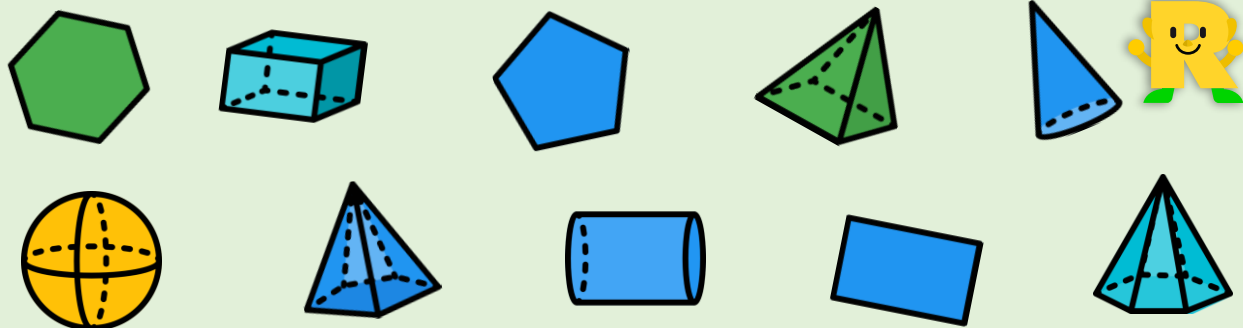
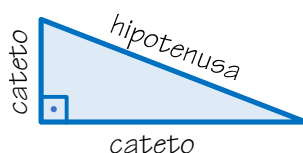




ÁREAS y VOLÚMENES

En un **triángulo rectángulo**, los lados menores, que forman el ángulo recto, se llaman **catetos**; y el lado mayor, que se encuentra enfrente al ángulo recto, es la **hipotenusa**.

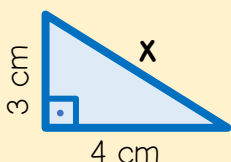


Teorema de Pitágoras

$$h^2 = a^2 + b^2$$

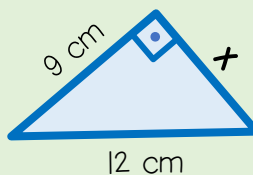
El cuadrado de la hipotenusa (**h**) coincide con la suma de los cuadrados de los catetos (**a** y **b**).

CÁLCULO DE LA HIPOTENUSA



$$\begin{aligned} x^2 &= 3^2 + 4^2 \\ x^2 &= 9 + 16 \\ x^2 &= 25 \\ x &= \sqrt{25} = 5 \end{aligned}$$

CÁLCULO DE UN CATETO



$$\begin{aligned} 12^2 &= 9^2 + x^2 \\ 144 &= 81 + x^2 \\ x^2 &= 144 - 81 \\ x^2 &= 63 \\ x &= \sqrt{63} \approx 7,9 \end{aligned}$$

@recursosep

TEOREMA DE
PITÁGORAS

CUADRADO



$$A = l^2$$

$$P = 4 \cdot l$$

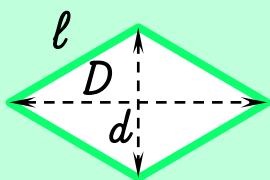
RECTÁNGULO



$$A = l \cdot h$$

$$P = 2 \cdot l + 2 \cdot h$$

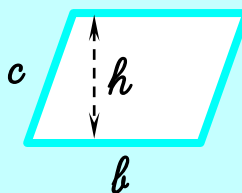
ROMBO



$$P = 4 \cdot l$$

$$A = \frac{D \cdot d}{2}$$

ROMBOIDE



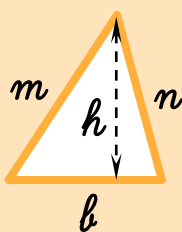
$$A = l \cdot h$$

$$P = 2 \cdot l + 2 \cdot c$$

@recursossep

FIGURAS PLANAS

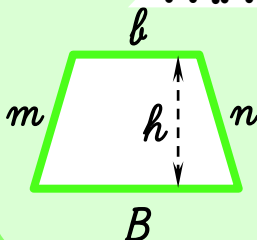
TRIÁNGULO



$$A = \frac{l \cdot h}{2}$$

$$P = l + m + n$$

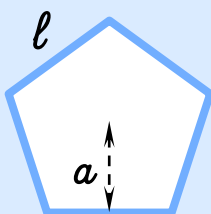
TRAPECIO



$$P = B + b + m + n$$

$$A = \frac{(B + b) \cdot h}{2}$$

POLÍGONO REGULAR

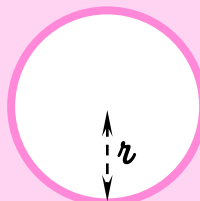


$$P = k \cdot l$$

k es el número de lados

$$A = \frac{P \cdot a}{2}$$

CÍRCULO

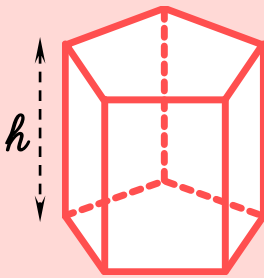


$$P = 2 \cdot \pi \cdot r$$

$$A = \pi \cdot r^2$$

@recursossep

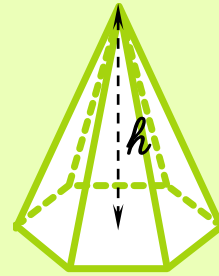
PRISMA



$$V = A_B \cdot h$$

$$A_T = 2 \cdot A_B + A_L$$

PIRÁMIDE



$$V = \frac{A_B \cdot h}{3}$$

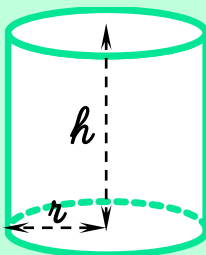
$$A_T = A_B + A_L$$

@recursosep



CUERPOS GEOMÉTRICOS

CILINDRO



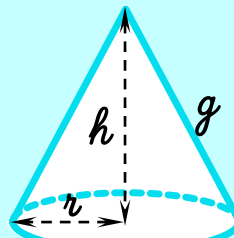
$$V = A_B \cdot h$$

$$A_B = \pi \cdot r^2$$

$$A_T = 2 \cdot A_B + A_L$$

$$A_L = 2 \cdot \pi \cdot r \cdot h$$

CONO



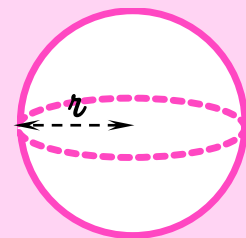
$$V = \frac{A_B \cdot h}{3}$$

$$A_B = \pi \cdot r^2$$

$$A_T = A_B + A_L$$

$$A_L = \pi \cdot r \cdot g$$

ESFERA



$$V = \frac{4}{3} \cdot \pi \cdot r^3$$

$$A = 4 \cdot \pi \cdot r^2$$

@recursosep

