

Objectives: The students will be able to solve problems by adding & subtracting integers.

Adding & Subtracting Integers

Rules for adding integers:

If the signs are the same: Add ; Keep the sign

ie) $-2 + -8 = -10$ $3 + 6 = 9$

If the signs are different: Subtract, use the sign of the larger absolute value

ie) $-5 + 9 = 4$ $3 + -8 = -5$

Rule for subtracting integers:

Add the opposite of the next number

Practice as notes



Simplify.

1. $-6 + (+2) = -4$

4. $-2 + -3 = -5$

7. $3 + -10 = -7$

10. $4 + (+3) = 7$

13. $-4 + 9 = -13$

15. $10 + (-6) + 15 + (+6) = -5$

2. $5 + -3 = 2$

5. $5 + (+1) = 6$

8. $-20 + 21 = 1$

11. $-9 + (+6) = -3$

12. $5 + 12 = 17$

3. $3 + -5 = -2$

6. $-1 + 1 = 0$

9. $-6 + 4 = -2$

12. $5 + 12 = 17$

14. $-2 + 10 + (-4) = 4$

16. $-2 + 6 + (-1) + (+3) = 6$

Evaluate if $a = 2$, $b = -6$ and $c = 10$. Substitution must be shown as a separate step.

17. $a - b + c$
 $2 + (+6) + 10$
18

18. $c - b - a$
 $10 + (+6) + 2$
14

19. $a - b - 2c$
 $2 + (+6) - 2 \cdot 10$
 $2 + 6 + -20$
-12