## **Practice 44** Supplementary Practice

Lessons 11-5, 11-6

Find the circumference and area. Leave each answer in terms of  $\pi$ .

1. 
$$r = 6$$

$$C = \frac{120}{300}$$

2. 
$$d = 10$$

$$C = 10$$

$$A = 25$$

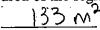
3. Find the circumference and area, correct to the nearest tenth, of a circle with diameter 4.2. Use  $\pi \approx 3.14$ .

$$C = 13.2$$
,  $A = 13.8$ 

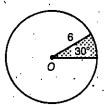
4. Find the circumference and area of a circle with radius  $1\frac{3}{11}$ . Use  $\pi \approx \frac{22}{7}$ .

5. The area of a circle is 
$$48\pi$$
. Find the circumference.  $877\sqrt{3}$ 

- 6. The area of sector AOB is  $36\pi$  and  $m \angle AOB = 40$ . Find the radius of  $\bigcirc O$ .  $\boxed{8}$
- 7. A dog's leash is tied to a post in the ground, leaving the dog free to roam over a circular region. If the leash is 6.5 m long, find the area of the region to the nearest square meter. Use  $\pi \approx 3.14$ .



In Exercises 8 and 9, O is the center of the circle. Find the arc length and area of each shaded sector.



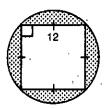
$$arc length = \frac{31}{31}$$



major arc length = 
$$\frac{811}{2000}$$

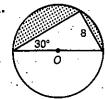
Find the area of each shaded region. In Exercise 11, O is the center of the circle.

10.



$$area = \frac{7211 - 144}{144}$$

11.



$$area = 3211 - 32\sqrt{2}$$