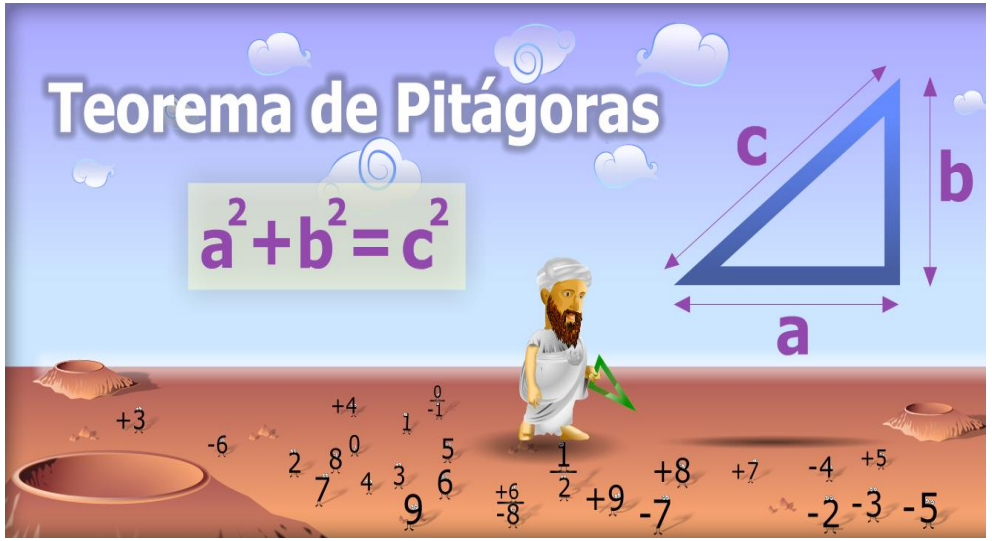
GEOMETRÍA

Capítulo 3

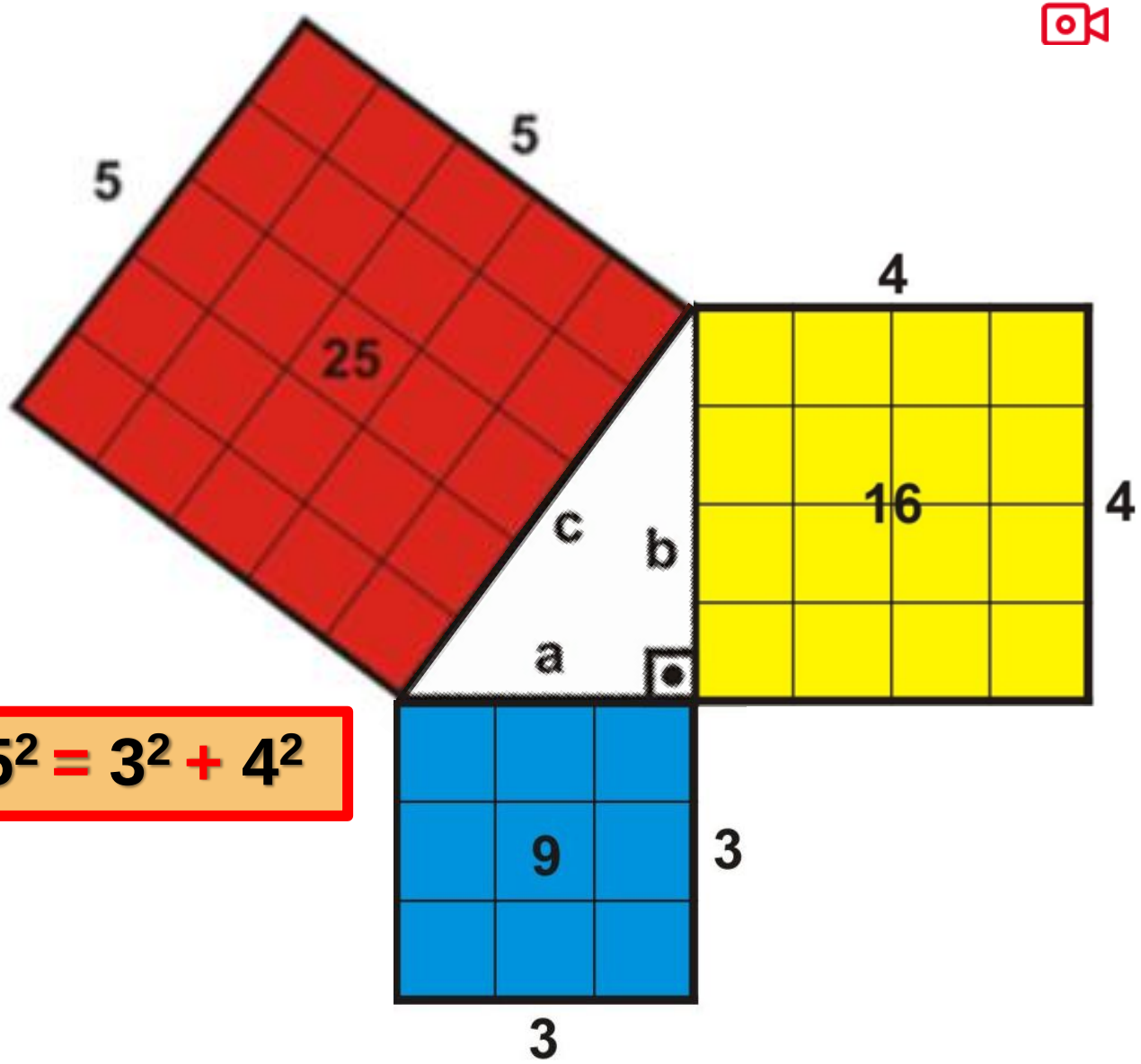
1st
SECONDARY

SACO OLIVEROS

Triángulos Rectángulos Notables

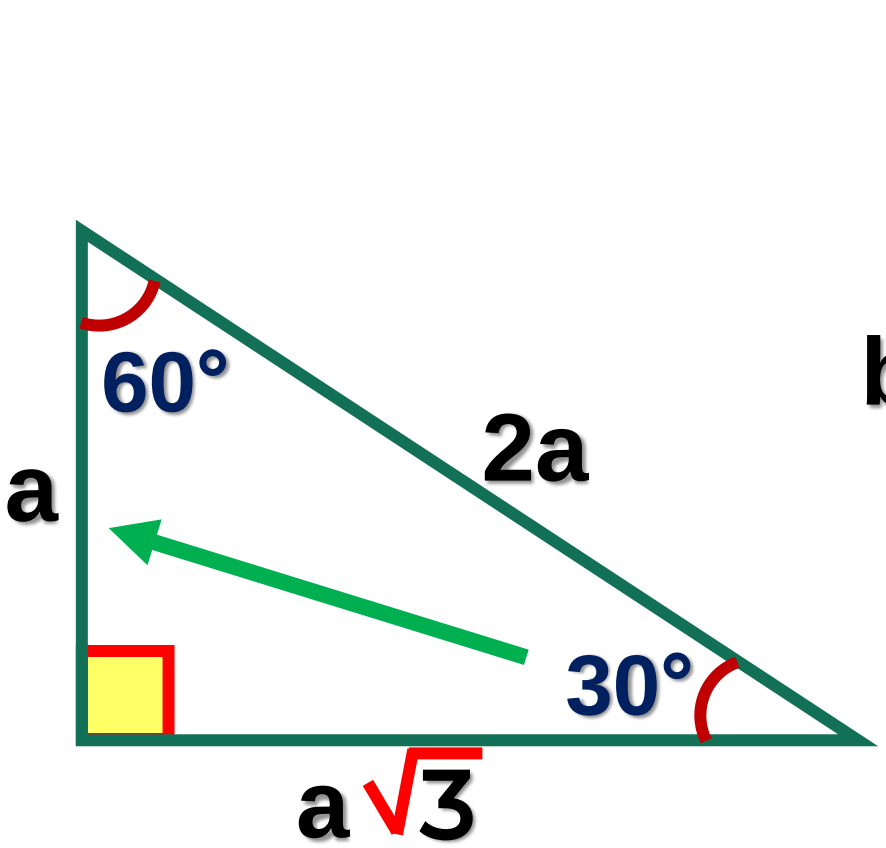

