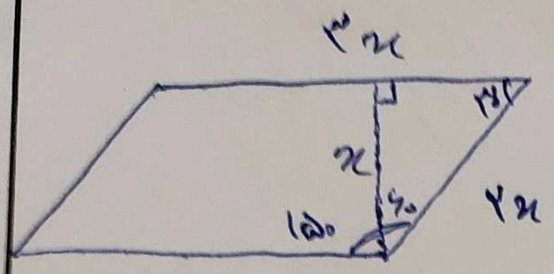
نام و نام خانوادگی .....امیرعلی متصدی..... پاسخنامه تشریحی تکلیف شماره ۲۶..... کلاس ..یازدهم تجربی A.....

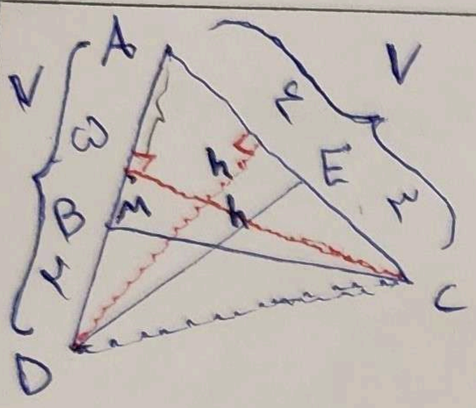


$S = x \times 3x = 54 \Rightarrow 3x^2 = 54 \Rightarrow x^2 = 18 \Rightarrow$ [illegible]

$2x = 6\sqrt{2}$ ، $3x = 9\sqrt{2}$

$P = 2(6\sqrt{2} + 9\sqrt{2}) = 30\sqrt{2}$

۵ — $-3\sqrt{2}$ ✗ ، $+3\sqrt{2}$ ✓ — ۱



$\hat{D} = \hat{C}$

$S_{ABC} - S_{ADE} = 17.5$ $\quad \frac{AB \times h}{2} - \frac{AE \times h}{2} = 17.5$

$\frac{5 \times h}{2} - \frac{6 \times h}{2} = 17.5 \Rightarrow \frac{h}{2} = 17.5 \rightarrow h = 35$

AMC : $\sin A = \frac{1}{2} \Rightarrow \cos = \frac{\sqrt{3}}{2}$

$\tan = \frac{\frac{1}{2}}{\frac{\sqrt{3}}{6}} = \frac{1}{\sqrt{3}} = \frac{\sqrt{3}}{3} \Rightarrow \tan 30^\circ$

۲

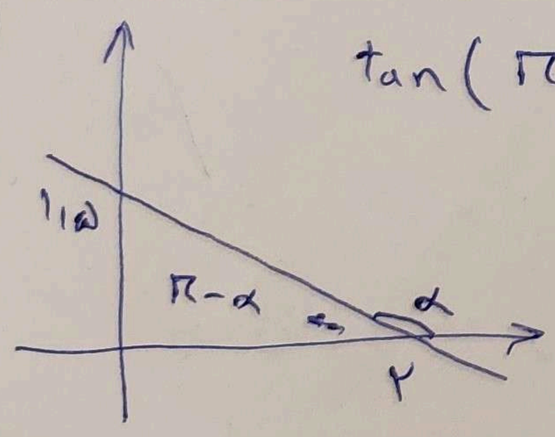
(I) $\frac{|\sin x|}{\cos x} = (-)\frac{1}{\cot x}$ $\quad \pi < \sin x < 2\pi$ ربع ۳ و ۴

(II) $\frac{1}{|\cos x|} - \frac{\sin x}{\cos} \cdot \frac{(1 - \sin x)}{|\cos x|}$ $\quad -\frac{\pi}{2} < \cos < \frac{\pi}{2}$ ربع اول و چهارم

ثابت بماند

ربع چهارم = I ∪ II

۳



$\tan(\pi - \alpha) = \frac{11\Omega}{2} = \frac{33}{6} \Rightarrow -\tan\alpha = \frac{33}{6} \Rightarrow \tan\alpha = -\frac{33}{6}$

$\tan\left(\frac{5\pi}{2} - \alpha\right) = \cot\alpha \Rightarrow -\frac{6}{33}$

