

Assignment 2

1. What does the dollar (\$) sign do?

It is used for absolute cell reference, absolute column reference, absolute row reference. Absolute Cell Reference: When you use a dollar sign before both the column letter and row number in a cell reference, such as \$A\$1, it fixes both the column and the row. If you copy or fill a formula containing an absolute cell reference, such as =\$A\$1, to other cells, the reference will remain unchanged.

In the same way, dollar sign is used for absolute column reference and absolute row reference.

For absolute column reference – \$A1

For absolute row reference – A\$1

2. How to Change the Reference from Relative to Absolute (or Mixed)?

To change a cell reference from relative to absolute (or mixed) in Excel, you can use the dollar sign (\$) to modify the reference in the following way :

Relative Reference: By default, cell references in Excel are relative. For example, if you enter a formula in cell B2 that refers to cell A1 as "=A1" and then copy that formula to cell B3, the reference will automatically adjust to "=A2" because it is relative to the new location.

Absolute Reference: To change a cell reference to an absolute reference, you need to add dollar signs (\$) before the column letter and the row number in the reference. For example, if you want to make the reference to cell A1 absolute, you would modify it to "\$A\$1". This will fix both the column (A) and the row (1) so that they do not change when the formula is copied or filled.

Mixed Reference: A mixed reference is a combination of relative and absolute references. You can make either the column or the row absolute while leaving the other part relative. For example, if you want to fix the column (A) but allow the row to change, you would use "\$A1". Similarly, if you want to fix the row (1) but allow the column to change, you would use "A\$1".

3. Explain the order of operations in excel?

The order of operations determines the sequence in which mathematical and logical operations are performed in a formula. Excel uses the standard mathematical conventions for order of operations, which is commonly referred to as "BODMAS".

1) Parentheses: Operations enclosed in parentheses are executed first.

2) Exponents: Exponentiation is the next operation to be performed. If a formula contains exponentiation, such as "^" (caret) operator, those calculations are carried out after the parentheses have been evaluated.

3) Multiplication and Division: Multiplication (*) and division (/) operations are performed from left to right. If there are multiple multiplication or division operations in the formula, Excel evaluates them in the order they appear.

4) Addition and Subtraction: Addition (+) and subtraction (-) operations are also performed from left to right. Similar to multiplication and division, if there are multiple addition or subtraction operations, Excel evaluates them in the order they appear.

5) Comparison Operators and Logical Operators: After performing arithmetic operations, any comparison operators (such as =, <, >, etc.) and logical operators (such as AND, OR) are evaluated.

4. What, according to you, are the top 5 functions in excel and write a basic syntax for any of two?

The top 5 functions in excel according to me are as follows –

Sum(), vlookup() ,average(),concatenate(),average().

1. SUM Function:

Syntax: =SUM(number1, [number2], ...)

2. VLOOKUP Function:

Syntax: =VLOOKUP(lookup_value, table_array, col_index_num, [range_lookup])

5. When would you use the subtotal function?

The SUBTOTAL function in Excel is particularly useful when you need to perform calculations on a filtered range of data. It allows us to calculate various aggregate functions, such as sum, average, maximum, minimum, etc., while ignoring hidden or filtered rows.

1.Data Analysis: When you have a large dataset and you want to analyze specific subsets of data using filters, the SUBTOTAL function can help you calculate subtotals based on the filtered data. It allows you to obtain insights into different segments of the data without altering the original dataset.

2.Reporting: If you need to create reports that involve summarizing and aggregating data, the SUBTOTAL function enables you to calculate subtotals efficiently. For instance, you can use it to calculate the subtotal for sales by region or by product category.

3.Conditional Formatting: The SUBTOTAL function can be combined with conditional formatting to highlight specific data based on calculated subtotals. This can aid in identifying outliers, trends, or specific data patterns within a range.

6. What is the syntax of the vlookup function? Explain the terms in it?

The syntax of the VLOOKUP function in Excel is as follows:

=VLOOKUP(lookup_value, table_array, col_index_num, [range_lookup])

The terms in the formula:

1)lookup_value: This is the value you want to search for in the leftmost column of the table or range.

2)table_array: This refers to the table or range of cells where the lookup is performed. It should include the column containing the lookup_value and the column from which we want to retrieve the result.

3)col_index_num: This specifies the column number in the table_array from which we want to retrieve the result. It represents the relative position of the column in the table_array, where the leftmost column is considered as 1, the next column as 2, and so on.

4)range_lookup: This is an optional argument that determines whether we want an exact match or an approximate match for the lookup_value. If set to TRUE or omitted, an approximate match is sought, and if set to FALSE, an exact match is required.

Advance Excel Assignment 2

1. What does the dollar(\$) sign do?
2. How to Change the Reference from Relative to Absolute (or Mixed)?
3. Explain the order of operations in excel?
4. What, according to you, are the top 5 functions in excel and write a basic syntax for any of two?
5. When would you use the subtotal function?
6. What is the syntax of the vlookup function? Explain the terms in it?

