**9.1 Circle Basics**

**Refer to the figure at the right.**

1. Name the center of circle A.

2. Name a diameter.

3. Name a radius of the circle. Is there more than one radius?

4. Name a chord.

5. Name a tangent line.

6. Name a secant line.

7. Name a point in the interior of the circle.

8. Name a point in the exterior of the circle.

9. Name three points that lie on the circle.

10. If AC =3, then AB = ? and BD = ?****

**Refer the figure at the right.**

Identify the term that best describes the given line, segment, or point.

11. $\overbar{MN}$ 12. $\overbar{NJ}$

13. J 14. $\overleftrightarrow{HJ}$

15. $\overbar{KL}$ 16. $\overbar{PM}$

17. $\overleftrightarrow{KL}$ 18. M

19. Is point H in the interior or exterior of the circle?

20. If a line segment is drawn from point M to point K, what would $\overbar{MK}$ be?

21. If a line segment is drawn from point L to point P, what would $\overbar{LP}$ be?

**Fill in the blank.**

22. A diameter of a circle is always the longest \_\_\_\_\_\_\_\_\_\_\_ of the circle.

23. A radius is ½ of the \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

24. A \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ is a line that goes through two points on a circle.

25. A \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ line touches a circle in exactly one point.

**9.2 Central angles and inscribed angles**

$\overbar{FC} and \overbar{ DE} are diameters.$ **Find the measure of each angle or arc. **

26. $m∠FAD$ 27. $m∠BAC$

28. $m∠EAF$ 29. $m\hat{DB}$

30. $m\hat{BC}$ 31. $m\hat{CE}$

32. $m\hat{EF}$ 33. $m\hat{DF}$

34. $m\hat{DC}$ 35. $m\hat{DCF}$

$\overbar{FC} and \overbar{DE} are diameters.$ **Find the measure of each angle or arc.**

36. $m\hat{HC}$ 37. $m\hat{BH}$

38. $m∠DGE$ 39. $m\hat{EC}$

40. $m∠EAC$ 41. $m\hat{FD}$

42. $m\hat{EF}$ 43. $m\hat{FH}$

44. $m\hat{GE}$ 45. $m\hat{GFH}$

46. $m∠DAF$ 47. $m∠FHE$

48. $m∠FAE$ 49. $m∠DEH$

50. $m∠GED$ 51. $m∠GEH$