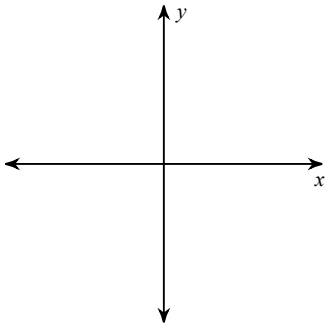
Precalculus Name_____

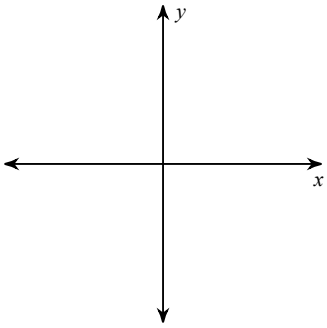
T9 Review

Draw an angle with the given measure in standard position.

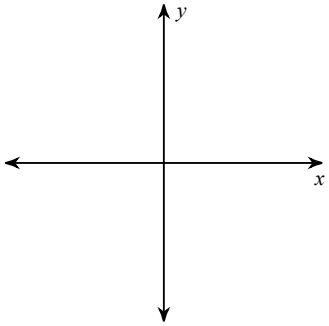
1) $290°$



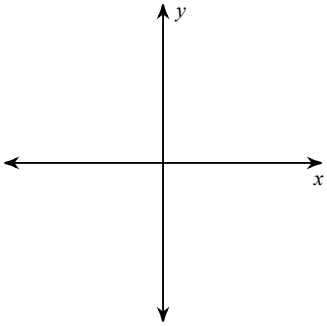
2) $-685°$



3) $-\frac{5\pi}{4}$

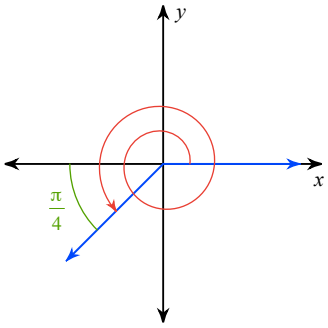


4) $\frac{49\pi}{18}$

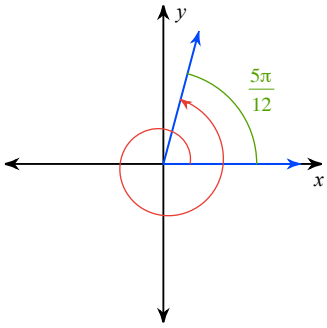


Find the measure of each angle.

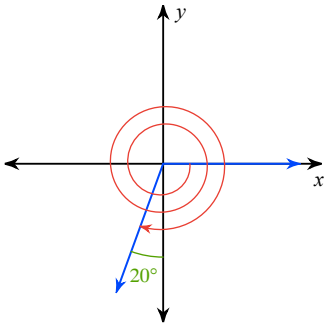
5)



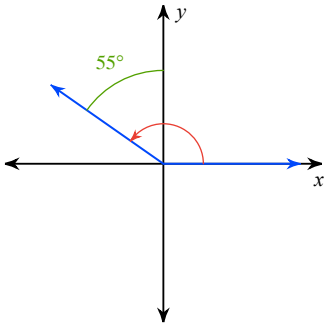
6)



7)



8)



State the quadrant in which the terminal side of each angle lies.

9) $370°$

10) $-\frac{5\pi}{4}$

Find a positive and a negative coterminal angle for each given angle.

11) $325°$

12) $-250°$

13) $\frac{19\pi}{36}$

14) $\frac{21\pi}{10}$

State if the given angles are coterminal.

15) $\frac{\pi}{9}, -\frac{17\pi}{9}$

16) $\frac{5\pi}{6}, \frac{23\pi}{6}$

17) $80°, -280°$

18) $10°, -350°$

Find a coterminal angle between 0° and 360°.

19) $615°$

Find a coterminal angle between 0 and 2π for each given angle.

20) $-\frac{8\pi}{9}$

Convert each radian measure into degrees.

21) $\frac{14\pi}{9}$

22) $-\frac{5\pi}{18}$

Convert each degree measure into radians.

23) $660°$

24) $-230°$

Using a calculator, convert each decimal degree measure into degrees-minutes-seconds.

25) $151.4725°$

26) $57.34°$

Using a calculator, convert each degrees-minutes-seconds into decimal degrees.

27) 116° 24' 54"

28) 47° 37' 3"

Without using a calculator, find the difference.

29) 63° 23' 47" and 17° 44' 55"