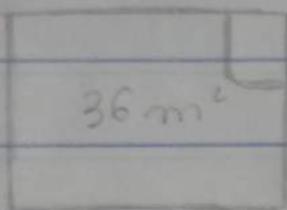


# Tarefa Básica

## ÁREAS DE QUADRILÁTEROS E TRIÂNGULOS

①



$l$

Área = ?



$l$

Perímetro = ?

- A) Área de cada peço e do pelo rágão da área da sala pela  
quantidade de peços:

$$A = \frac{400}{36} \rightarrow A = 0,09 \text{ m}^2$$

- B) Sabendo o lado de cada peço através da área:

B) Sabendo o lado de cada pçõ através da área:

$$A = l^2$$

$$0,09 = l^2$$

$$l = \sqrt{0,09} = 0,3 \rightarrow \text{calcula-se o perímetro:}$$

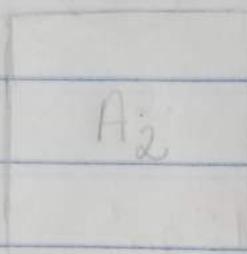
$$P = 4 \cdot 0,3 = 1,2 \text{ m}$$

②



$$x$$

$$A_1 = x^2$$



$$y$$

$$A_2 = y^2$$

→ é dobro de  $A_1$

$$A_2 = 2A_1$$

$$y^2 = 2 \cdot x^2$$

$$y = \sqrt{2x^2}$$

$$y = x\sqrt{2} \rightarrow y = \sqrt{2} \cdot x$$

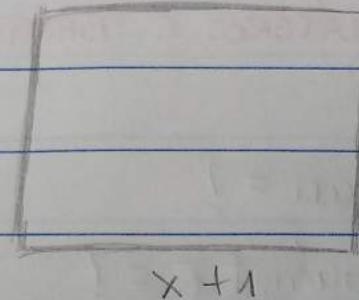
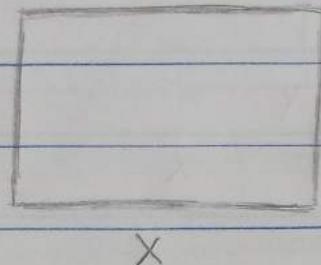
Alternativa D)

$$\begin{array}{c}
 \text{Diagram of a rectangle with width } x \text{ and height } y. \\
 A_1 = x^2 \\
 A_2 = y^2
 \end{array}
 \quad
 \begin{array}{l}
 y = \sqrt{2}x \\
 y = x\sqrt{2} \rightarrow y = \sqrt{2}x \\
 \text{Alternative D})
 \end{array}$$

③

$$\begin{array}{l}
 A = \frac{a \cdot h}{2} \\
 15 = \frac{10 \cdot x}{2} \\
 10x = 30
 \end{array}
 \quad
 \begin{array}{l}
 x = \frac{30}{10} \\
 x = 3 \\
 \text{Alternative D})
 \end{array}$$

④



$$A = b \cdot h$$

$$A = b \cdot h$$

$$A = x \cdot (x-3)$$

$$A = (x+1) \cdot (x-2) + 16$$

$$(x+1) \cdot (x-2) = (x \cdot (x-3)) + 16$$

$$x^2 - 2x + x - 2 = x^2 - 3x + 16$$

$$x^2 - x^2 - x + 3x = 16 + 2$$

$$2x = 18$$

$$x = 18 \div 2$$

$$(x+1) \cdot (x-2) = A$$

$$(9+1) \cdot (9-2) = A$$

$$A = 80$$

$$A = 80 \text{ m}^2$$

$$(x+1) \cdot (x-2) = (x)(x-3) + 16$$

$$x^2 - 2x + x - 2 = x^2 - 3x + 16$$

$$x^2 - x^2 - x + 3x = 16 + 2$$

$$2x = 18$$

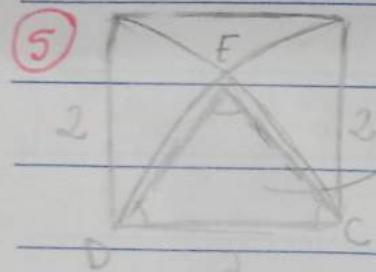
$$x = \frac{18}{2} = 9 \text{ m}$$

$$(x+1) \cdot (x-2) = A$$

$$(9+1) \cdot (9-2) = A$$

$$A = 40 \text{ m}^2$$

$$A = 40 \text{ m}^2$$



► triângulo equilátero

$\overline{DE}$ ,  $\overline{CE}$  e  $\overline{CD}$  medem 2, são os raios dos arcos

$$A_D = 2^2 \sqrt{3}$$

$$A_D = \frac{1}{4} \sqrt{3} = \frac{\sqrt{3}}{4}$$

=  $\sqrt{3}$  alternativa B)

