

## Table for the Areas associated with a fixed perimeter of 20 meters

Perimeter	Length	Width	Area
20	1	9	9
20	2	8	16
20	3	7	21
20	4	6	24
20	5	5	25
20	6	4	24
20	7	3	21
20	8	2	16
20	9	1	9

How to get width to be written in terms of length.

Length	Width	$\frac{1}{2}(\text{Perimeter})$	$\frac{1}{2}(P)-L$
1	9	10	10-1
2	8	10	10-2
3	7	10	
4	6	10	
5	5	10	
6	4	10	
7	3	10	
8	2	10	
9	1	10	

You can write the equation for the area of a rectangle in terms of length as:

$$Y=L(\frac{1}{2}P-L)$$