What is the purpose of the Excel IFS function?

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The Excel IFS function is a logical function that allows users to evaluate multiple conditions and return a specific result based on the first condition that is met. Its purpose is to simplify and streamline complex logical calculations, making it easier for users to create dynamic formulas and analyze data. This function is particularly useful in situations where there are multiple conditions that need to be evaluated and different results need to be returned based on those conditions. It helps to ensure accurate and efficient data analysis and decision-making processes.

Excel IFS Function

IFS Function

The **IFS** function is a premade function in Excel, which returns values based on one or more **true** or **falseconditions**.

It is typed `=IFS` and has two or more parts:

=IFS(**logical_test1**, **value_if_true1**, , **[logical_test3;** ...)

The **conditions** are referred to as `logical_test1, logical_test2, ...`, which can check things like:

If a number is **greater than** another number >If a number is **smaller than** another number <If a number or text is **equal** to something =

Each condition is connected with a return value.

Note: More than one condition can be true so the function will return the value for the first true condition.

Note: The different parts of the function are separated by a symbol, like comma `,` or semicolon `;`

The symbol depends on your Language Settings.

Example IFS function

Make categories for how fast the Pokemon are:

The conditions and return values are:

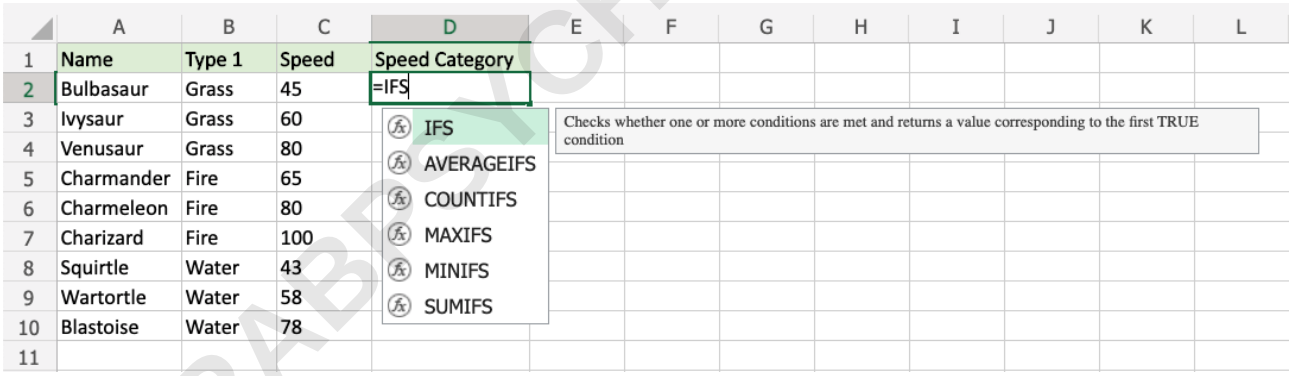
Speed **more than** 90: "Fast"Speed **more than** 50: "Normal"Speed **less than or equal to** 50:

	A	B	C	D	E
1	Name	Type 1	Speed	Speed Category	
2	Bulbasaur	Grass	45		
3	Ivysaur	Grass	60		
4	Venusaur	Grass	80		
5	Charmander	Fire	65		
6	Charmeleon	Fire	80		
7	Charizard	Fire	100		
8	Squirtle	Water	43		
9	Wartortle	Water	58		
10	Blastoise	Water	78		
11					

