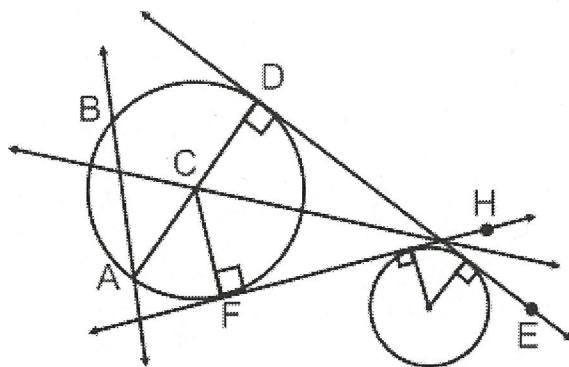


State the best term for the given figure.

1. \overline{D} E
2. \overline{FH} C
3. \overline{CD} G
4. \overline{AB} F
5. C A
6. \overline{AD} H
7. \overline{AB} B
8. \overrightarrow{DE} D



Word Bank

- A. Center
- B. Secant
- C. Common Internal Tangent
- D. Common External Tangent
- E. Point of Tangency
- F. Chord
- G. Radius
- H. Diameter
- I. Pythagorean Theorem

\overline{PR} and \overline{QS} are diameters of $\odot U$. Find the indicated measure and state whether it is a minor arc, major arc or a semicircle.

9. $m\widehat{PQ}$ 42° minor

10. $m\widehat{ST}$ 74° minor

11. $m\widehat{TPS}$ 286° major

12. $m\widehat{RT}$ 116° minor

13. $m\widehat{RQS}$ 318° major

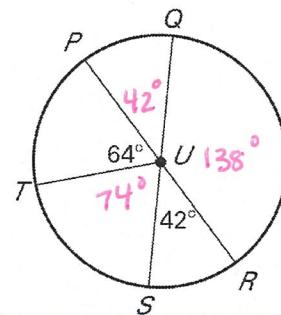
14. $m\widehat{QR}$ 138° minor

15. $m\widehat{PQS}$ 222° major

16. $m\widehat{TQR}$ 244° major

17. $m\widehat{PS}$ 138° minor

18. $m\widehat{PTR}$ 180° semi



Write the equation of the circle with the given information.

19.

Center: $(3, -1)$

A point on the circle: $(-1, -4)$

$$(x-3)^2 + (y+1)^2 = 25$$

20.

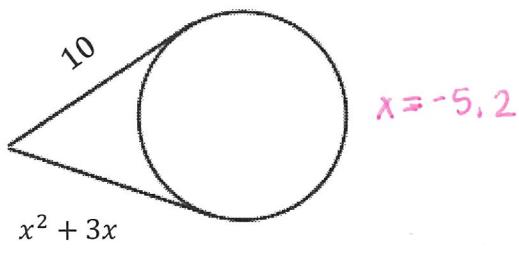
Center: $(-4, 3)$

A point on the circle: $(-2, 8)$

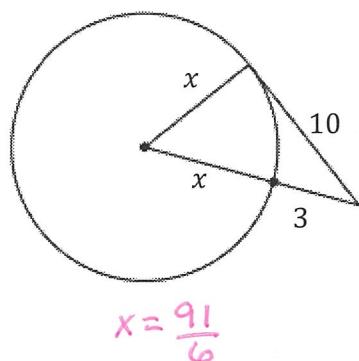
$$(y+4)^2 + (x-3)^2 = 29$$

Find the value of x . All lines that appear to be tangents are.

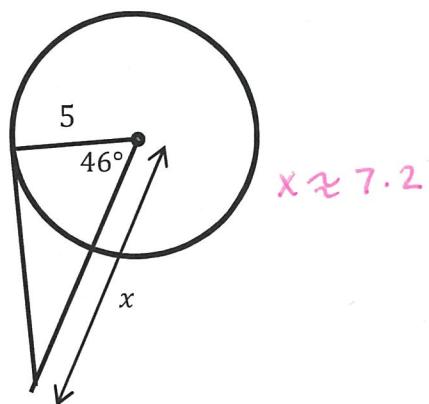
21.



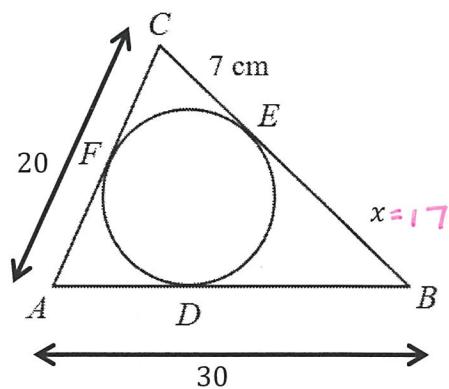
22.