Teorema de Pitágoras
$a^2+b^2=c^2$
c
b
a

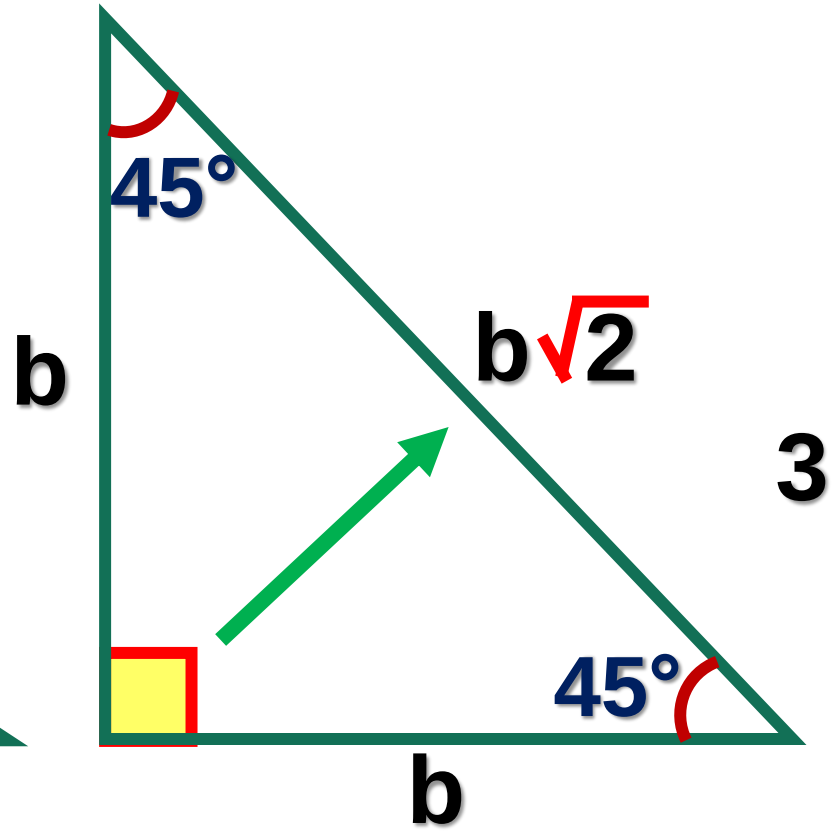

ME LIMPIAS TODO PITÁGORAS

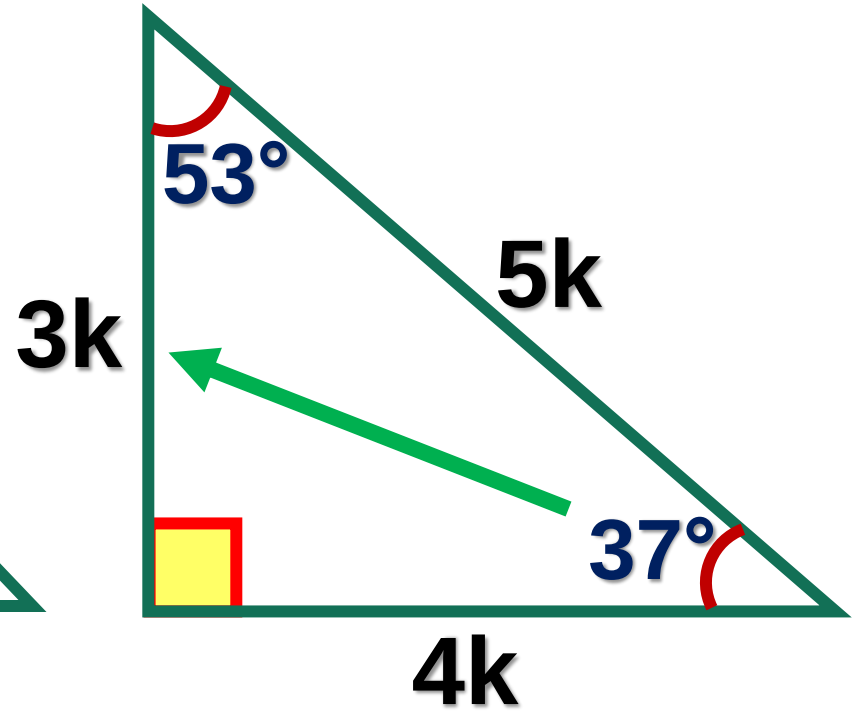

5
5
25
4
4
16
c
b
a
3
9
3

$5^2 = 3^2 + 4^2$

