

Adding and Subtracting Rational Numbers Worksheet

Directions: Solve each problem. Simplify your answers when possible.

Part A: Add the Rational Numbers

1. $\frac{1}{4} + \frac{3}{4} = \frac{\boxed{}}{\boxed{}} = \boxed{}$

2. $\frac{2}{5} + \frac{1}{5} = \frac{\boxed{}}{\boxed{}}$

3. $\frac{3}{8} + \frac{1}{8} = \frac{\boxed{}}{\boxed{}}$

4. $\frac{7}{10} + \frac{2}{10} = \frac{\boxed{}}{\boxed{}}$

5. $\frac{5}{6} + \frac{1}{6} = \frac{\boxed{}}{\boxed{}} = \boxed{}$

6. $-\frac{3}{4} + \frac{1}{4} = \frac{\boxed{}}{\boxed{}}$

7. $-\frac{2}{5} + \frac{4}{5} = \frac{\boxed{}}{\boxed{}}$

8. $1.5 + 2.3 = \boxed{}$

9. $-3.2 + 1.7 = \boxed{}$

10. $4.25 + (-2.5) = \boxed{}$

Part B: Subtract the Rational Numbers

11. $\frac{5}{6} - \frac{2}{6} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$

12. $\frac{7}{8} - \frac{3}{8} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$

13. $\frac{9}{10} - \frac{4}{10} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$

14. $\frac{3}{5} - \frac{1}{5} = \frac{\boxed{}}{\boxed{}}$

15. $\frac{11}{12} - \frac{5}{12} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$

16. $-\frac{3}{4} - \frac{1}{4} = \frac{\boxed{}}{\boxed{}} = \boxed{}$

17. $\frac{2}{3} - \frac{5}{3} = \frac{\boxed{}}{\boxed{}} = \boxed{}$

18. $6.8 - 2.4 = \boxed{}$

19. $-1.5 - 2.5 = \boxed{}$

20. $3.75 - 5.25 = \boxed{}$

Part C: Add or Subtract Rational Numbers with Unlike Denominators

$$21. \quad \frac{1}{2} + \frac{1}{4} = \frac{\boxed{}}{\boxed{}}$$

$$22. \quad \frac{2}{3} + \frac{1}{6} = \frac{\boxed{}}{\boxed{}}$$

$$23. \quad \frac{3}{4} - \frac{1}{2} = \frac{\boxed{}}{\boxed{}}$$

$$24. \quad \frac{5}{6} - \frac{1}{3} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$$

$$25. \quad \frac{2}{5} + \frac{3}{10} = \frac{\boxed{}}{\boxed{}}$$

$$26. \quad \frac{7}{8} - \frac{1}{4} = \frac{\boxed{}}{\boxed{}}$$

$$27. \quad -\frac{1}{2} + \frac{3}{4} = \frac{\boxed{}}{\boxed{}}$$

$$28. \quad \frac{5}{6} - \frac{7}{12} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$$

$$29. \quad -\frac{2}{3} + \frac{1}{6} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$$

$$30. \quad \frac{7}{10} - \frac{9}{20} = \frac{\boxed{}}{\boxed{}} = \frac{\boxed{}}{\boxed{}}$$

Part D: Word Problems

31. Emily walked $\frac{3}{4}$ mile in the morning and $\frac{1}{2}$ mile in the afternoon. How far did she walk altogether?

Answer: $\frac{\boxed{}}{\boxed{}}$ or $\boxed{}\frac{\boxed{}}{\boxed{}}$ mile

32. A tank contained 8.5 gallons of water. After using 3.25 gallons, how much water remained?

Answer: _____ gallons

33. The temperature was -2.5°C in the morning and rose 4.75°C by noon. What was the temperature at noon?

Answer: _____ $^{\circ}\text{C}$

34. A recipe calls for $\frac{2}{3}$ cup of flour and $\frac{1}{6}$ cup of cocoa powder. How many cups are used altogether?

Answer: $\frac{\boxed{}}{\boxed{}}$ cup

35. A diver is -15.5 feet below sea level and rises 7.25 feet. What is the diver's new position?

Answer: _____ feet
