Ex 10.1(solved exercise) Class 9 Maths Circle By-Ashish jha Question 1

Fill in the blanks.

(i) The centre of a circle lies in of the circle. (exterior/interior)
(ii) A point, whose distance from the centre of a circle is greater than its radius lies in or
the circle, (exterior/interior)
(iii) The longest chord of a circle is a of the circle.
(iv) An arc is a when its ends are the ends of a diameter.
(v) Segment of a circle is the region between an arc and of the circle.
(vi) A circle divides the plane, on which it lies, in parts.
Solution:
(i) interior
(ii) exterior
(iii) diameter
(iv) semicircle

Question 2.

(v) the chord (vi) three

Write True or False. Give reason for your answers.

- (i) Line segment joining the centre to any point on the circle is a , radius of the circle.
- (ii) A circle has only finite number of equal chords.
- (iii) If a circle is divided into three equal arcs, each is a major arc.
- (iv) A chord of a circle, which is twice as long as its radius, is a diameter of the circle.
- (v) Sector is the region between the chord and its corresponding arc.
- (vi) A circle is a plane figure.

Solution:

- (i) True [: All points on the circle are equidistant from the centre]
- (ii) False [: A circle can have an infinite number of equal chords]
- (iii) False [∵ Each part will be less than a semicircle]
- (iv) True [∵ Diameter = 2 x Radius]
- (v) False [: The region between the chord and its corresponding arc is a segment]
- (vi) True [: A circle is drawn on a plane]

Thanks.....