

Integer Rules

Two Signs Together, Side by Side

- Multiply, Simplify, Reclassify

$$\begin{array}{l} 3 + - 7 \\ 3 - 7 \end{array} \quad \begin{array}{l} \text{Rule: } + \cdot - = - \\ \text{Simplified, Diff Signs} \end{array}$$

$$\begin{array}{l} 6 - (+ 9) \\ 6 - 9 \end{array} \quad \begin{array}{l} \text{Rule: } - \cdot + = - \\ \text{Simplified, Diff Signs} \end{array}$$

$$\begin{array}{l} 3 - - 7 \\ 3 + 7 \end{array} \quad \begin{array}{l} \text{Rule: } - \cdot - = + \\ \text{Simplified, Same Signs} \end{array}$$

$$\begin{array}{l} 6 - (- 9) \\ 6 + 9 \end{array} \quad \begin{array}{l} \text{Rule: } - \cdot - = + \\ \text{Simplified, Same Signs} \end{array}$$

Multiplying (or Dividing)

- Same Signs: Positive

$$+ \cdot + = + \quad 9 \cdot 2 = 18$$

$$- \cdot - = + \quad -9 \cdot -2 = 18$$

- Different Signs: Negative

$$- \cdot + = - \quad 9 \cdot -2 = -18$$

$$+ \cdot - = - \quad -9 \cdot 2 = -18$$

Addition & Subtracting (Combining)

“When Adding, Opposites ~~Attract~~”

sub

- Same Signs + : Combine (Add), Keep the Sign

$$-9 - 2 = -11$$

$$9 + 2 = 11$$

- Different Signs - : Subtract, Keep Sign of the Larger |#|

$$-9 + 2 = -7$$

$$9 - 2 = 7$$