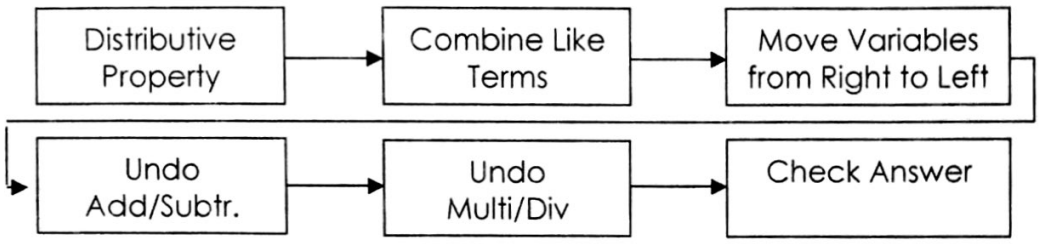
Name: _____ Date: _____

- **SOLVE & CHECK EACH EQUATION.**
- **Be sure to show your steps for solving each problem, line by line**
- **Watch your signs**
- **Circle all answers, please!**



1. $15 = t + 18$

$-18 \quad -18$

$-3 = t$

$\boxed{t = -3}$

2. $a - (-4) = -28$

$a + 4 = -28$

$-4 \quad -4$

$\boxed{a = -32}$

3. $\frac{-4y}{-4} = \frac{-64}{-4}$

$\boxed{y = 16}$

4. $\frac{x}{6} + 5 = 2$

$-5 \quad -5$

$6 \cdot \frac{x}{6} = -3 \cdot 6$

$\boxed{x = -18}$

5. $-5x + 6 = -9$

$-6 \quad -6$

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

$\boxed{x = 3}$

6. $-10 = 5x - 40$

$+40 \quad +40$

$\frac{30}{5} = \frac{5x}{5}$

$\boxed{x = 6}$

7. $y - 2(3y - 2) = -6$

$y - 6y + 4 = -6$

$-5y + 4 = -6$

$\frac{-5y}{-5} = \frac{-10}{-5}$ $\boxed{y = 2}$

8. $4t - 2t + 15 = 41$

$2t + 15 = 41$

$-15 \quad -15$

$\frac{2t}{2} = \frac{26}{2}$ $\boxed{t = 13}$

9. $6x + 14 = 4x - 6$

$-4x \quad -4x$

$2x + 14 = -6$

$-14 \quad -14$

$\frac{2x}{2} = \frac{-20}{2}$ $\boxed{x = -10}$

10. Describe in words what is happening in each step.

$3x + 5 = 4x + 6$

$3x - 4x + 5 = 4x - 4x + 6$ Move variables to the left

$-x + 5 = 6$ Combine like terms

$-x + 5 - 5 = 6 - 5$ Undo addition (subtract)

$-x = 1$ Combine like terms

$\frac{-x}{-1} = \frac{1}{-1}$ Undo multiplication (divide)

$x = -1$