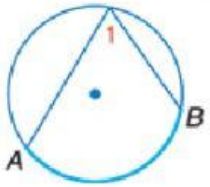
LESSON 5- INSCRIBED ANGLES

Theorem 5.6 Inscribed Angle Theorem

Words If an angle is inscribed in a circle, then the measure of the angle equals one half the measure of its intercepted arc.

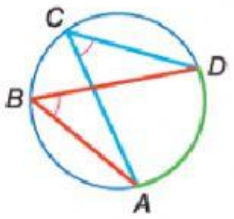
Example $m\angle 1 = \frac{1}{2}m\overset{\frown}{AB}$ and $m\overset{\frown}{AB} = 2m\angle 1$



Theorem 5.7

Words If two inscribed angles of a circle intercept the same arc or congruent arcs, then the angles are congruent.

Example $\angle B$ and $\angle C$ both intercept $\overset{\frown}{AD}$. So, $\angle B \cong \angle C$.

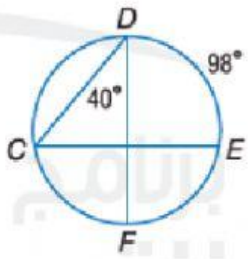


1) Find each measure

a) $m\overset{\frown}{CF}$ = 2 m<

= 2 ( )

=



b) $m\angle C$ = $\frac{1}{2}m <\overset{\frown}{\ }$

= $\frac{1}{2}$ ( )

=

2)

What is $m\angle ORP$?

Drag and drop your answers to correctly complete the statements.

$\angle ORP \cong$ <

$m\angle ORP =$ m<

$4x + 9 =$ $x -$

9 = x -

X =

$m\angle ORP =$ 4 x + 9

= 4 + 9

=