

Find the amplitude, period, and phase shift by using the following formulas:

$$\text{Period} = \frac{2\pi}{\omega} \quad \omega = \text{the number in front of } \theta$$

$$\text{Phase shift} = -\frac{\theta}{\omega}$$

$$y = 5 \sin(3\theta - 5) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = 2 \sin(\theta + 1) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \sin(7\theta - 4) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = 3 \sin\left(\frac{\pi}{2}\theta\right) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \sin\left(\frac{3\pi}{2}\theta + 1\right) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \sin(\theta + 3) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \cos(\theta + 3) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \cos(4\theta - 1) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \cos\left(\frac{\pi}{4}\theta - 5\right) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

$$y = \cos(\pi\theta - 6) \quad \text{amplitude } \underline{\hspace{2cm}} \quad \text{Period } \underline{\hspace{2cm}} \quad \text{Phase Shift } \underline{\hspace{2cm}}$$

Using the unit circle find the following values:

$$\sin 240^\circ = \underline{\hspace{2cm}} \quad \sec 120^\circ = \underline{\hspace{2cm}} \quad \tan 180^\circ = \underline{\hspace{2cm}} \quad \tan 270^\circ = \underline{\hspace{2cm}}$$

$$\cos \frac{5\pi}{2} = \underline{\hspace{2cm}} \quad \cos \frac{\pi}{2} = \underline{\hspace{2cm}} \quad \csc \frac{4\pi}{3} = \underline{\hspace{2cm}} \quad \cot \frac{3\pi}{2} = \underline{\hspace{2cm}}$$