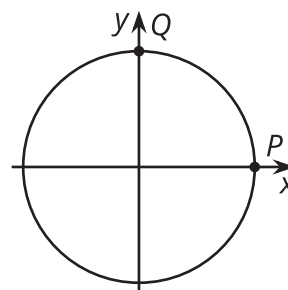
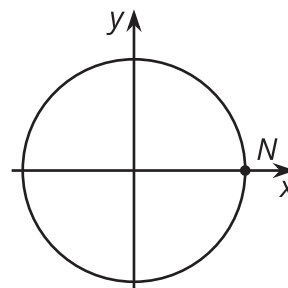


Lesson 10 Practice Problems

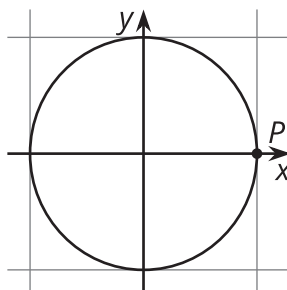
1. A rotation takes P to Q . What could be the measure of the angle of rotation in radians? Select **all** that apply.



- A. $\frac{3\pi}{2}$
- B. $\frac{\pi}{2}$
- C. $\frac{\pi}{4}$
- D. $\frac{5\pi}{2}$
- E. $\frac{5\pi}{4}$
2. a. A $\frac{2\pi}{3}$ radian rotation takes N to P . Label P .
- b. A $\frac{7\pi}{6}$ radian rotation takes N to Q . Label Q .
- c. A $\frac{25\pi}{6}$ radian rotation takes N to R . Label R .



5. Here is the unit circle with a point P at $(1, 0)$. Find the coordinates of P after the circle rotates the given amount counterclockwise around its center.

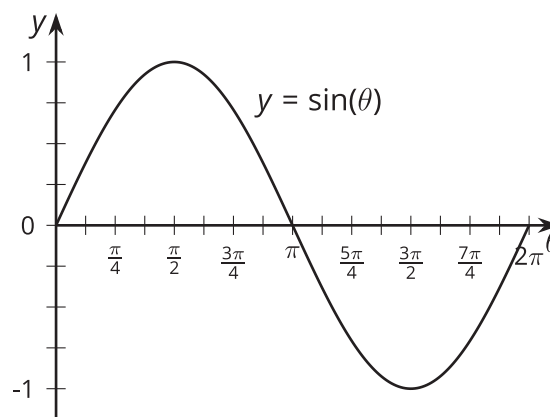


- a. $\frac{1}{3}$ of a full rotation
- b. $\frac{1}{2}$ of a full rotation
- c. $\frac{2}{3}$ of a full rotation

(From Unit 6, Lesson 4.)

6. Here is a graph of $y = \sin(\theta)$.

- a. Plot the points on the graph where $\sin(\theta) = -\frac{1}{2}$.
- b. For which angles θ does $\sin(\theta) = -\frac{1}{2}$?



(From Unit 6, Lesson 9.)