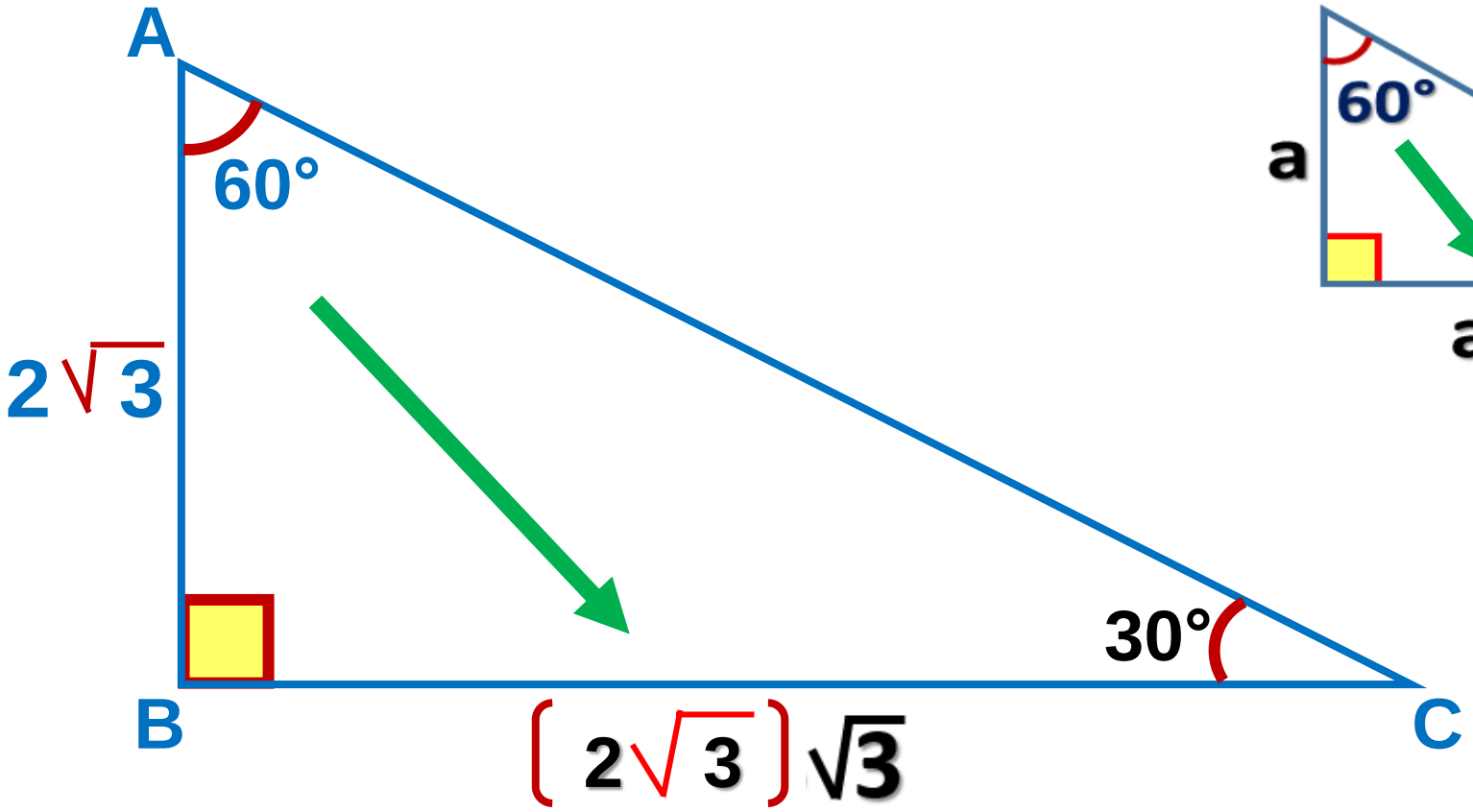
TRIÁNGULOS RECTÁNGULOS NOTABLES

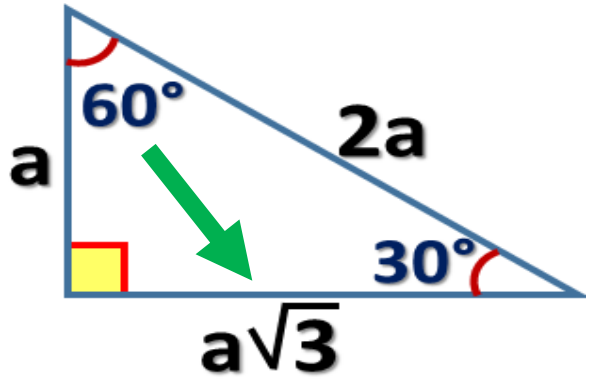






1. Se tiene un triángulo ABC, recto en B. Si AB = $2\sqrt{3}$ m y m∠BAC = 60°, halle BC.



