

Test Review
Module 3, Unit 6

Find a positive angle less than 360° or 2π that is coterminal with the given angle.

1. -1335°

2. $\frac{17\pi}{5}$

A point on the terminal side of angle θ is given. Find the exact value of the indicated trigonometric function of θ . Draw a triangle and label.

3. $(4, -2)$ Find $\sin \theta$.

4. $(-4, -3)$ Find $\sec \theta$.

Find the exact value of the indicated trigonometric function of θ . Draw a triangle and label.

5. $\cot \theta = -\frac{3}{2}$, $\cos \theta < 0$ Find $\csc \theta$.

6. $\cos \theta = \frac{8}{9}$, $\tan \theta < 0$ Find $\sin \theta$.

7. $\sin \theta = -\frac{2}{9}$, $\tan \theta > 0$ Find $\sec \theta$.

Find the exact value of the expression. Draw a triangle/point and label. Show all necessary work.

8. $\csc \frac{5\pi}{3}$

9. $\sin \frac{-2\pi}{3}$

10. $\tan \frac{-7\pi}{4}$

11. $\sec \frac{-5\pi}{6}$

12. $\cot \frac{5\pi}{4}$

13. $\cot \frac{-26\pi}{3}$

14. $\tan 930^\circ$

15. $\cot \frac{-\pi}{2}$

16. $\csc(-30^\circ)$

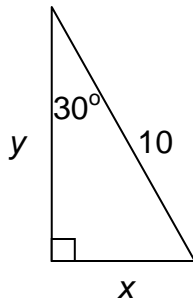
17. $\cos 660^\circ$

18. $\sec(-765^\circ)$

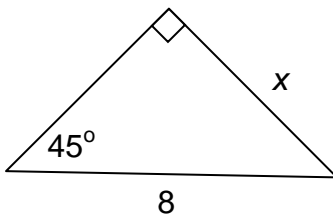
19. $\csc 900^\circ$

Solve for the missing side using special right triangles. Leave your answer in exact form.

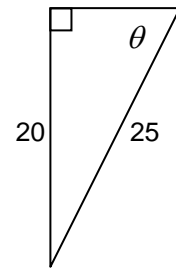
20.



21.

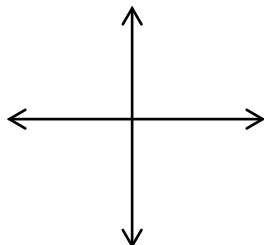


22. Find the value of each of the six trigonometric functions of θ . Show all necessary work.

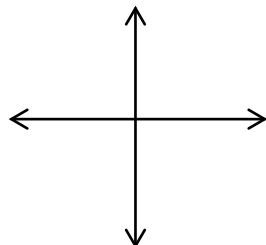


Draw and label each angle in standard position.

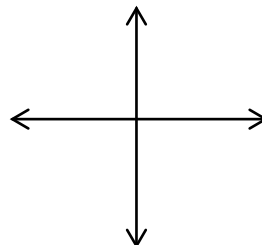
23. $\frac{3\pi}{2}$



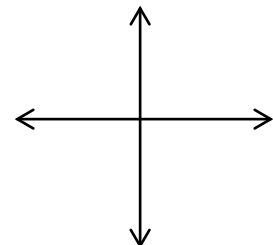
24. -240°



25. $-\frac{2\pi}{3}$



26. 585°



Answers

1. 105°

2. $\frac{7\pi}{5}$

3. $-\frac{\sqrt{5}}{5}$

4. $-\frac{5}{4}$

5. $\frac{\sqrt{13}}{2}$

6. $-\frac{\sqrt{17}}{9}$

7. $-\frac{9\sqrt{77}}{77}$

8. $\frac{-2\sqrt{3}}{3}$

9. $-\frac{\sqrt{3}}{2}$

10. 1

11. $\frac{-2\sqrt{3}}{3}$

12. 1

13. $\frac{\sqrt{3}}{3}$

14. $\frac{\sqrt{3}}{3}$

15. 0

16. -2

17. $\frac{1}{2}$

18. $\sqrt{2}$

19. undefined

20. $x = 5, y = 5\sqrt{3}$

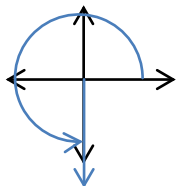
21. $4\sqrt{2}$

22. $\sin \theta = \frac{4}{5}$ $\csc \theta = \frac{5}{4}$

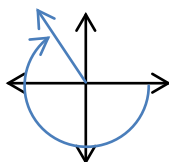
$\cos \theta = \frac{3}{5}$ $\sec \theta = \frac{5}{3}$

$\tan \theta = \frac{4}{3}$ $\cot \theta = \frac{3}{4}$

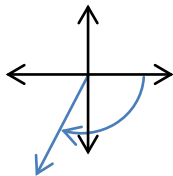
23.



24.



25.



26.

