

# Unit Circle Worksheet A

Name \_\_\_\_\_

Period \_\_\_\_\_

Solve the following problems using your Unit Circle.

1)  $\sin(90^\circ) =$

2)  $\cos\left(\frac{\pi}{4}\right) =$

3)  $\sin\left(\frac{5\pi}{4}\right) =$

4)  $\cos 135^\circ =$

5)  $\tan\left(\frac{5\pi}{4}\right) =$

6)  $\tan(180^\circ) =$

7)  $\sin\left(\frac{-\pi}{4}\right) =$

8)  $\cos -90^\circ =$

## Unit Circle Worksheet B

Name \_\_\_\_\_

Period \_\_\_\_\_

Solve the following problems using your Unit Circle.

1)  $\sin(150^\circ) =$

2)  $\cos\left(\frac{7\pi}{6}\right) =$

3)  $\sin\left(\frac{5\pi}{6}\right) =$

4)  $\cos -135^\circ =$

5)  $\tan\left(\frac{9\pi}{6}\right) =$

6)  $\tan(135^\circ) =$

7)  $\sin\left(\frac{-\pi}{3}\right) =$

8)  $\cos -120^\circ =$

# Unit Circle Worksheet C

Name \_\_\_\_\_

Period \_\_\_\_\_

The given point P is located on the Unit Circle. State the quadrant and find the angle  $\theta$ , also  $\sin \theta$ ,  $\cos \theta$  and  $\tan \theta$ .

1)  $P\left(-\frac{1}{2}, \frac{\sqrt{3}}{2}\right)$

Quad:

$\sin \theta$ :

$\cos \theta$ :

$\tan \theta$ :

2)  $P(0, -1)$

Quad:

$\sin \theta$ :

$\cos \theta$ :

$\tan \theta$ :

3)  $P\left(\frac{-\sqrt{2}}{2}, \frac{-\sqrt{2}}{2}\right)$

Quad:

$\sin \theta$ :

$\cos \theta$ :

$\tan \theta$ :

Find the exact value of each function.

4)  $\cos\left(\frac{7\pi}{4}\right)$

5)  $\sin -30^\circ$

6)  $\sin\left(-\frac{2\pi}{3}\right)$

7)  $\cos(600^\circ)$

8)  $\sin\left(\frac{9\pi}{2}\right)$

9)  $\tan(7\pi)$

10)  $\cos\left(-\frac{11\pi}{4}\right)$

11)  $\sin -225^\circ$

12)  $\tan(585^\circ)$

13)  $\cos(1440^\circ)$

14)  $\sin\left(-\frac{13\pi}{4}\right)$

15)  $\cos\left(\frac{23\pi}{6}\right)$