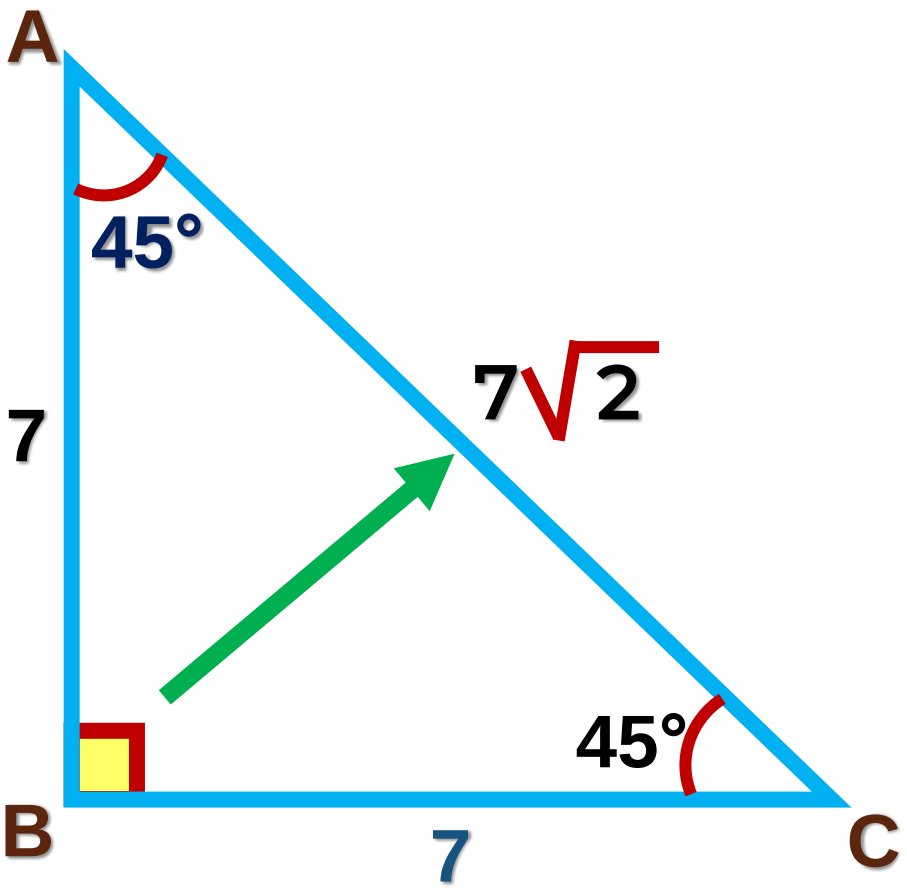


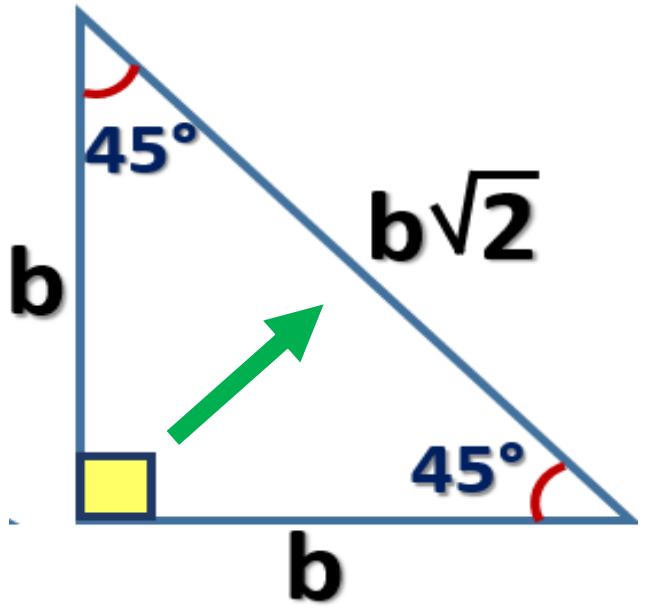
$BC = (2\sqrt{3})\sqrt{3}$

$BC = 2.\ 3$

BC = 6m

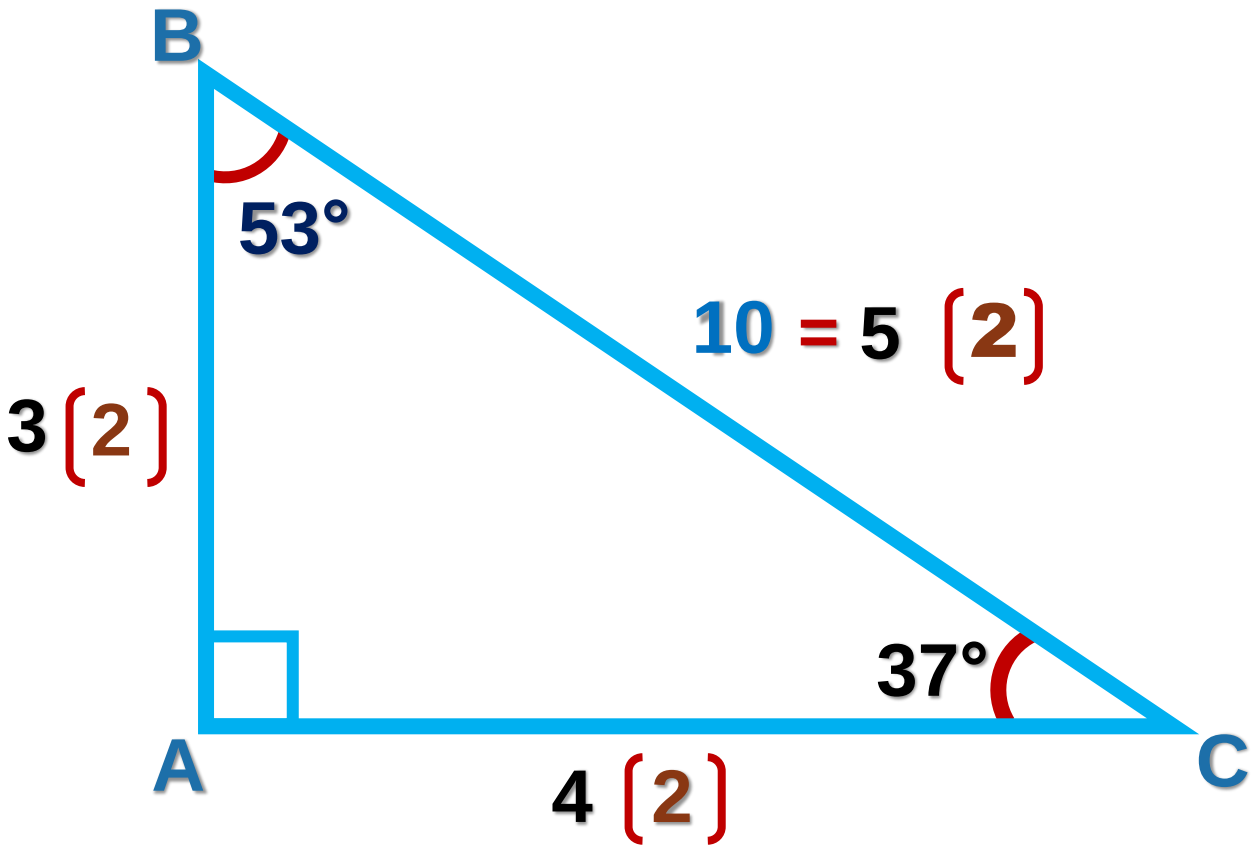
2. En el gráfico, halle AC.

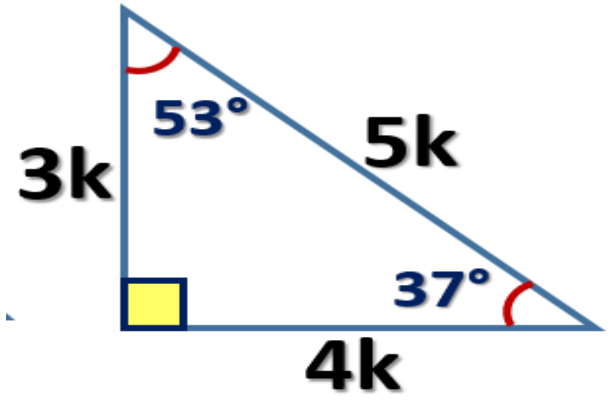




$AC = 7\sqrt{2}$

3. La longitud de la hipotenusa de un triángulo rectángulo es 10m y un ángulo agudo mide 53°. Halle la longitud del cateto menor.

