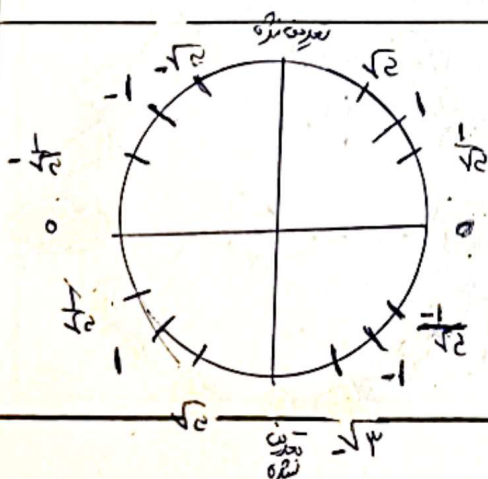
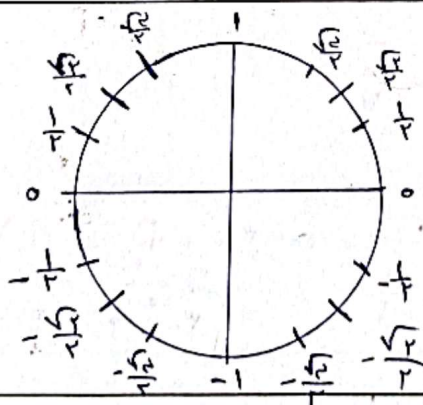
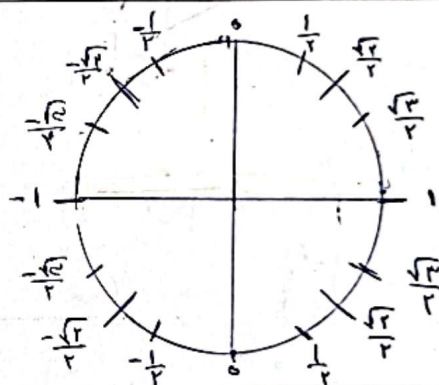
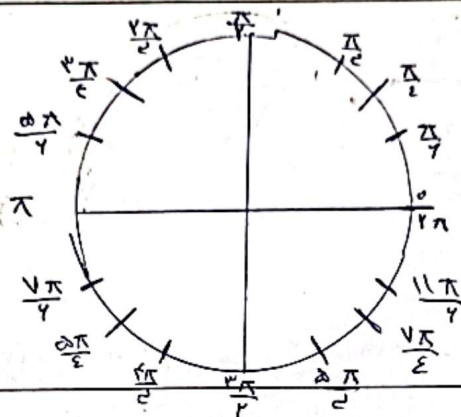
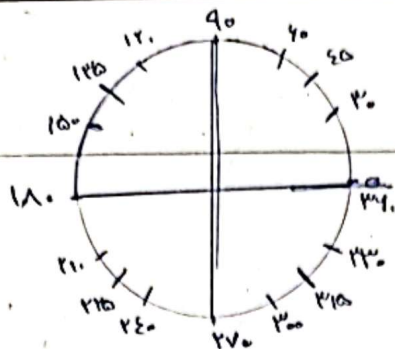


