

Tarefa Básica - Triângulos

1. $x = 60^\circ + 50^\circ = 110$

alternativa c

2. $3x + 4x + 5x = 180^\circ$

$$12x = 180^\circ$$

$$x = \frac{180^\circ}{12} = 15^\circ$$

12

alternativa e

3.
$$\begin{cases} 40 + y + z = 180 \\ x + y + z = 180 \cdot (-2) \end{cases}$$

$$\begin{cases} 40 + y + z = 180 \\ -2x - y - z = 360 \end{cases}$$

$$40 - 2x = 180 - 360$$

$$-2x = -180 - 40$$

$$-2x = -220$$

$$x = \frac{-220}{-2} = 110^\circ$$

-2

alternativa d

4. ABD: $x < 3 + 2 \rightarrow x < 5$

BCD: $x < 5 + 2 \rightarrow x < 7$

($4 < 5$ e $4 < 7$)

alternativa e

$$\begin{aligned}
 5. \quad & 30 < x + y \\
 & 16 < y + z \\
 & 18 < x + z \\
 & 30 + 16 + 18 < x + x + y + y + z + z \\
 & 64 < 2x + 2y + 2z \quad (\div 2) \\
 & 32 < x + y + z \\
 & \hat{A} = 33
 \end{aligned}$$

alternativa e

$$\begin{aligned}
 6. \quad & x + x + 130 = 180 \\
 & 2x = 180 - 130 \\
 & x = \frac{50}{2} = 25^\circ \rightarrow \hat{A}
 \end{aligned}$$

$$\hat{C} = 90 + 25^\circ = 115^\circ$$

$$\begin{aligned}
 25^\circ + 115^\circ + y &= 180^\circ \\
 y &= 180 - 140 = 40^\circ \rightarrow \hat{B} \\
 R &= 25^\circ, 40^\circ \text{ e } 115^\circ
 \end{aligned}$$

$$\begin{aligned}
 7. \quad & 20^\circ + \alpha + 105^\circ = 180^\circ \\
 & \alpha = 180 - 125 = 55^\circ
 \end{aligned}$$

$$\begin{aligned}
 \hat{Z} &= \alpha + 75^\circ \\
 \hat{Z} &= 55 + 75 = 130^\circ
 \end{aligned}$$

$$\begin{aligned}
 75^\circ + 75^\circ + \hat{x} &= 180^\circ \\
 \hat{x} &= 180^\circ - 150 = 30^\circ
 \end{aligned}$$

$$\begin{aligned}
 8. \quad & 20^\circ 10' = x + x \\
 & 20^\circ 10' = 2x \\
 & x = (20^\circ 10') : 2 \\
 & x = 10^\circ 5'
 \end{aligned}$$

alternativa b

$$9. x + 90^\circ + 35^\circ = 180$$

$$x = 180 - 125$$

$$x = 55^\circ$$

$$\triangle 55^\circ + 90^\circ + y = 180$$

$$y = 180 - 145^\circ$$

$$y = 35^\circ$$