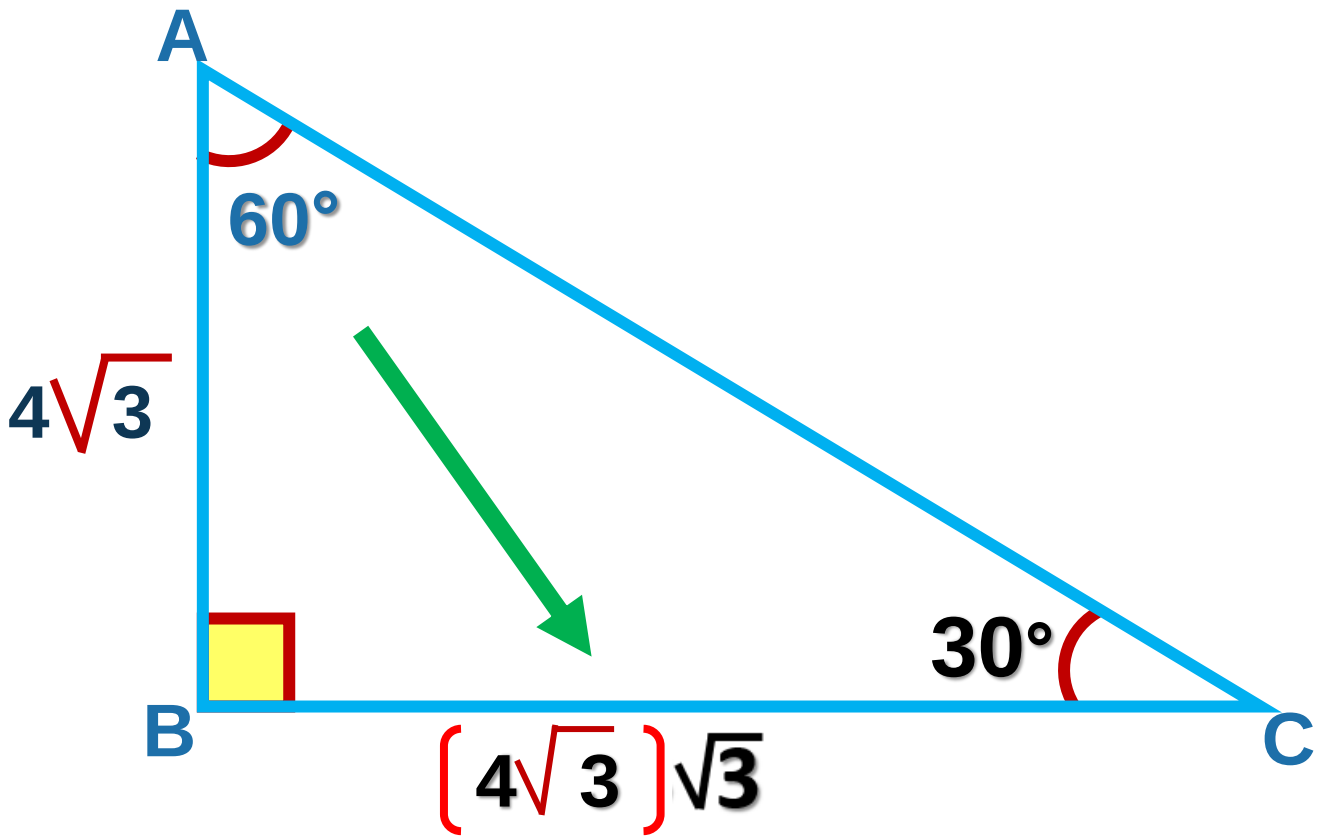


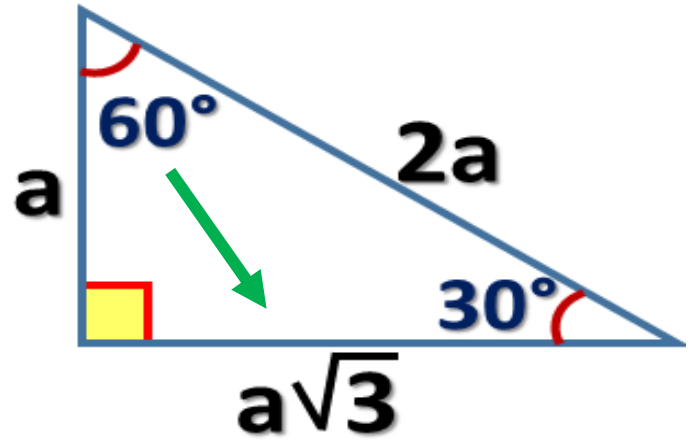


$AB = 3(2)$

$AB = 6m$

4. En el gráfico, halle BC.



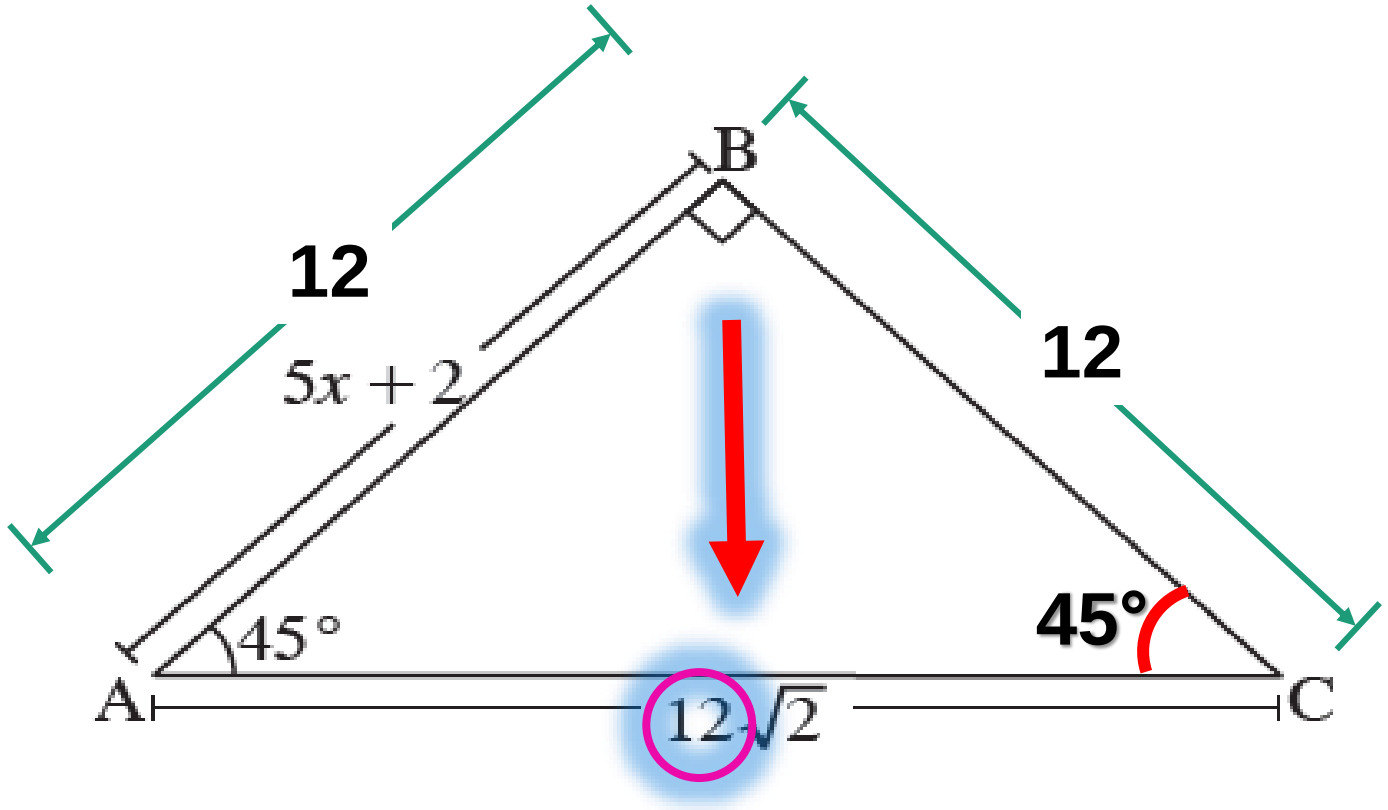


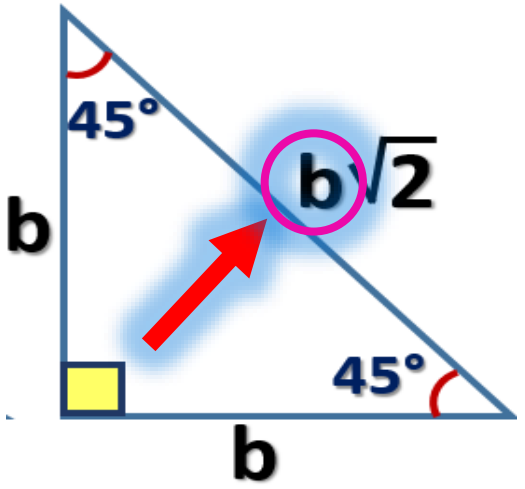
$$BC = 4\sqrt{3}(\sqrt{3})$$

$$BC = 4.\ 3$$

$$BC = 12$$

