## Mathematics 9 Unit 8: Circle Geometry

## Text: Math Makes Sense 9

## Chapter 8

By the end of this unit, it is expected that students will:

| Outcomes  | Pages<br>in textbook   |
|---|--|
| <ol> <li>Solve problems &amp; justify solutions for the following circle properties:         <ul> <li>the perpendicular from a circle's center to a chord bisects the chord.</li> <li>the measure of the central angle is equal to twice the measure of the inscribed angle subtended by the same arc.</li> <li>the inscribed angles subtended by the same arc are congruent.</li> <li>a tangent to a circle is perpendicular to the radius at the point of tangency.</li> </ul> </li> </ol>  | < Lesson<br>8.1<br>Pages<br>384 - 391  |
| <ul> <li>&lt; Explain the relationship between the tangent of a circle and the radius at the point of tangency.</li> <li>&lt; Explain the relationship between the perpendicular from the center of the circle and a chord.</li> <li>&lt; Solve a problem involving application of one or more of the circle properties</li> <li>&lt; Explain the relationship between the measure of the central angle and the inscribed angle subtended by the same arc.</li> <li>&lt; Determine the measure of an angle inscribed in a semicircle using the circle properties.</li> <li>&lt; Explain the relationship between the inscribed angles subtended by the same arc.</li> </ul> | < Lesson<br>8.2<br>Pages<br>392 - 399<br>< Lesson<br>8.3<br>Pages<br>404 - 412 |
| Review Exercises:         <       Mid-Unit Review         <       Unit Review         <       Practice Test   | Pg: 403<br>P: 417-419<br>Pg: 420   |