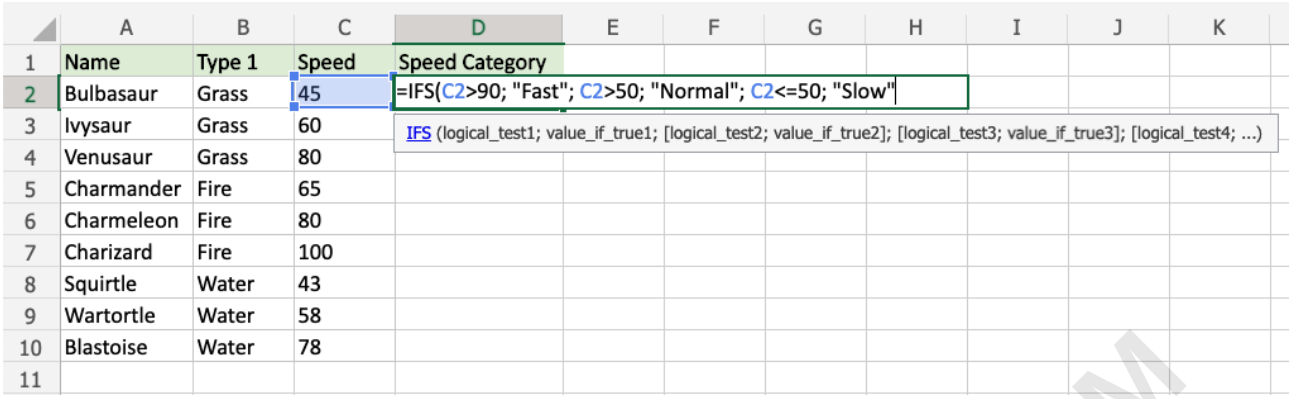
"Slow"

Example **IFS** function, step by step:

Select the cell `D2`Type `=IFS`Double click the **IFS** command



Specify the first condition `C2>90`Type `,`Specify the value `"Fast"` for when the first condition is **TRUE**Type `,`Specify the second condition `C2>50`Type `,`Specify the value `"Normal"` for when the second condition is **TRUE**Type `,`Specify the third condition `C2`Type `,`Specify the value `"Slow"` for when the third condition is **TRUE**Hit enter



	A	B	C	D
1	Name	Type 1	Speed	Speed Category
2	Bulbasaur	Grass	45	=IFS(C2>90; "Fast"; C2>50; "Normal"; C2<=50; "Slow"
3	Ivysaur	Grass	60	
4	Venusaur	Grass	80	
5	Charmander	Fire	65	
6	Charmeleon	Fire	80	
7	Charizard	Fire	100	
8	Squirtle	Water	43	
9	Wartortle	Water	58	
10	Blastoise	Water	78	
11				

Since the value in cell `C2` is "45", the first and second conditions are **false**, and third condition is **true** (less than or equal to 50), the function will return "Slow".

Note: Text values needs to be in quotes: " "

The function can be repeated with the filling function for each row to perform the same check for each Pokemon:

	A	B	C	D	E
1	Name	Type 1	Speed	Speed Category	
2	Bulbasaur	Grass	45	=IFS(C2>90; "Fast"; C2>50; "Normal"; C2<=50; "Slow")	
3	Ivysaur	Grass	60	=IFS(C3>90; "Fast"; C3>50; "Normal"; C3<=50; "Slow")	
4	Venusaur	Grass	80	=IFS(C4>90; "Fast"; C4>50; "Normal"; C4<=50; "Slow")	
5	Charmander	Fire	65	=IFS(C5>90; "Fast"; C5>50; "Normal"; C5<=50; "Slow")	
6	Charmeleon	Fire	80	=IFS(C6>90; "Fast"; C6>50; "Normal"; C6<=50; "Slow")	
7	Charizard	Fire	100	=IFS(C7>90; "Fast"; C7>50; "Normal"; C7<=50; "Slow")	
8	Squirtle	Water	43	=IFS(C8>90; "Fast"; C8>50; "Normal"; C8<=50; "Slow")	
9	Wartortle	Water	58	=IFS(C9>90; "Fast"; C9>50; "Normal"; C9<=50; "Slow")	
10	Blastoise	Water	78	=IFS(C10>90; "Fast"; C10>50; "Normal"; C10<=50; "Slow")	
11					

Note: The third condition `includes = so that 50 is included in "less than or **equal** to 50"`

Now, each Pokemon has a speed category:

	A	B	C	D	E
1	Name	Type 1	Speed	Speed Category	
2	Bulbasaur	Grass	45	Slow	
3	Ivysaur	Grass	60	Normal	
4	Venusaur	Grass	80	Normal	
5	Charmander	Fire	65	Normal	
6	Charmeleon	Fire	80	Normal	
7	Charizard	Fire	100	Fast	
8	Squirtle	Water	43	Slow	
9	Wartortle	Water	58	Normal	
10	Blastoise	Water	78	Normal	
11					