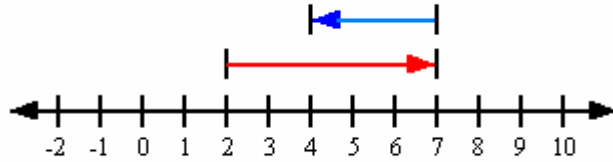**Get Ready for Grade 9 Integers Worked Examples and Practice**

Example 1: Add $(+2) + (+5) + (-3)$.

Solution: You can use a number line to help you visualize the operations.

$$(+2) + (+5) + (-3) = 2 + 5 - 3$$
$$= 7 - 3$$
$$= 4$$

Example 2: Subtract $(+5) - (+2) - (-4)$.

Solution: To subtract an integer, add the opposite.

$$(+5) - (+2) - (-4) = (+5) + (-2) + (+4)$$
$$= 5 - 2 + 4$$
$$= 3 + 4$$
$$= 7$$

Example 3: Multiply $(+3) \times (-4)$.

Solution: The multiplication and division rules for integers can be summarized in the table shown. Multiplying a positive integer by a negative integer has a negative result.

	+	−
+	+	−
−	−	+

$$(+3) \times (-4) = -12$$

Example 4: Divide $-15 \div (-3)$.

Solution: Refer to the table in Example 3. Dividing a negative integer by a negative integer has a positive result.

$$\frac{-15}{-3} = 5$$

Practice:

1. a) Add $(-4) + (+6) + (-1)$.

   b) Add $2 + 8 + (-3)$.

   c) Add $-12 + 8 + (-2)$.

2. a) Subtract $(+8) - (+2) - (-3)$.

b) Subtract $9 - 4 - (-3)$.

c) Subtract $-6 - 5 - (-14)$.

3. a) Multiply $(-4) \times (-5)$.

b) $8 \times (-3)$.

c) $-7 \times (-2)$.

4. a) Divide $\dfrac{+18}{-6}$.

b) Divide $36 \div (-9)$.

c) Divide $-14 \div (-7)$.

Answers:

1. a) 1 b) 7 c) –6

2. a) 9 b) 8 c) 3

3. a) 20 b) –24 c) 14

4. a) –3 b) –4 c) 2