## NOTES 2.2

Complementary and Supplementary Angles

## Complementary Ang/es

2 Angles whose sum is $90^{\circ}$
(rt. Angle)

## Supplementary Ang/es

2 Angles whose sum is $180^{\circ}$
(straight. Angle)

## Example 1

- If and angle measures $38^{\circ}$, what is its complement?


$$
\begin{gathered}
90-38=x \\
x=52
\end{gathered}
$$

## Example 2

- If and angle measures $38^{\circ}$, what is its complement?


$$
\begin{gathered}
180-38=x=x=142 \\
x=142
\end{gathered}
$$

## Complements to unknown angles



The algebraic expression used to represent a complementary angle is $90-\mathbf{x}$

$$
\text { Remember! Complements } \Rightarrow \text { Right Angle Sum } \Rightarrow 90
$$

## Supplements to unknown angles



The algebraic expression used to represent a supplementary angle is:

$$
180-x
$$

Remember! Supplements $\Rightarrow$ Straight Angle Sum $\Rightarrow \mathbf{1 8 0}$

To keep from confusing the two, the following logic may help you remember:


