

## Solve for "x," #'s 11-20

11.  $14 = -(p-8)$

$$\begin{array}{r} 14 = -p + 8 \\ -8 \quad -8 \\ \hline \end{array}$$

$$\frac{6}{-1} = \frac{-p}{-1}$$

$$\boxed{-6 = p}$$

12.  $-(7-4x) = 9$

$$\begin{array}{r} -7 + 4x = 9 \\ +7 \quad +7 \\ \hline \end{array}$$

$$\frac{4x}{4} = \frac{16}{4}$$

$$\boxed{x = 4}$$

13.  $-18 - 6k = 6(1 + 3k)$

$$\begin{array}{r} -3 - k = 1 + 3k \\ +k \quad +k \\ \hline \end{array}$$

$$\begin{array}{r} -3 = 1 + 4k \\ -1 \quad -1 \\ \hline \end{array}$$

$$\frac{-4}{4} = \frac{4k}{4}$$

$$\boxed{-1 = k}$$

14.  $5n + 34 = -2(1 - 7n)$

$$\begin{array}{r} 5n + 34 = -2 + 14n \\ -5n \quad -5n \\ \hline \end{array}$$

$$34 = -2 + 9n$$

$$\begin{array}{r} +2 \quad +2 \\ \hline \end{array}$$

$$\frac{36}{9} = \frac{9n}{9}$$

$$\boxed{4 = n}$$

15.  $2(4x - 3) - 8 = 4 + 2x$

$$8x - 6 - 8 = 4 + 2x$$

$$8x - 14 = 4 + 2x$$

$$\begin{array}{r} -2x \quad -2x \\ \hline \end{array}$$

$$6x - 14 = 4$$

$$\begin{array}{r} +14 \quad +14 \\ \hline \end{array}$$

$$\frac{6x}{6} = \frac{18}{6}$$

$$\boxed{x = 3}$$

16.  $3n - 5 = -8(6 + 5n)$

$$3n - 5 = -48 - 40n$$

$$\begin{array}{r} +5 \quad +5 \\ \hline \end{array}$$

$$3n = -43 - 40n$$

$$\begin{array}{r} +40n \quad +40n \\ \hline \end{array}$$

$$43n = -43$$

$$\frac{43n}{43} = \frac{-43}{43}$$

$$\boxed{n = -1}$$

$$17. -(1+7x) - 6(-7-x) = 36$$

$$-1 - 7x + 42 + 6x = 36$$

$$41 - x = 36$$

$$\begin{array}{r} -41 \quad -41 \\ \hline \end{array}$$

$$\frac{-x}{-1} = \frac{-5}{-1}$$

$$x = 5$$

$$18. -3(4x+3) + 4(6x+1) = 43$$

$$-12x - 9 + 24x + 4 = 43$$

$$12x - 5 = 43$$

$$\begin{array}{r} +5 \quad +5 \\ \hline \end{array}$$

$$\frac{12x}{12} = \frac{48}{12}$$

$$x = 4$$

$$19. 24a - 23 = -5(1 - 6a)$$

$$24a - 23 = -5 + 30a$$

$$\begin{array}{r} +5 \quad +5 \\ \hline \end{array}$$

$$\begin{array}{r} 24a - 18 = 30a \\ -24a \quad -24a \\ \hline \end{array}$$

$$\frac{-18}{6} = \frac{6a}{6}$$

$$-3 = a$$

$$20. -5(1-5x) + 5(-8x-2) = -4x-8x$$

$$-5 + 25x - 40x - 10 = -12x$$

$$-15 - 15x = -12x$$

$$\begin{array}{r} +15x \quad +15x \\ \hline \end{array}$$

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

$$-5 = x$$