

Spreadsheet: binary to decimal

Follow these steps to create a spreadsheet that converts binary numbers into decimal.

You need to be familiar with simple formulas (calculating the product of two values), basic functions (calculating the sum of a range of cells), and the AutoFill feature.

Step 1 The binary number

Designate an area (a group of cells) where the digits of the binary number will be entered.

	A	B	C	D	E	F
1						
2	Binary number	1	1	0	1	0

Step 2 Multipliers

Compute the multiplier for each of the binary digits. Use the cells above the binary digits.

Note: Do **not** enter the multipliers by hand, except the multiplier of the rightmost digit (which equals 1). Every other multiplier should be twice as big as the one to its right.

	A	B	C	D	E	F
1	Multipliers	16	8	4	2	1
2	Binary number	1	1	0	1	0

Step 3 Products

Compute the product of each binary digit and its corresponding multiplier. Use the cells **below** the binary digits.

	A	B	C	D	E	F
1	Multipliers	16	8	4	2	1
2	Binary number	1	1	0	1	0
3	Products	16	8	0	2	0

Step 4 The decimal number

Compute the decimal number. It is the sum of the products that you computed previously.

	A	B	C	D	E	F
1	Multipliers	16	8	4	2	1
2	Binary number	1	1	0	1	0
3	Products	16	8	0	2	0
4						
5	Decimal number	26				

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