A 25m B

6

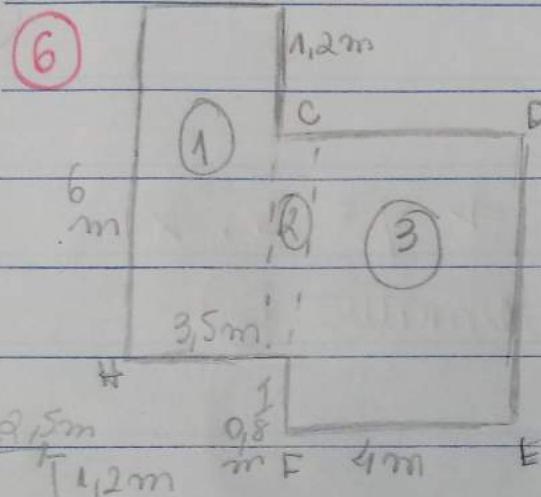
$$A_1 = 6 \cdot 1.2 \cdot 1 = 15 \text{ m}^2$$

$$A_2 = 1.8 \cdot 1 = 1.8 \text{ m}^2$$

$$n_2 = n_1 - c = 22 - 1 = 21$$

$$\frac{H_{\Delta} - 2 - 13}{4} \quad H_{\Delta} = \frac{113}{4} = (13) \text{ Alternative B)$$