23.



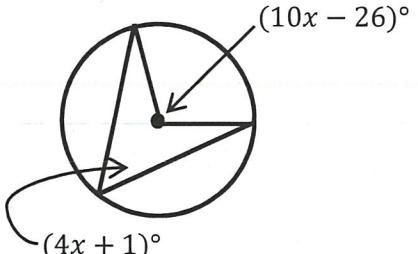
24.



Solve for x .

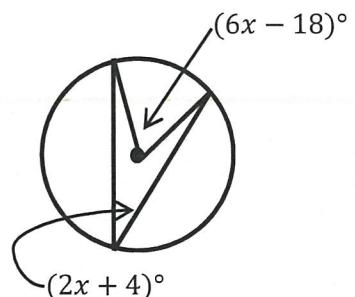
25.

$$x = 14$$

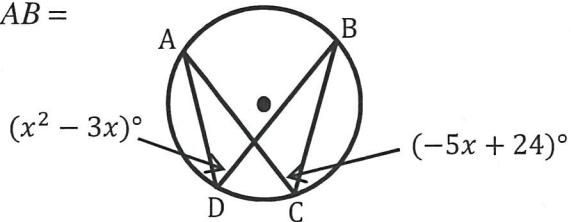


26.

$$x = 13$$



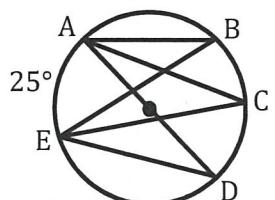
27. Find $m\widehat{AB} =$



$$m\widehat{AB} = 108^\circ \text{ or } 8^\circ$$

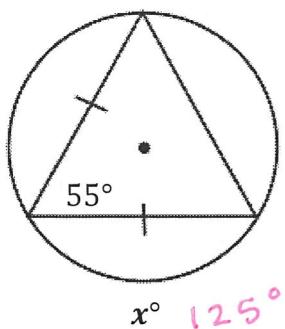
28. Find $m\angle B$

$$12.5^\circ$$

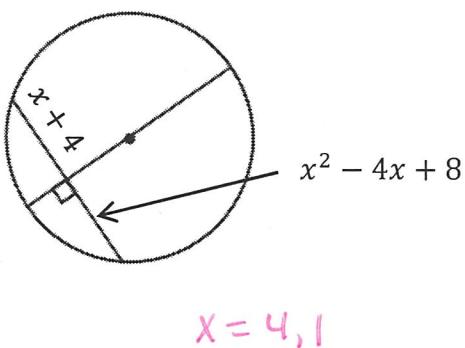


Find the value of x . All lines that appear to be tangents are.

29.

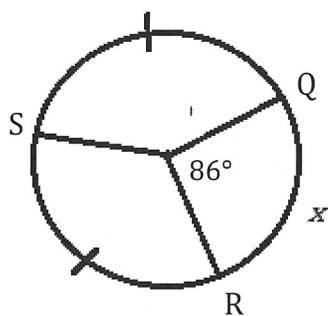


30.



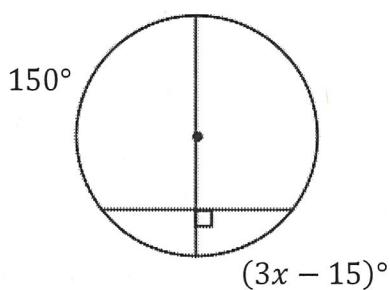
$$x = 4, 1$$

31. $m\widehat{RQS} = 223^\circ$

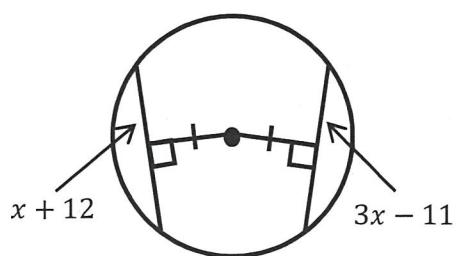


32.

$$x = 15^\circ$$

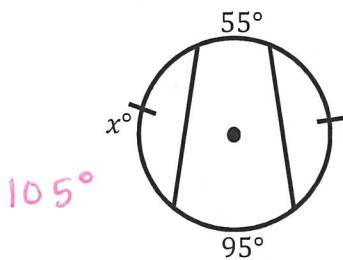


33.

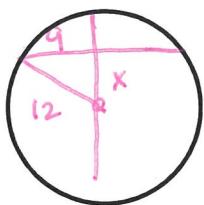


$$x = 11.5$$

34.