۴

$$\frac{2\cos\left(\frac{3\pi}{2} - 22\right) - 2\sin(\pi - 22)}{\sin(\pi + 22) - \cos\left(\frac{3\pi}{2} + 22\right)} = \frac{-3\sin 22 - 2\sin 22}{-\sin 22 - \sin 22} = \frac{-5\sin 22}{-2\sin 22} = \frac{5}{2}$$

$2\cos\left(\frac{3\pi}{2} - 22\right) \Rightarrow -3\sin 22$

$\cos\left(\frac{3\pi}{2} + 22\right) \Rightarrow \sin 22$

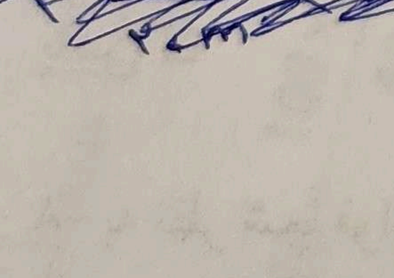
$\cos\alpha = \frac{2}{\sqrt{9}} \Rightarrow \sin^2\alpha - \cos^2\alpha = 1 \Rightarrow \sin^2\alpha = \frac{5}{9} \rightarrow \sin\alpha = \frac{\sqrt{5}}{3}$

$\tan\alpha = \frac{\sqrt{5}/3}{2/3} = \frac{\sqrt{5}}{2}$ صورت و مخرج سه $\xrightarrow{\text{صورت و مخرج سه}}$ $\frac{\cos\alpha + \sin\alpha}{|\tan^2\alpha - 1|} = \frac{\frac{2+\sqrt{5}}{3}}{|1 - \frac{1}{4}|} = \frac{4(2+\sqrt{5})}{3}$ ۶

$\sin\alpha = 2\cos\alpha \xrightarrow{\div\cos\alpha} \tan\alpha = 2$ $\quad 1 + \tan^2 = \frac{1}{\cos^2} \Rightarrow \omega = \frac{1}{\cos^2}$

$\cos^2 = \frac{1}{\omega} \rightarrow \cos\alpha = \rightarrow \sqrt{\frac{1}{\omega}}$ ✓

$\searrow -\sqrt{\frac{1}{\omega}}$ ✓ $\Rightarrow -\frac{1}{\sqrt{\omega}}$ ۷



$2mx + (m^2-1)y = 2$

$\begin{cases} y = \frac{-2mx}{m^2-1} + \frac{2}{m^2-1} \\ \tan\alpha = \sqrt{3} \end{cases}$

$\frac{-2m}{m^2-1} = \sqrt{3} \Rightarrow \sqrt{3}m^2 - \sqrt{3} = -2m$

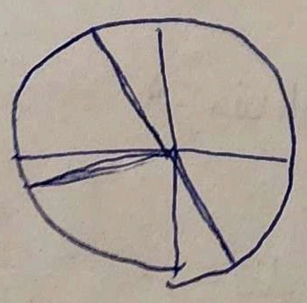
$\sqrt{3}m^2 + 2m - \sqrt{3} = 0$

$m = \frac{-2 \pm \sqrt{\frac{2}{\sqrt{3}}}}{4}$ ۸

$\frac{-\pi}{4} < \alpha < \frac{\pi}{4} \rightarrow -\frac{\pi}{4} < -\alpha < \frac{\pi}{4} \rightarrow 0 < \frac{\pi}{2} - \alpha < \frac{\pi}{2} \rightarrow 0 < \tan(\frac{\pi}{4} - \alpha) < \infty$

$0 < \frac{1-m}{2+m} < \infty$

$-2 < m < 1$ ۹



$\tan(300) = -\sqrt{3}$

$\cos(210) = -\frac{\sqrt{3}}{2}$

$\tan(810) \Rightarrow \tan(120) = -\sqrt{3}$

$\sin(1830) \Rightarrow \sin(120) = \frac{\sqrt{3}}{2}$

$-\sqrt{2} \times \frac{-\sqrt{3}}{2} = \frac{3}{2}$

$-\sqrt{2} \times \frac{\sqrt{3}}{2} = \frac{-3}{2}$

$\frac{3}{2} + (-\frac{3}{2}) = 0$ ۱۰