

How do I use SUM and OFFSET together in Excel?

Authored by
stats writer

June 22, 2024

RECOMMENDED CITATION

stats writer (2024). *How do I use SUM and OFFSET together in Excel?*. PSYCHOLOGICAL SCALES. Retrieved from <https://scales.arabpsychology.com/?p=146986>

SUM and OFFSET are two useful functions in Excel that can be used together to perform calculations and retrieve data from a specific range of cells. The SUM function is used to add up a group of cells, while the OFFSET function is used to select a range of cells based on a specified starting point. By combining these two functions, you can create a dynamic formula that can adjust its range based on the starting point specified in the OFFSET function. This allows you to perform calculations on a different set of cells without having to manually change the formula. To use SUM and OFFSET together in Excel, you will need to understand the syntax of both functions and the different parameters that can be used to customize the range of cells. With this knowledge, you can easily manipulate data and perform calculations in your Excel worksheets.

Excel: Use SUM and OFFSET Together

You can use the following syntax with the SUM and OFFSET functions in Excel to sum a specific range of values that are offset by a specific number of rows and columns:

=SUM(OFFSET(A1, 6, 2, 5, 1))

This particular formula will sum the range of values that is 5 rows long and 1 column wide that is offset by 6 rows below and 2 columns to the right of cell A1.

The following example shows how to use this formula in practice.

Example: How to Use SUM and OFFSET in Excel

Suppose we have the following dataset in Excel that

contains information about points scored by basketball players on various teams and positions:

	A	B	C	D	E	F
1	Team	Position	Points			
2	Mavs	Guard	14			
3	Mavs	Guard	29			
4	Mavs	Forward	7			
5	Mavs	Forward	12			
6	Mavs	Center	10			
7	Spurs	Guard	6			
8	Spurs	Guard	8			
9	Spurs	Forward	15			
10	Spurs	Forward	40			
11	Spurs	Center	23			
12	Rockets	Guard	18			
13	Rockets	Guard	14			
14	Rockets	Forward	22			
15	Rockets	Forward	29			
16	Rockets	Center	35			
17						
18						
19						

Notice that each team has exactly five players.

Suppose we would like to sum the values of the points scored by the players on the Spurs team.

We can type the following formula into cell E2 to do so:

=SUM(OFFSET(A1, 6, 2, 5, 1))

The following screenshot shows how to use this formula in practice:

The screenshot shows an Excel spreadsheet with the following data:

	A	B	C	D	E
1	Team	Position	Points		Sum of Points Scored by Spurs
2	Mavs	Guard	14		92
3	Mavs	Guard	29		
4	Mavs	Forward	7		
5	Mavs	Forward	12		
6	Mavs	Center	10		
7	Spurs	Guard	6		
8	Spurs	Guard	8		
9	Spurs	Forward	15		
10	Spurs	Forward	40		
11	Spurs	Center	23		
12	Rockets	Guard	18		
13	Rockets	Guard	14		
14	Rockets	Forward	22		
15	Rockets	Forward	29		
16	Rockets	Center	35		
17					
18					

The formula bar shows: `=SUM(OFFSET(A1, 6, 2, 5, 1))`

The formula returns a value of 92, which is the sum of the points values for players on the Spurs team.

We can confirm that this is correct by manually calculating the sum of points for the Spurs players:

Sum of Points for Spurs: $6 + 8 + 15 + 40 + 23 = 92$.

