

Algunas soluciones- hasta ej.5

(1)

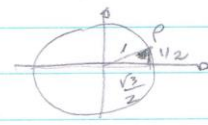
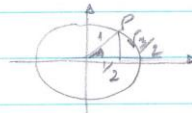
Tarea 1

$4 \hat{O}P$	0	30	45	60	90	120	135	150	180	225	270	300	360
$\hat{A}P$	0	$\frac{\pi}{6}$	$\frac{\pi}{4}$	$\frac{\pi}{3}$	$\frac{\pi}{2}$	$\frac{2\pi}{3}$	$\frac{3\pi}{4}$	$\frac{5\pi}{6}$	π	$\frac{5\pi}{4}$	$\frac{3\pi}{2}$	$\frac{5\pi}{3}$	2π

$180 + 45 = \pi + \frac{\pi}{4} = \frac{5\pi}{4}$
 $\frac{\pi}{6} + \frac{2\pi}{3} = \frac{\pi + 4\pi}{6} = \frac{5\pi}{6}$

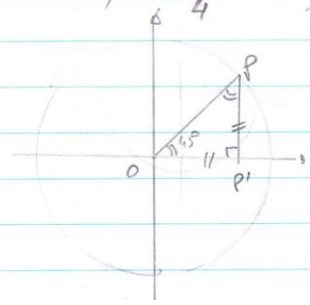
- Tarea 2**
- a) $\left[\frac{180 - \pi}{x - 1} \right] \quad x = 57^\circ 19' 44,81''$
- b) $\frac{180 - \pi}{1 - x} \quad x \approx 0,0745$

- Tarea 3**
- a) A (1,0) , B (0,1) C (-1,0) D (0,-1)
- b) $\overline{OP'}$
- c) $\cos \frac{\pi}{3} = \frac{1}{2}$
- d) $\overline{PP'}$
- e) $\sec \frac{\pi}{6} = \frac{2}{\sqrt{3}}$
- f) -1 y 1
- g) -1 y 1



- Tarea 4**
- $\overline{OP'} = \cos \alpha$
 $\overline{PP'} = \sec \alpha$
 $\hat{O}PP'$ rect. en P'
- $\left. \begin{array}{l} \text{---} \\ \text{+} \cdot \downarrow \\ \text{Pit.} \end{array} \right\} \cos^2 \alpha + \sec^2 \alpha = 1$

- Tarea 5**
- a) $\sec \frac{\pi}{4} = \cos \frac{\pi}{4} = \frac{\sqrt{2}}{2}$
- $\hat{O}PP'$ es isósce y rectáng. \therefore por el T. de Pit.
- $(\sec \frac{\pi}{4})^2 + (\cos \frac{\pi}{4})^2 = 1^2$
- $2 \sec^2 \frac{\pi}{4} = 1$
- $\sec \frac{\pi}{4} = \pm \sqrt{\frac{1}{2}} = \frac{1}{\sqrt{2}} = \frac{\sqrt{2}}{2}$



$$b) \cos \frac{\pi}{6} = \frac{\sqrt{3}}{2}$$

$$\left(\sin \frac{\pi}{6}\right)^2 + \left(\cos \frac{\pi}{6}\right)^2 = 1$$

$$\frac{1}{4} + \cos^2 \frac{\pi}{6} = 1$$

$$\cos \frac{\pi}{6} = \sqrt{1 - \frac{1}{4}} = \sqrt{\frac{3}{4}} = \frac{\sqrt{3}}{2}$$

segmento

$$c) \sec \frac{\pi}{3} = \frac{2}{\sqrt{3}}$$

$$\sec^2 \frac{\pi}{3} + \cos^2 \frac{\pi}{3} = 1$$

$$\sec^2 \frac{\pi}{3} + \frac{1}{4} = 1 \quad \dots \rightarrow \sec \frac{\pi}{3} = \frac{2}{\sqrt{3}}$$