A 25m B



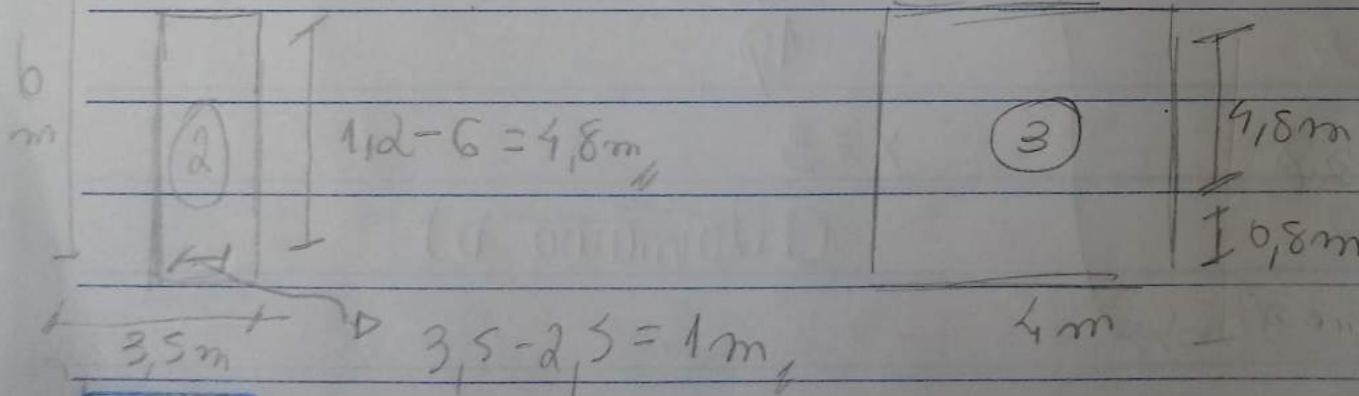
$$A_1 = 6 \cdot 2,5 = 15 \text{ m}^2$$

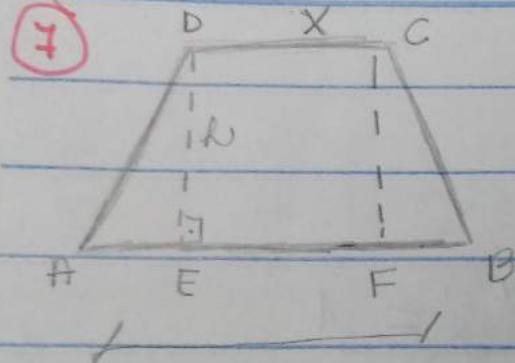
$$A_2 = 1,8 \cdot 1 = 1,8 \text{ m}^2$$

$$A_3 = 1 \cdot 5,6 = 22,4 \text{ m}^2$$

$$A_{\text{total}} = 15 + 1,8 + 22,4 = 42,2 \text{ m}^2$$

(Alternative E)





$$AB = 2CD \quad A_D = 36 \text{ cm}^2$$

$$AB = 2x$$

$$CD = x$$

$$2x$$

$$A = (2x+x) \cdot h$$

2

$$36 = 3x \cdot h$$

~~2~~

$$18 = 3x \cdot h$$

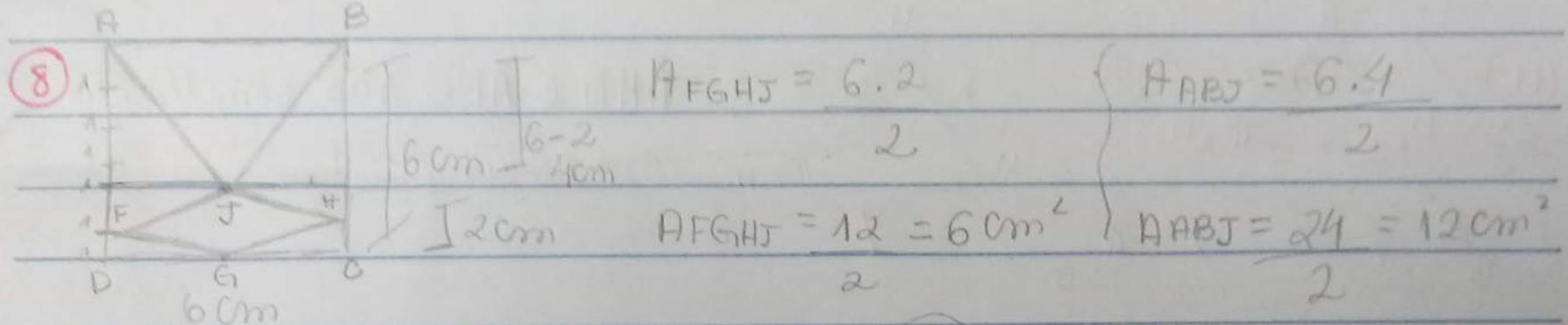
$$x \cdot h = \frac{18}{3}$$

3

$$\rightarrow x \cdot h = 24 \text{ cm}^2$$

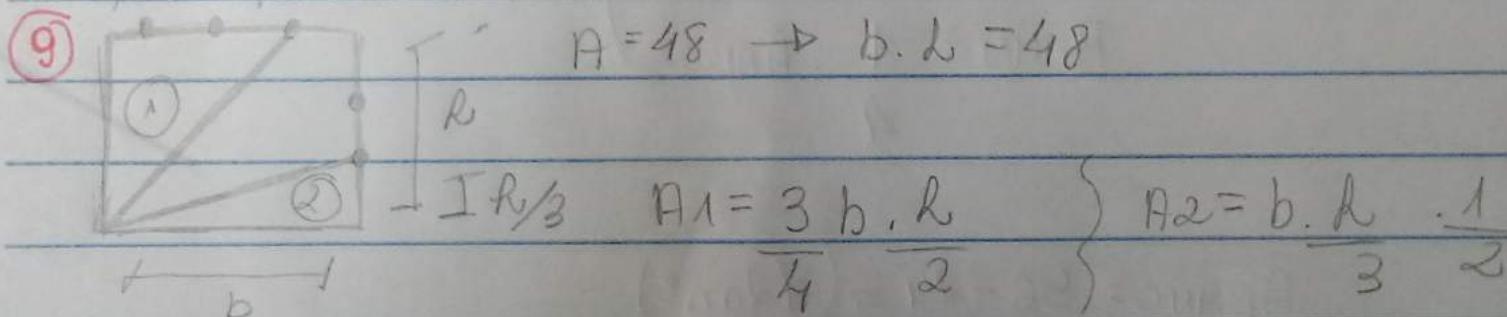
Alternativa

E)



$$\frac{A_{FGH}}{A_{ABJ}} = \frac{6}{12} = \frac{1}{2}$$

(alternativa D)