5. En el gráfico, halle el valor de x.





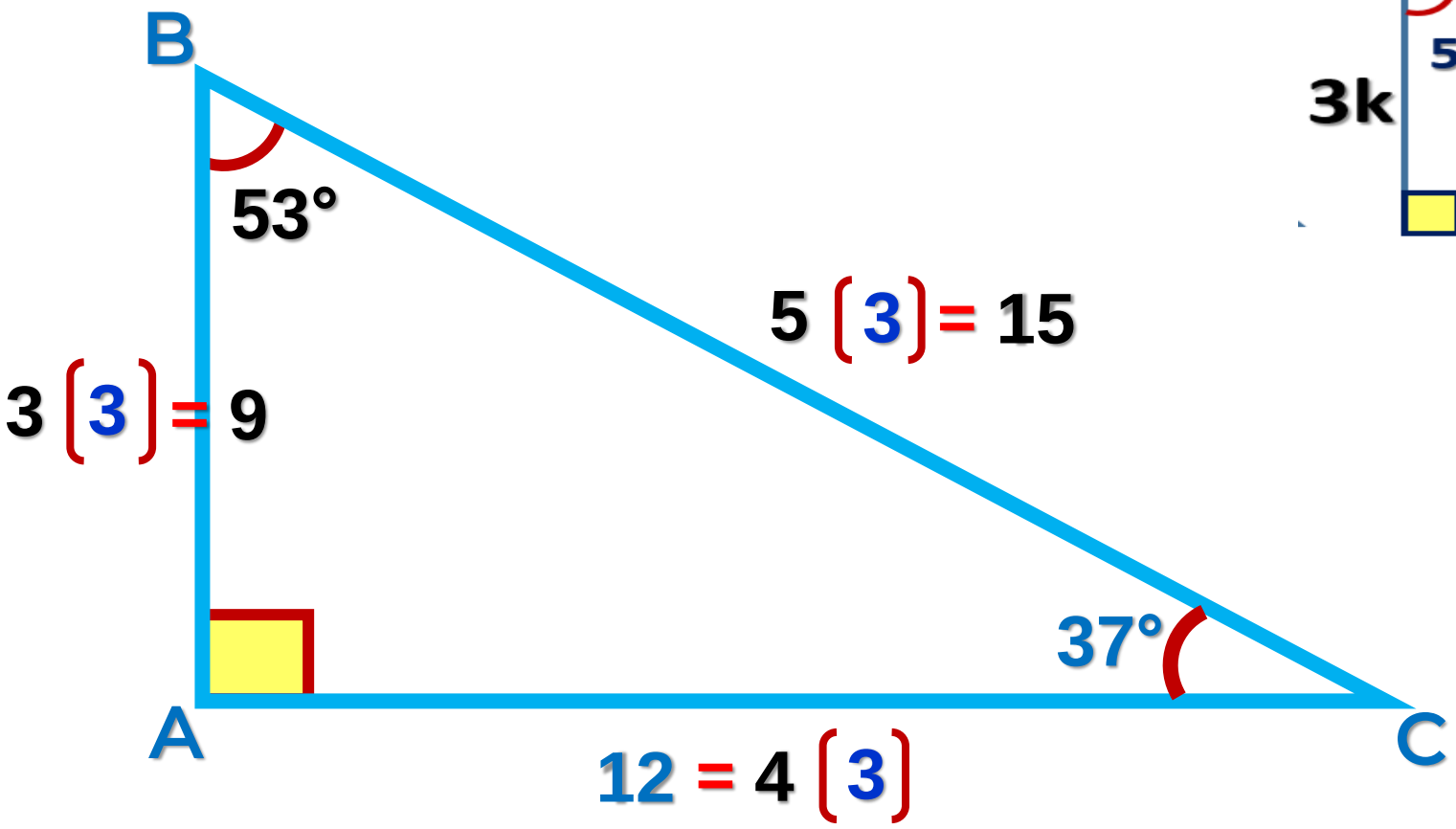
IGUALANDO

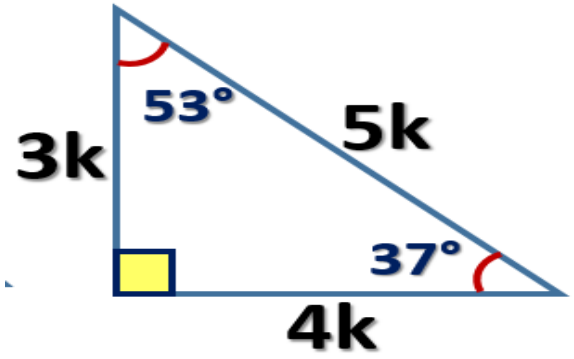
$5x + 2 = 12$

$5x = 10$

$x = 2$

6. En el gráfico, halle el perímetro de la escuadra mostrada.



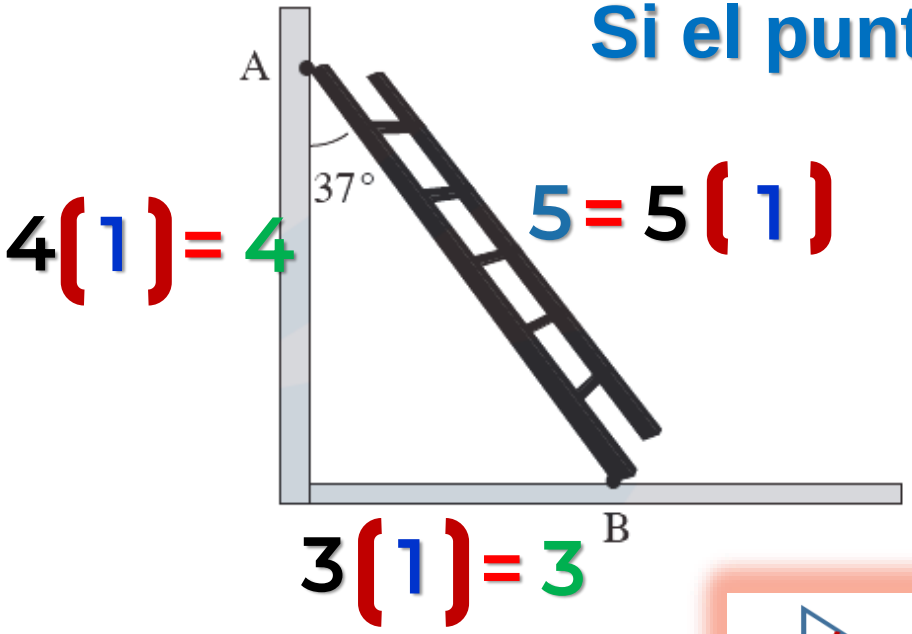


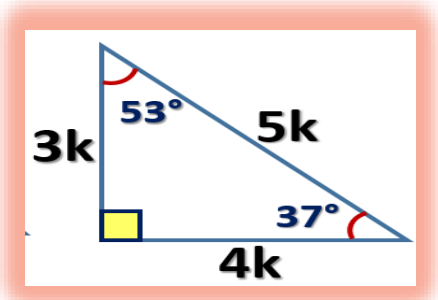
