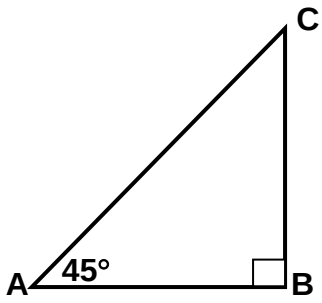
NAME_____**DATE**_____**PER.**_____

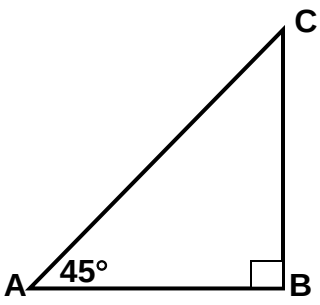
45°-45°-90° Triangles

The length of one side of ΔABC below is given. Use the relationship between the sides of a 45°-45°-90° triangle to find the lengths of the other two sides.



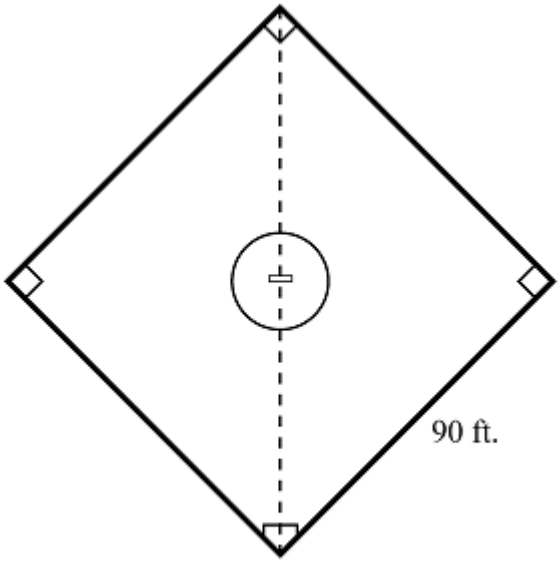
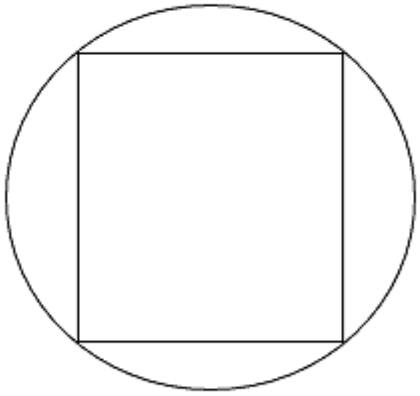
1. AC = _____ CB = _____	AB = 7
2. AB = _____ CB = _____	AC = 8
3. AC = _____ AB = _____	CB = 4
4. AB = _____ CB = _____	AC = 4

5. AB = _____ CB = _____	AC = $6\sqrt{2}$
6. AC = _____ CB = _____	AB = 15



Find the indicated length for each of the following.

_____7.	The length of a diagonal of a square is $10\sqrt{2}$ inches. Find the length of one side of the square.
_____8.	The perimeter of a square is 44 meters. Find the length of a diagonal of a square.

_____9.	A baseball diamond is a square with bases 90 feet apart, as shown below.  Which is closest to the distance between second base and home plate?
_____10.	A square is placed inside a circle of radius 3 centimeters such that the corners of the square lie on the circumference of the circle.  What is the area of the square in square centimeters?