Trigonometry Review

1. **Convert the following to radian angle measures; leave your answer in terms of π, simplify all fractions.**

   a. $270°$

   c. $67°$

   b. $225°$

   d. $359°$

2. **Convert the following to degrees, round to the nearest tenth of a degree.**

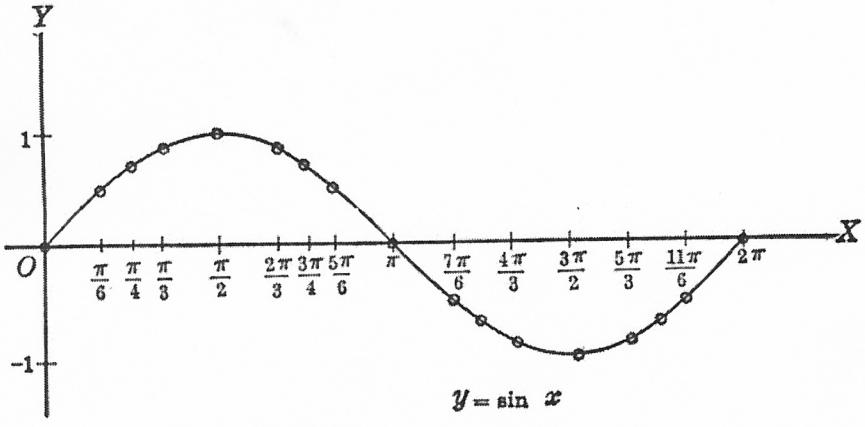
   a. $\frac{\pi}{4}$

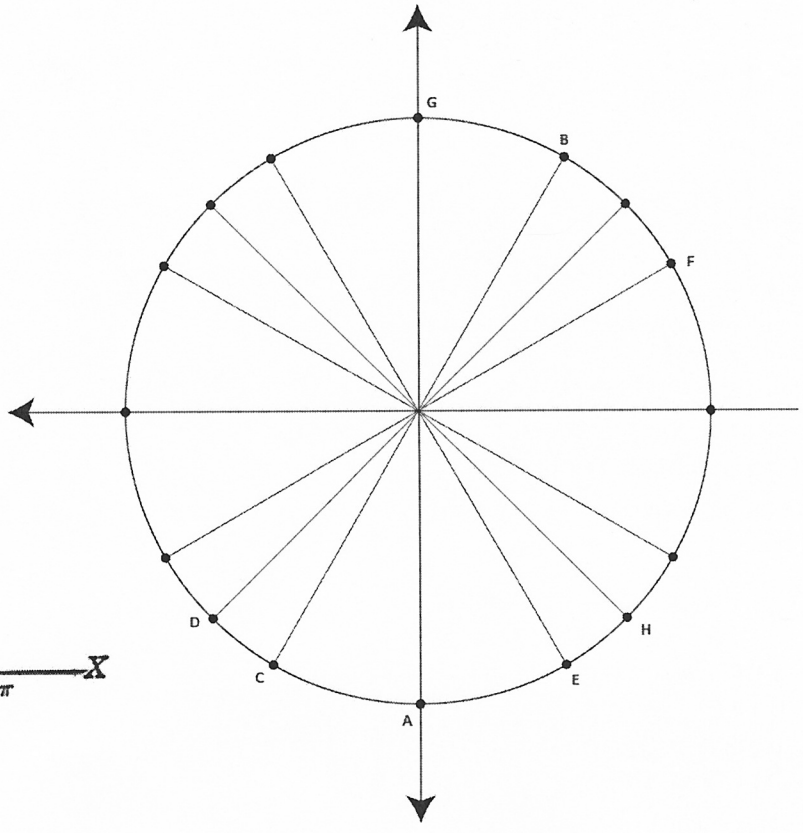
   c. $\frac{\pi}{3}$

   b. π

   d. $-\frac{7\pi}{6}$

3. **Match each point on the unit circle to a point on the graph. Label the points on the graph (A – H).**





Trigonometry Review

4. Use the equation below to answer the following questions.

$$y = \frac{1}{3}\cos\left(\frac{1}{4}x\right) + 3$$

a. Determine the amplitude of the function. How is it related to the equation?

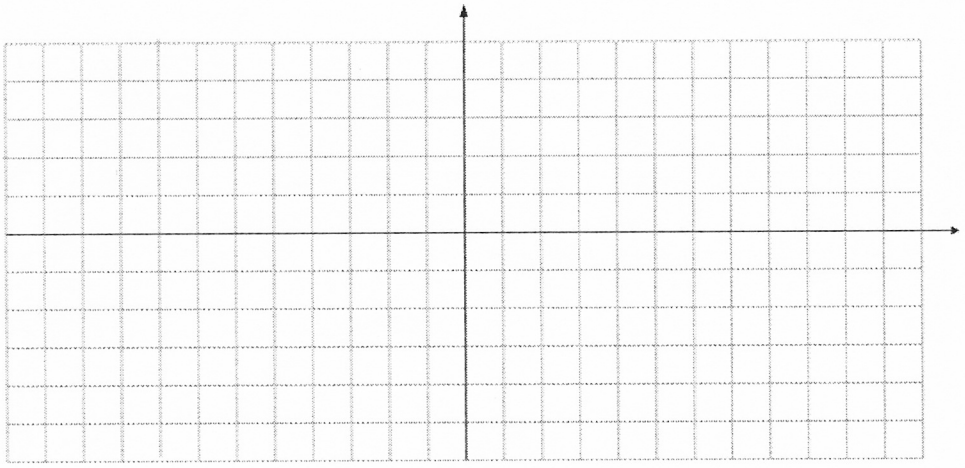
b. Determine the period of the function. How is it related to the equation?

