B7)
4	Chairman		=SUM(Chairman!B7)
5			
6			<b>Breakdown</b>
7	Travel		=SUM('Branch Secretary'!B2+Chairman!B2+Treasurer!B2)
8	Meals		=SUM('Branch Secretary'!B3+Chairman!B3+Treasurer!B3)
9	Stationary		=SUM('Branch Secretary'!B4+Chairman!B4+Treasurer!B4)
10	Postage		=SUM('Branch Secretary'!B5+Chairman!B5+Treasurer!B5)
11	Other		=SUM('Branch Secretary'!B6+Chairman!B6+Treasurer!B6)
12			

**Tip:**

*When completing cell B7, make sure that the lettering is exactly the same as the sheet label, otherwise the computer will not be able to locate this.*

*Then drag and AutoFill B7 to B11. (remember to place the cursor over the black square in the bottom right hand corner of B7 and watch for the fat white cross turning into a thin black one).*

*Produce 2 pie charts showing:*

- *the total expenses*
- *the individuals totals*

*Give your pie charts an appropriate heading, a legend and to show totals. Refer back to task 1 if necessary.*

*7d Produce a combined chart showing the expenses incurred by each officer in the various categories.*

*Select all of the Branch Secretary's details, except the total in B7 and produce a column chart using chart wizard. Give the heading 'Combined Graph' and then add your name. Show the graph as a new sheet called Combined Chart when you reach stage 4 of the process instead of leaving the panel as the default and creating a chart within another worksheet as we have done previously.*

*Then go to the Treasurers Details and highlight the cells B1 to B6. Then select 'Edit', then 'Copy' and then go to your Combined Chart. Then choose 'Edit' and then select 'Paste Special'. Click OK. Another panel will appear with various options, leave these as they are and click OK.*

*You will now see that the Treasurers information has been included into the Branch Secretary's graph.*

*Repeat this process for the Chairman.*

*Alter the graph as necessary. For instance, the y and x axis could be labelled, change colours and font sizes.*

**Tip:**

*Moving and copying sheets with 'Drag and Drop'.*

If you want to arrange the worksheets which are contained in a workbook in a specific order. For example, because you want to group them, you can do so by using the 'drag and drop'. To do this click on the sheet tab and then drag it with the mouse to the desired new position and then release your mouse.

To duplicate a worksheet, click the tab sheet and drag it to the new position while holding down the control key down.