

Tarefa básica - Triângulos

1. $y = 180 - (60 + 50) \Rightarrow 80 - 110 - y = 70$

$$x = 360 - (y + z) / 2 \Rightarrow 360 - (70 + 70) / 2$$

$$x = \frac{360 - 140}{2} = \frac{220}{2} = 110^\circ$$

$$x = 110^\circ \quad (C)$$

2. $3x + 4x + 5x = 180$

$$12x = 180 \quad (E)$$

$$x = 180 / 12 = 15^\circ$$

3. $B + C = 180^\circ - 40^\circ = 140^\circ$

$$I + 70^\circ = 180^\circ \quad (D)$$

$$I = 180 - 70$$

$$(B + C) = \frac{140^\circ}{2} = 70^\circ$$

$$I = 110^\circ$$

4. ABD: $2 + 3 > x > 3 - 2$

$$5 > x > 1$$

$$3 < x < 5 \quad (E)$$

BCD: $2 + 5 > x > 5 - 2$

$$7 > x > 3$$

$$x = 4^\circ$$

5. $30 < x + y$

$$18 < x + z$$

$$16 < y + z$$

$$64 < 2x + 2y + 2z = 30 < x + y + z = 33^\circ \quad (E)$$

6. BCD: 90°

ADC: 130°

$$BDC: 180 - 130 = 50^\circ$$

$$DBC: 140 - 180 = 40^\circ$$

$$CAD = ADC = 180 - 130 = 50^\circ$$

$$2$$

$$2$$

$$B = 40^\circ$$

$$A = 25^\circ$$

$$C = 115^\circ$$

$$7 \quad y = 20^\circ \quad x = 105^\circ$$

$$xkz = 180 - 105 = 75^\circ$$

$$\heartsuit \quad yzk: 180 - 125 = 55^\circ$$

$$z = 55^\circ + 75^\circ = 130^\circ //$$

$$x = 180 - 150 = 30^\circ //$$

$$8. \quad a + 2b = 180^\circ$$

(2)

$$20^\circ 10' = 2b: \quad a = 180 - 20^\circ 10'$$

$$b = 10^\circ 5' //$$

$$a = 180 - 2b$$

$$180^\circ = 179^\circ 60'$$

$$a = 179^\circ 50'$$

$$9. \quad \angle EDB: 180^\circ - 10^\circ - 90^\circ = 80^\circ$$

$$\angle CDB: 180^\circ - 80^\circ = 100^\circ$$

$$\angle DBC: 45^\circ$$

$$\angle DCB: 180^\circ - 100^\circ - 45^\circ = 35^\circ //$$

$$\angle CAB: 180 - 90 - 35 = 55^\circ //$$