$2p_{ABC} = 9 + 15 + 12$

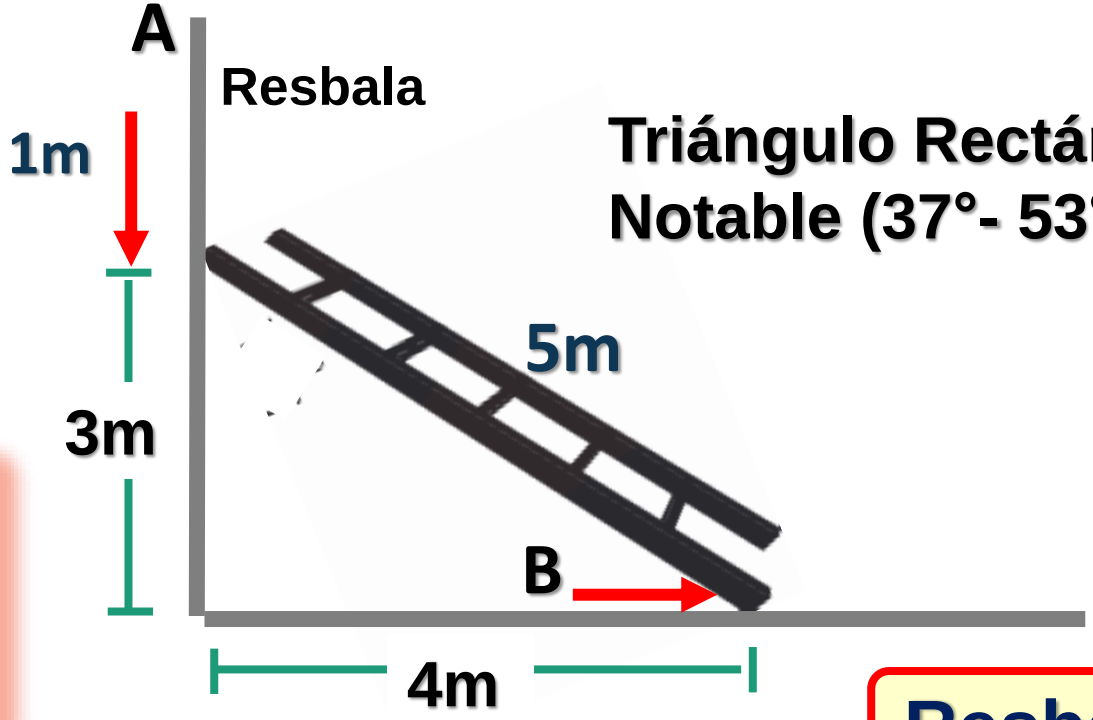
$2p_{ABC} = 36cm$

7. En la figura se muestra una escalera de 5 m, apoyada sobre una pared.

Si el punto A resbala 1 m, ¿cuánto resbala el punto B?







Triángulo Rectángulo Notable (37°- 53°)

Resbala 1 m