

AGGREGATION FUNCTION–COUNT/COUNTA/COUNTBLANK/COUNTIF/SUMIF/SUMPRODUCT

COUNT

WHAT DOES IT DO?

- This function counts the number of numeric entries in a list
- It will ignore blanks, text and errors

SYNTAX

- =COUNT(Range1,Range2,Range3... through to Range30)

EXAMPLE

	C	D	E	F	G	H
3	Entries To Be Counted			Count		
4	10	150	30	3	=COUNT(C4:E4)	
5	10	0	30	3	=COUNT(C5:E5)	
6	10	-150	30	3	=COUNT(C6:E6)	
7	10	1-Jan-08	30	3	=COUNT(C7:E7)	
8	10	21:30	30	3	=COUNT(C8:E8)	
9	10	0.8840387	30	3	=COUNT(C9:E9)	
10	10		30	2	=COUNT(C10:E10)	
11	10	Hi	30	2	=COUNT(C11:E11)	
12	10	#DIV/0!	30	2	=COUNT(C12:E12)	

COUNTA

WHAT DOES IT DO?

- This function counts the number of numeric or text entries in a list
- It will ignore blanks

SYNTAX

- =COUNTA(Range1,Range2,Range3... through to Range30)

EXAMPLE

	C	D	E	F	G	H
3	Entries To Be Counted			Count		
4	10	150	30	3	=COUNTA(C4:E4)	
5	10	0	30	3	=COUNTA(C5:E5)	
6	10	-150	30	3	=COUNTA(C6:E6)	
7	10	1-Jan-08	30	3	=COUNTA(C7:E7)	
8	10	21:30	30	3	=COUNTA(C8:E8)	
9	10	0.3863932	30	3	=COUNTA(C9:E9)	
10	10		30	2	=COUNTA(C10:E10)	
11	10	Hi	30	3	=COUNTA(C11:E11)	
12	10	#DIV/0!	30	3	=COUNTA(C12:E12)	

COUNTBLANK

WHAT DOES IT DO?

- This function counts the number of blank cells in a range

SYNTAX

- =COUNTBLANK(RangeToTest)

EXAMPLE

	C	D	E	F
3	Range To Test		Blanks	
4	1		2	
5	Hello		=COUNTBLANK(C4:C11)	
6	3			
7	0			
8				
9	1-Jan-98			
10				
11	5			

COUNTIF

WHAT DOES IT DO?

- This function counts the number of items which match criteria set by the user.

SYNTAX

- =COUNTIF(RangeOfThingsToBeCounted,CriteriaToBeMatched)
- The criteria can be typed in any of the following ways
 - To match a specific number type the number, such as =COUNTIF(A1:A5,100)
 - To match a piece of text type the text in quotes, such as =COUNTIF(A1:A5,"Hello")
 - To match using operators surround the expression with quotes, such as =COUNTIF(A1:A5,">100")

EXAMPLE

	B	C	D	E	F	G
3		Item	Date	Cost		
4		Brakes	1-Jan-98	80		
5		Tyres	10-May-98	25		
6		Brakes	1-Feb-98	80		
7		Service	1-Mar-98	150		
8		Service	5-Jan-98	300		
9		Window	1-Jun-98	50		
10		Tyres	1-Apr-98	200		
11		Tyres	1-Mar-98	100		
12		Clutch	1-May-98	250		
13						
14	How many Brake Shoes Have been bought.				2	=COUNTIF(C4:C12,"Brakes")
15	How many Tyres have been bought.				3	=COUNTIF(C4:C12,"Tyres")
16	How many items cost \$100 or above.				5	=COUNTIF(E4:E12,">=100")

SUMIF FUNCTION

WHAT DOES IT DO?

- This function adds the value of items which match criteria set by the user

SYNTAX

- =SUMIF(RangeOfThingsToBeExamined,CriteriaToBeMatched,RangeOfValuesToTotal)
- =SUMIF(C4:C12,"Brakes",E4:E12)
 - This examines the names of products in C4:C12
 - It then identifies the entries for Brakes
 - It then totals the respective figures in E4:E12
- =SUMIF(E4:E12,">=100")
 - This examines the values in E4:E12
 - If the value is >=100 the value is added to the total

EXAMPLE

	B	C	D	E	F	G	H	I
3		Item	Date	Cost				
4		Brakes	1-Jan-98	80				
5		Tyres	10-May-98	25				
6		Brakes	1-Feb-98	80				
7		Service	1-Mar-98	150				
8		Service	5-Jan-98	300				
9		Window	1-Jun-98	50				
10		Tyres	1-Apr-98	200				
11		Tyres	1-Mar-98	100				
12		Clutch	1-May-98	250				
13								
14	Total cost of all Brakes bought.				160	=SUMIF(C4:C12,"Brakes",E4:E12)		
15	Total cost of all Tyres bought.				325	=SUMIF(C4:C12,"Tyres",E4:E12)		
16	Total of items costing \$100 or above.				1000	=SUMIF(E4:E12,">=100")		

SUMPRODUCT FUNCTION

WHAT DOES IT DO?

- This function uses at least two columns of values
- The values in the first column are multiplied with the corresponding value in the second column
- The total of all the values is the result of the calculation

SYNTAX

- =SUMPRODUCT(Range1, Range, Range3 through to Range30)

EXAMPLE

	C	D	E	F	G	H
3	Item	Sold	price			
4	Tyres	15	100			
5	Filters	10	10			
6	Bulbs	15	2			
7						
8	Total Sales Value :		1630	=SUMPRODUCT(D4:D6,E4:E6)		