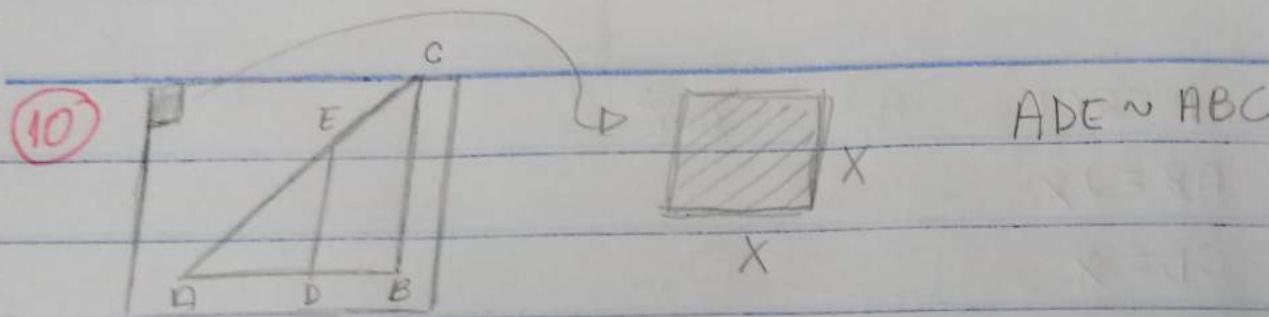
$$A_{\text{quadrilatero}} = 48 - \frac{3}{4} b \cdot h - b \cdot h \cdot \frac{1}{2}$$

$$A_q = 48 - \frac{3}{8} \cdot 48 - \frac{48}{6}$$

$$A_q = 48 - 18 - 8 \quad (22) \quad (\text{alternativa E})$$

111

10



$$\triangle ADE \sim \triangle ABC$$

$$\frac{8}{AB} = \frac{(AD)^2}{A_{\triangle ADE}}$$

equivalente

$$\frac{8}{AB} = \frac{A_{\triangle ADE}}{A_{\triangle ABC}}$$

$$\frac{AD^2}{64} = \frac{1}{2}$$

$$2AD^2 = 64$$

$$AD^2 = \frac{64}{2}$$

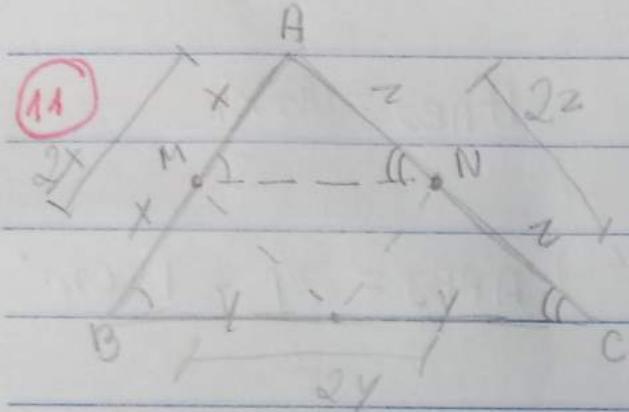
$$\frac{AD^2}{64} = \frac{1}{2} \cdot \frac{A_{\triangle ABC}}{A_{\triangle ABC}}$$

$$AD = \sqrt{32}$$

$$A = 4\sqrt{2}$$

Alternativa A)

alternativa A)



AMN e ABC não são semelhantes  
com razão  $\rightarrow \frac{1}{2}$

$$\frac{A_{AMN}}{A_{ABC}} = \left(\frac{1}{2}\right)^2 \Rightarrow A_{AMN} = \frac{96}{4}$$

$$A_{AMN} = 24 \text{ m}^2$$

$$A_{AMN} = \frac{1}{4} \cdot A_{ABC}$$

$$A_{BMNC} = 96 - 24 = 72 \text{ m}^2$$