c. Determine the midline of the function. How is it related to the equation?

d. Find the domain of the function.

e. Find the range of the function.

f. Graph at least 2 cycles of the function.



g. Mark all zeros on the graph and list them below.

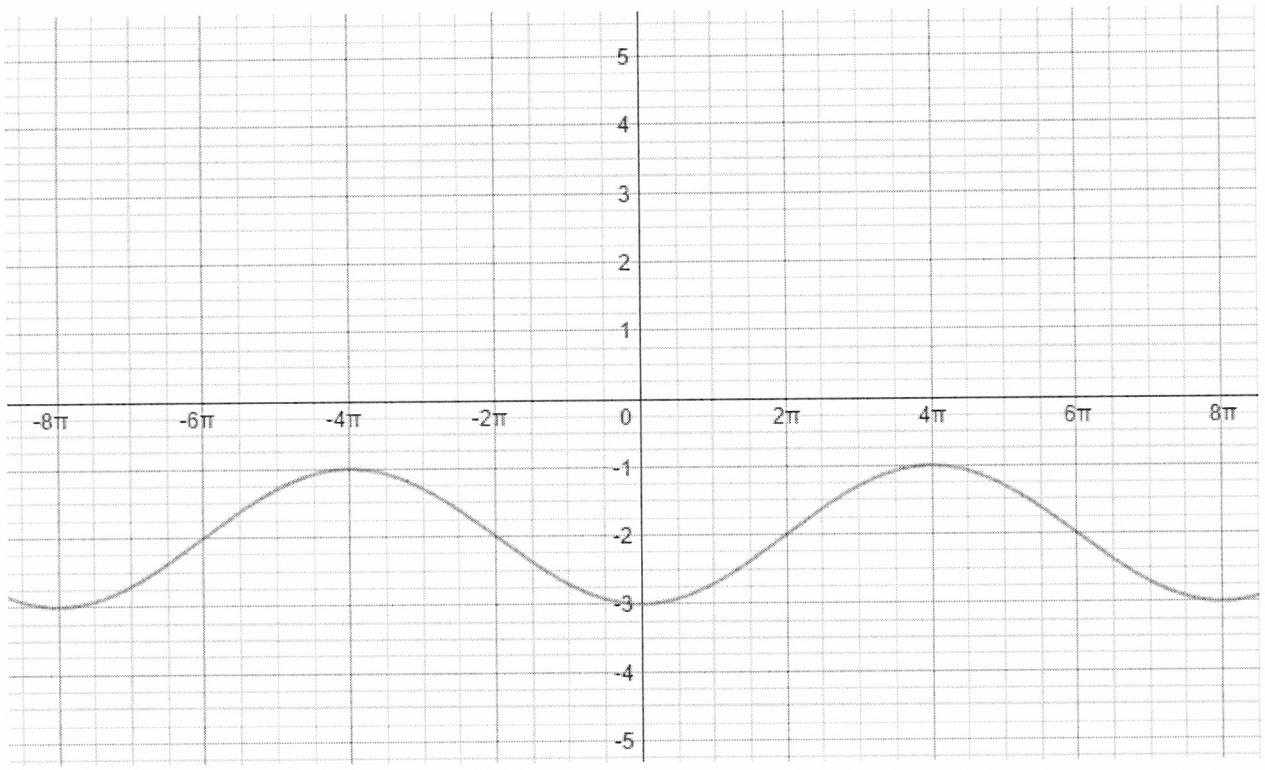
h. Mark all maximum values on the graph and list them below.

i. Mark all minimum values on the graph and list them below.

j. Describe all the transformations from $y = \cos(x)$

Trigonometry Review

5. Use the graph below to answer the following questions.



a. Trace or highlight one cycle on the graph.

b. What is the period of the graph?

c. What is the maximum?

d. What is the minimum?

e. What is the amplitude?

f. Write the equation of the graph.

Trigonometry Review

6. Complete the table below.

Quadrant	$\sin\theta$	$\cos\theta$	$\tan\theta$
3		$-\frac{7}{9}$	
4		$\frac{8}{9}$	
2	$\frac{2}{3}$		
3	$-\frac{6}{7}$		
2	$\frac{3}{5}$		
1	$\frac{3}{4}$		
2		$-\frac{9}{10}$	