نام و نام خانوادگی کلاس شماره پاسخنامه تشریحی تکلیف شماره ۲ کلاس ۱۳۰۰ - ۱۳۰۱

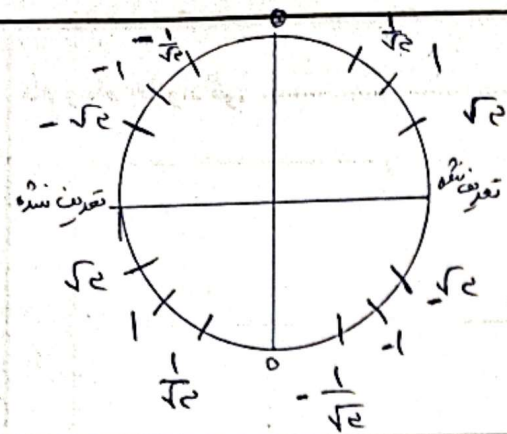


$$\tan = \frac{\sin}{\cos}$$

$$-1 \frac{1}{2} = -1.5$$

$$\frac{\frac{1}{\sqrt{2}}}{\frac{1}{\sqrt{2}}} = \sqrt{2}$$

$$-\frac{1}{2} \quad , \quad -\frac{1}{2} \sqrt{\frac{2}{2}}$$

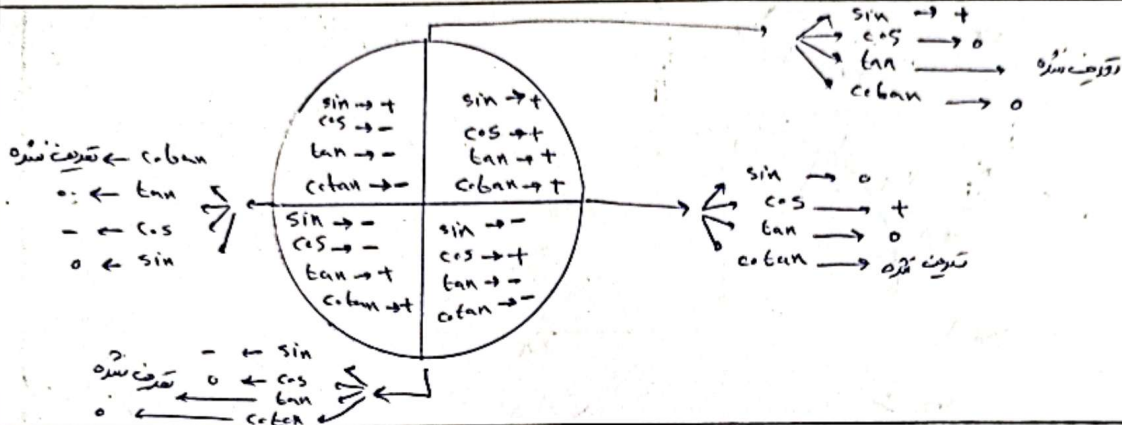


$$\cotan = \frac{\cos}{\sin}$$

$$\frac{\sqrt{2}}{1} = \sqrt{2}$$

$$\frac{1}{\frac{1}{\sqrt{2}}} = \sqrt{2}$$

$$\frac{\frac{1}{\sqrt{2}}}{\frac{1}{\sqrt{2}}} = 1$$



$$120^\circ \rightarrow y \rightarrow \left| -\frac{1}{\sqrt{2}} \right| \Rightarrow \sin = \frac{\sqrt{2}}{2} \rightarrow \sin 45^\circ = \frac{\sqrt{2}}{2}$$

45° = (الف)

$$150^\circ \rightarrow x \rightarrow \left| -\frac{\sqrt{2}}{2} \right| \Rightarrow \cos = \frac{\sqrt{2}}{2} \rightarrow \cos 45^\circ = \frac{\sqrt{2}}{2}$$

45° = (ب)

$$330^\circ \rightarrow x \rightarrow \left| \frac{\sqrt{2}}{2} \right| \Rightarrow \tan = \frac{\sin}{\cos} = \frac{-\frac{1}{\sqrt{2}}}{\frac{\sqrt{2}}{2}} = -1 \rightarrow \tan 45^\circ = 1$$

45° = (ج)

$$135^\circ \rightarrow \left| \frac{\sqrt{2}}{2} \right| \Rightarrow \cotan = \frac{\cos}{\sin} = \frac{-\frac{\sqrt{2}}{2}}{\frac{\sqrt{2}}{2}} = -1 \rightarrow \cotan 45^\circ = 1$$

45° = (د)

$$\frac{\pi}{2} \rightarrow 90^\circ \quad 120^\circ \left| -\frac{1}{\sqrt{2}} \right| \Rightarrow \cos 120^\circ = -\frac{1}{2} \rightarrow -(-\frac{1}{2}) = \frac{1}{2} = \sin 30^\circ$$

(الف)

$$30^\circ \rightarrow \frac{\pi}{6} \quad 15^\circ \rightarrow \frac{\pi}{12}$$

$$\frac{11\pi}{4} \rightarrow 330^\circ \quad 330^\circ \left| \frac{\sqrt{2}}{2} \right| \Rightarrow \cos 330^\circ = \frac{\sqrt{2}}{2} \rightarrow -(\frac{\sqrt{2}}{2}) = \sin 150^\circ$$

(ب)

$$300^\circ \rightarrow \frac{5\pi}{3} \quad 150^\circ \rightarrow \frac{5\pi}{6}$$

$$\frac{4\pi}{3} = 240^\circ \quad 240^\circ \left| \frac{\sqrt{2}}{2} \right| \Rightarrow \cotan = \frac{\cos}{\sin} = -1 = \cotan 135^\circ$$

(الف)

$$135^\circ$$

$$15^\circ \rightarrow x \rightarrow 15^\circ \left| \frac{\sqrt{2}}{2} \right| \Rightarrow \cos = \frac{\sqrt{2}}{2} \rightarrow -(\frac{\sqrt{2}}{2}) = \sin 75^\circ$$

(ب)

$$12^\circ, 4^\circ$$