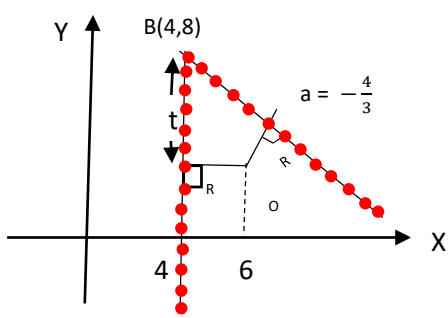


Circle and target



O is the center of the circle
O(6,2)

$$B(4,8) \quad a = -\frac{4}{3}$$

$$\text{The target equation} \Rightarrow y - 8 = -\frac{4}{3}(x - 4)$$

$$3(y - 8) + 4(x - 4) = 0$$

$$\frac{4x + 3y - 40}{+5} = 0$$

O(6,2) the center

$$R = \left| \frac{6 \cdot 4 + 3 \cdot 2 - 40}{5} \right| = 2$$

$$\text{The circle equation } (x - 6)^2 + (y - 2)^2 = 4$$

$$t^2 = (4 - 6)^2 + (8 - 2)^2 - 4 = 36 \Rightarrow t = 6$$

$$(BO) \Rightarrow a = \frac{8-2}{4-6} = \frac{6}{-2} = -3$$

The equation of target (vertical) is

$$X = 4$$