

Multiplying & Dividing Integers

I. The Rules

Same Signs

ex: $5 \cdot 4 = 20$

ex: $-5 \cdot (-4) = 20$

Positive Answer

Different Signs

ex: $-4 \cdot 5 = -20$

ex: $-5 \cdot 4 = -20$

Negative Answer

* The size of the # does not determine the sign of your answer.

ex: $2,000 \cdot (-2) = -4,000$

ex: $\frac{500}{-10} = -50$

II. Negatives Are Opposites

A. Negative Signs Ask
 What Is the Opposite
 of the Next #.

ex: -5
 what is the opposite of 5?

ex: $-(-5) = +5$
 Same Signs
 what is the opposite
 of -5 ?

ex: $300(-2)$
 Diff. Signs
 what is the opposite
 of $300 \cdot 2$?
 -600

ex: $3 \cdot (-2) \cdot (-1) \cdot (-4) \cdot (2)$

$-6 \cdot 4 \cdot 2$

$-24 \cdot 2$

-48

ex:
$$\frac{(-3)(2)(-12)}{(4)(-2)}$$