Exercícios

01- $\overline{AB} \cdot \overline{AB} = \overline{AC} \cdot \overline{AD}$

$8 \cdot 8 = x \cdot (x+x)$

$64 = x^2 + x^2$

$64 = 2x^2$

$x^2 = 32$

$x = \sqrt{32}$

$x = 4\sqrt{2}$

(E)

32	2
16	2
8	2
4	2
2	2
1	

$4\sqrt{2}$

02- $PA = 3PC$

$PA \cdot PA = PC \cdot PB$

$3PC \cdot 3PC = PC \cdot PB$

$9PC^2 = PC \cdot PB$

$\frac{9PC^2}{PC} = PB$

$PB = 9PC$

(B)

03- $\overline{AB} \cdot (\overline{AB} + d) = \overline{AT}^2$

$x \cdot (x+5) = 6^2$

$x^2 + 5x - 36 = 0$

$r = 2,5 \quad d = 2,5 \cdot 2 = 5$

$\Delta = 25 - 4 \cdot 1 \cdot (-36)$

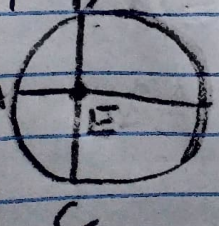
$\Delta = 25 + 144 = 169$

$x_1 = \frac{-5+13}{2} = 4$

$x_2 = \frac{-5-13}{2} = -9$

(E)

04-



$\overline{CD} = \overline{DE} + \overline{EC}$

$\overline{DE} = \overline{EC}$

(B)

$\overline{AE} \cdot \overline{EB} = \overline{DE} \cdot \overline{EC}$

$\overline{AE} \cdot \overline{EB} = \overline{EC}^2$

$3 = \overline{EC}^2$

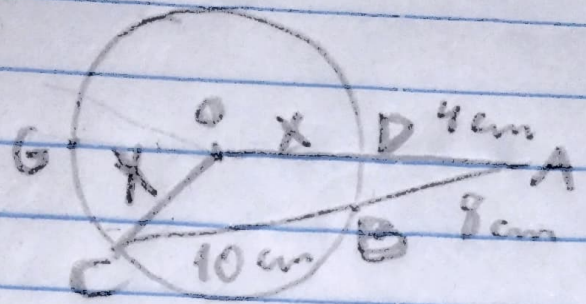
$\overline{EC} = \sqrt{3}$

$\overline{CD} = \overline{DE} + \overline{EC}$

$\overline{CD} = \sqrt{3} + \sqrt{3}$

$\overline{CD} = 2\sqrt{3}$

05-



$\overline{AB} \cdot \overline{AC} = \overline{AD} \cdot \overline{AG}$

$8 \cdot 18 = 4 \cdot (4 + 2x)$

$144 = 16 + 8x$

$128 = 8x$

$x = 16$

$P = 16 + 16 + 4 + 8 + 10$

$P = 54$

(E)