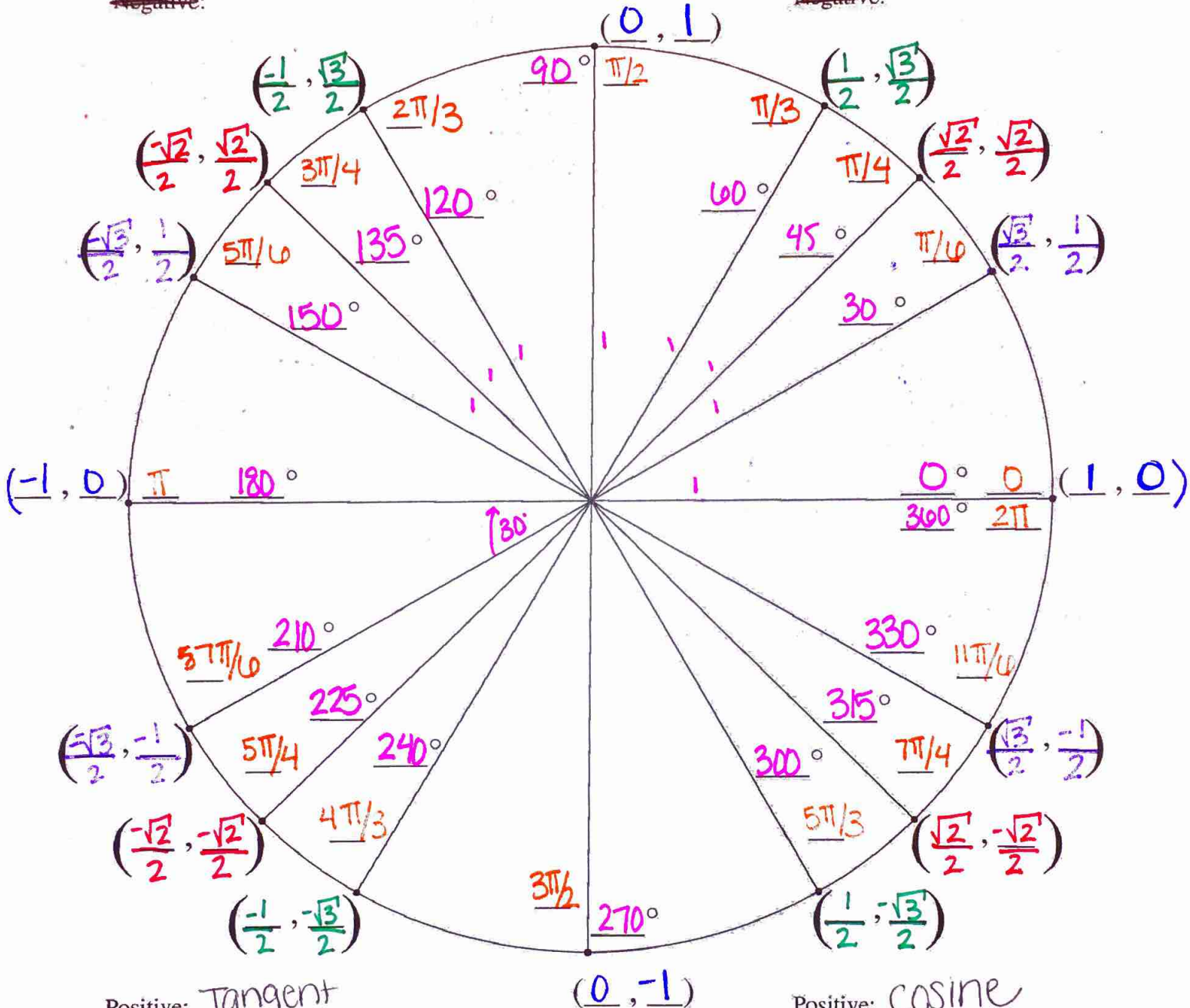


circle w/ a center (0,0)  
r=1

# Fill in The Unit Circle

Positive: sine  
Negative:

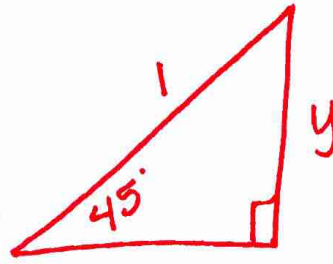
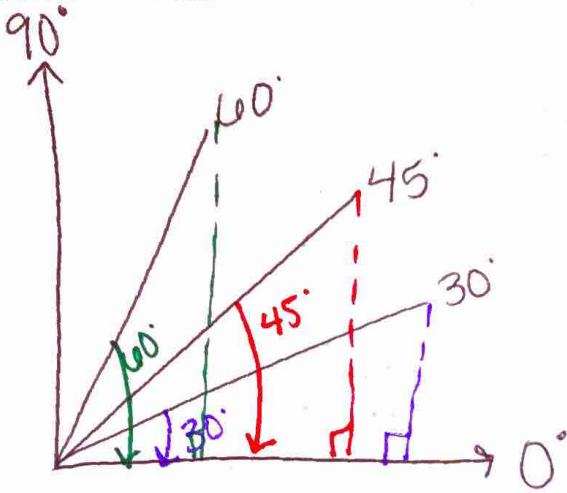
Positive: All  $\cos \sim x$   
Negative:  $\sin \sim y$



Positive: Tangent  
Negative:  
↓ sine & cosine

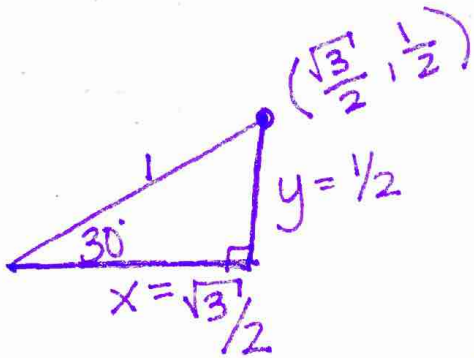
Positive: cosine  
Negative:

# Quadrant I



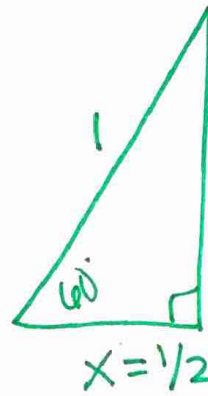
$$x = \frac{\sqrt{2}}{2}$$
$$y = \frac{\sqrt{2}}{2}$$

$$\sin 45^\circ = \frac{\frac{\sqrt{2}}{2}}{1} = \frac{\sqrt{2}}{2}$$
$$\cos 45^\circ = \frac{\frac{\sqrt{2}}{2}}{1} = \frac{\sqrt{2}}{2}$$



$$\sin 30^\circ = \frac{1/2}{1} = 1/2$$

$$\cos 30^\circ = \frac{\frac{\sqrt{3}}{2}}{1} = \frac{\sqrt{3}}{2}$$



$$\sin 60^\circ = \frac{\frac{\sqrt{3}}{2}}{1} = \frac{\sqrt{3}}{2}$$
$$\cos 60^\circ = \frac{1/2}{1} = 1/2$$