**Zadatak 13.** Napiši jednadžbu pravca koji prolazi točkom $T(2,2)$, a s pozitivnim dijelom osi apscisa zatvara dvostruko veći kut od pravca $y = 3x + 4$.

***Rješenje.***

$$a \ \ldots \ T(\overset{x_1}{2}, \overset{x_2}{2}), \ \ 2\alpha, \ \ k_a$$

$$b \ \ldots \ y = 3x + 4, \ \ \alpha \implies \operatorname{tg}\alpha = 3 = k_b$$

$$\operatorname{tg} 2\alpha = \frac{2\operatorname{tg}\alpha}{1 - \operatorname{tg}^2\alpha} = \frac{2 \cdot 3}{1 - 9} = \frac{6}{-8} = -\frac{3}{4}$$

$$\implies k_a = -\frac{3}{4}$$

$$b \ \ldots \ y - y_1 = k_a(x - x_1)$$

$$y - 2 = -\frac{3}{4}(x - 2)$$

$$y - 2 = -\frac{3}{4}x + \frac{3}{2} \quad / \cdot 4$$

$$4y - 8 = -3x + 6$$

$$b \ \ldots \ 3x + 4y - 14 = 0$$