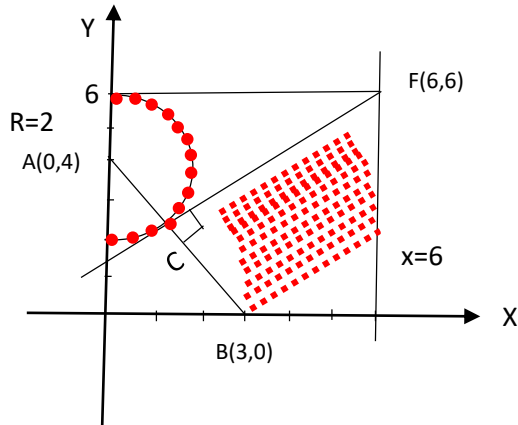


## Circle and square



(0,4) is the center of a circle

R=2 the equation is

$$x^2 + (y - 4)^2 = 4, \text{ FC is Target}$$

$$\sphericalangle C = 90^\circ$$

$$a_{AB} = \frac{4}{0-3}, \quad a_{CF} = \frac{3}{4} \quad (a_1 a_2 = -1)$$

$$\text{The target} \Rightarrow F(6,6) \quad \frac{3}{4} \quad y - 6 = \frac{3}{4}(x - 6)$$

$$y - 6 = \frac{3}{4}x - \frac{9}{2} \Rightarrow y = \frac{3}{4}x + \frac{3}{2}$$

second circle, the center B(3,0)

$$\frac{\frac{3}{4}x - y + \frac{3}{2}}{\frac{5}{4}} = 0$$

$$R = \frac{\frac{9}{4} - 0 + \frac{3}{2}}{\frac{5}{4}} = \frac{15}{5} = 3$$

$$B(3,0) \quad R = 3$$

$$\text{The equation of the circle} \Rightarrow (x - 3)^2 + y^2 = 9$$