Algebra 2A
9.1

Name $\qquad$

## Assignment

Find the six trigonometric functions for each triangle.
1.

$\sin \theta=$ $\qquad$ $\csc \theta=$ $\qquad$
$\cos \theta=$ $\qquad$ $\sec \theta=$ $\qquad$ $\tan \theta=$ $\qquad$ $\cot \theta=$ $\qquad$
2.

$\sin \theta=$ $\qquad$ $\csc \theta=$ $\qquad$
$\cos \theta=$ $\qquad$ $\sec \theta=$ $\qquad$
$\tan \theta=$ $\qquad$ $\cot \theta=$ $\qquad$

Write an equation involving sin, cos, or tan that can be used to find $x$. Then solve the equation. Round measures of sides to the nearest tenth and measures of angles to the nearest degree.
3.

4.



Solve $\triangle A B C$ by using the given measurements. Round the measures of the sides to the nearest tenth and measures of angles to the nearest degree.
7. $A=35^{\circ}, a=12$

8. $B=36^{\circ}, c=8$
9. $a=4, b=7$

Algebra 2A
9.2

Assignment

For Questions 1-6, solve each triangle. Round measures of sides to the nearest tenth and measures of angles to the nearest degree.
1.

2.
4.

5.

6.


Algebra 2A
9.3
$\qquad$

## Assignment

For Questions 1-6, determine whether each triangle should be solved by beginning with the Law of Sines or the Law of Cosines. Then solve each triangle. Round measures of sides to the nearest tenth and measures of angles to the nearest degree.
1.


Begin with the Law of $\qquad$

$$
\begin{aligned}
& a= \\
& m \angle B= \\
& m \angle C=
\end{aligned}
$$

2. 



Begin with the Law of $\qquad$

$$
\begin{aligned}
& c= \\
& m \angle A= \\
& m \angle C=
\end{aligned}
$$

3. 



Begin with the Law of $\qquad$

$$
\begin{aligned}
& m \angle A= \\
& m \angle B= \\
& m \angle C=
\end{aligned}
$$



Begin with the Law of $\qquad$

$$
\begin{aligned}
& m \angle A= \\
& m \angle B= \\
& m \angle C=
\end{aligned}
$$

5. 



Begin with the Law of $\qquad$

$$
\begin{aligned}
& a= \\
& c= \\
& m \angle B=
\end{aligned}
$$