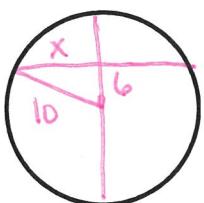


35. If the radius of a circle is 12 mm long and a chord is 18 mm long, how far from the center is the chord?



$$x = 3\sqrt{7} \approx 7.9 \text{ mm}$$

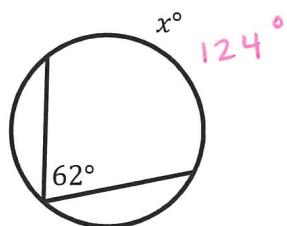
36. If a chord is 6 in. from the center of a circle with a diameter of 20 in., how long is the chord?



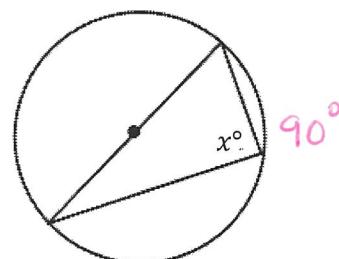
$$16 \text{ in}$$

Solve for x.

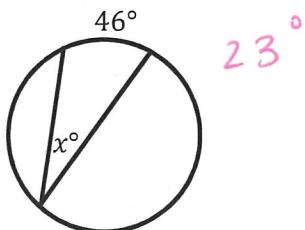
37.



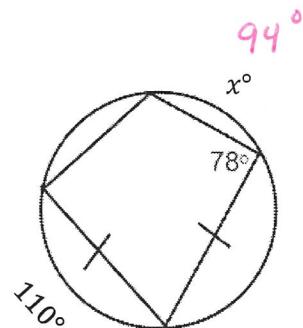
38.



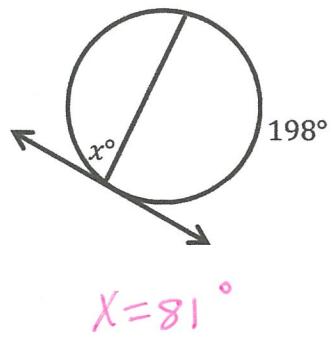
39.



40.

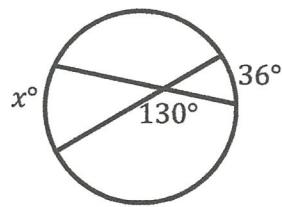


41.



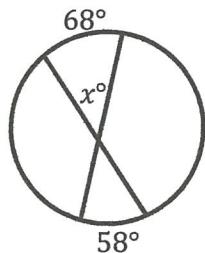
$$X = 81^\circ$$

42.



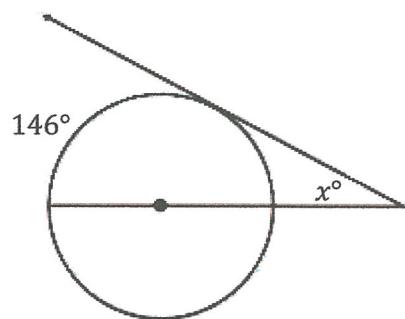
$$X = 64^\circ$$

43.



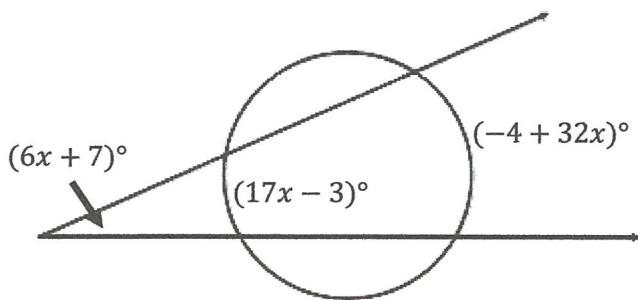
$$X = 63^\circ$$

44.



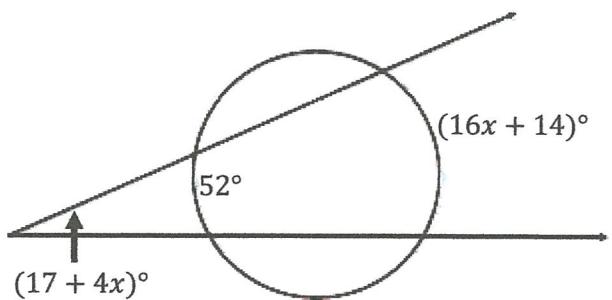
$$X = 56^\circ$$

45.



$$X = 5$$

46.



$$X = 9$$