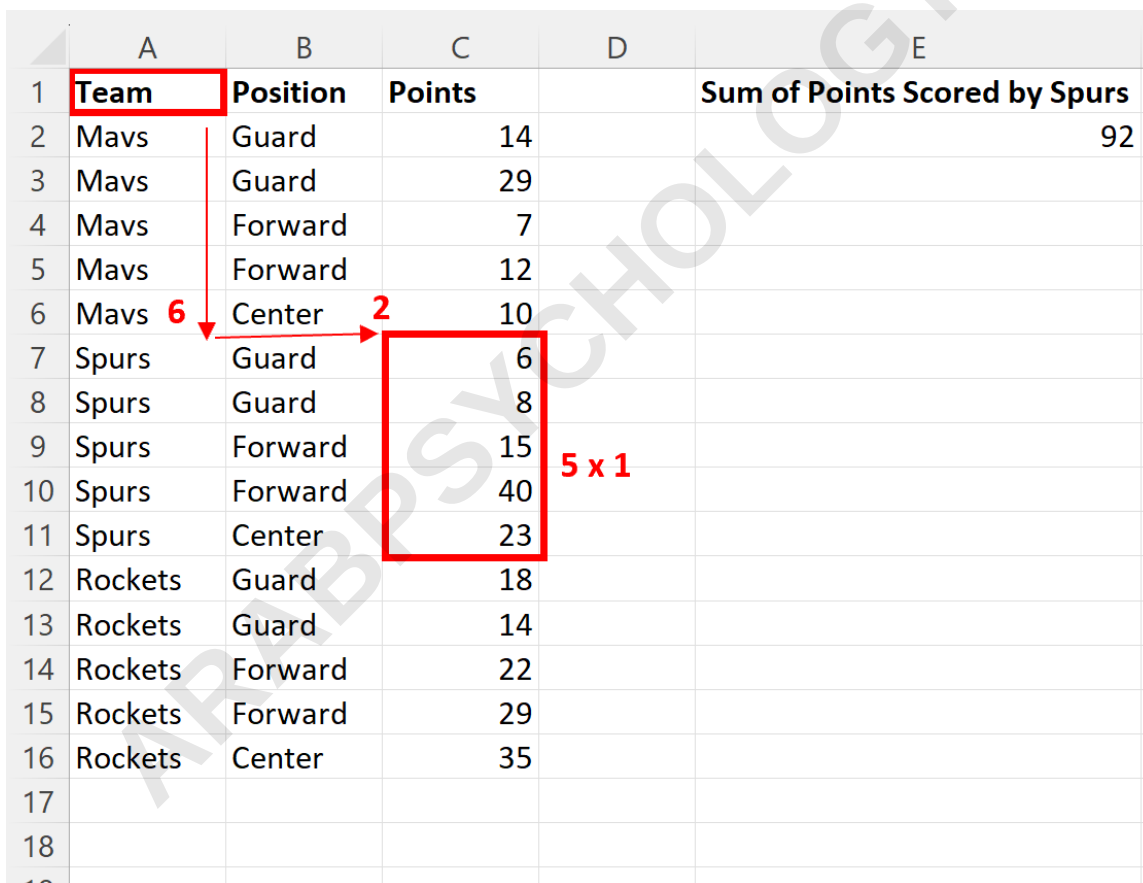
This matches the value calculated by our formula.

How This Formula Works

Recall the formula that we used to calculate the sum of the points for players on the Spurs team:

=SUM(OFFSET(A1, 6, 2, 5, 1))

Here is a visual explanation of how the formula works:



	A	B	C	D	E
1	Team	Position	Points		Sum of Points Scored by Spurs
2	Mavs	Guard	14		92
3	Mavs	Guard	29		
4	Mavs	Forward	7		
5	Mavs	Forward	12		
6	Mavs	Center	10		
7	Spurs	Guard	6		
8	Spurs	Guard	8		
9	Spurs	Forward	15		
10	Spurs	Forward	40		
11	Spurs	Center	23		
12	Rockets	Guard	18		
13	Rockets	Guard	14		
14	Rockets	Forward	22		
15	Rockets	Forward	29		
16	Rockets	Center	35		
17					
18					
19					

First, we start at cell A1.

Then we go 6 cells below this cell and 2 cells to the

right.

Then we specify that we'd like to look at the cell range that is 5 rows long and 1 column wide.

Lastly, we use the SUM function to sum the values in this range.

The following tutorials explain how to perform other common tasks in Excel: