

۲۵ اکثرون!

کارن جادوسی قرار یازدهم ۱۳

$$m_1 = -\frac{1}{m_2}$$

$$m_1 m_2 = -\frac{1}{1} \rightarrow m_1 = 3$$

$$y = 3x + b \xrightarrow{\text{نقطه}} b = -1$$

$$y = 3x - 1$$

$$m = \tan \theta = \tan \frac{\pi}{3} \rightarrow \tan \theta = \sqrt{3}$$

$$y = \sqrt{3}x + b \xrightarrow{\text{نقطه}} b = 2 - 4\sqrt{3}$$

$$y = \sqrt{3}x + 2 - 4\sqrt{3}$$

(ج)

$$m = \frac{\Delta y}{\Delta x} \rightarrow \frac{1}{1} = -4$$

$$y = -4x + b \xrightarrow{\text{نقطه}} b = 11$$

$$y = -4x + 11$$

$$m = m' \rightarrow m' = -\frac{4}{1} = -4$$

$$y = -4x + b \xrightarrow{\text{نقطه}} b = 14$$

$$y = -4x + 14$$

(۲) انت

$$d = \sqrt{(5x)^2 + (5y)^2} \rightarrow d = \sqrt{9 + 14} = \sqrt{23}$$

$$d = \left| \frac{ax + by + c}{\sqrt{a^2 + b^2}} \right| \rightarrow d = \left| \frac{4 + 12 - 2}{\sqrt{20}} \right| \rightarrow \frac{14}{2} = 7$$

از این دو خط میانی این دو خط را داریم

$$\begin{cases} 2x + 3y = 1 \\ 2x + 3y = 2 \end{cases}$$

این دو خط موازی هستند و فاصله بین آن دو خط را داریم

$$\frac{2x + 3y = 1}{2x + 3y = 2} \xrightarrow{\div 2} 2x + 3y = 1$$

$$\left| \frac{c - c'}{\sqrt{a^2 + b^2}} \right| \rightarrow \left| \frac{12 - 2}{\sqrt{13}} \right| \rightarrow \frac{10}{\sqrt{13}}$$

$$\left| \frac{ax + by + c}{\sqrt{a^2 + b^2}} \right| = \left| \frac{ax + by + c'}{\sqrt{a^2 + b^2}} \right| \rightarrow \left| \frac{2x - 2y - 1}{\sqrt{13}} \right| = \left| \frac{2x + 3y - 2}{\sqrt{13}} \right|$$

$$2x - 2y - 1 = 2x + 3y - 2 \rightarrow -2y - 1 = 3y - 2 \rightarrow -5y = -1 \rightarrow y = \frac{1}{5}$$

$$2x - 2y - 1 = 2x + 3y - 2 \rightarrow 2x - 2y - 1 = 2x + 3y - 2 \rightarrow -2y - 1 = 3y - 2 \rightarrow -5y = -1 \rightarrow y = \frac{1}{5}$$

$$\tan \theta = \left| \frac{m_1 - m_2}{1 + m_1 m_2} \right|$$

$$y = 2x \rightarrow m = 2$$

$$y = 3x \rightarrow m = 3$$

$$\left| \frac{2 - 3}{1 + (2)(3)} \right| \rightarrow \frac{1}{7}$$

$$\tan \theta = 1$$

این دو خط موازی است یا خیر؟

٢) الف

(✓)

(۷) الف

(2)

$$g_s = \frac{1 - \rho_u}{\rho_u + 1}$$

(۹) (۲)

(✓)

(1.

②

15.