

A.  $6(1 + 2n) = -18$

$$6 + 12n = -18$$

$$(6-6) + 12n = -18-6$$

$$\frac{12n}{12} = \frac{-24}{12}$$

$$n = -2$$

B.  $-(3r-6) = -4$

$$-3r + 6 = -4$$

$$-3r + 6 - 6 = -4 - 6$$

$$\frac{-3r}{-3} = \frac{-10}{-3}$$

$$r = \frac{10}{3}$$

$$C. \quad 3(x + 1) - 2x = 1$$

$$3x + 3 - 2x = 1$$

$$3x - 2x + 3 = 1$$

$$x + 3 = 1$$

$$x + \boxed{3 - 3} = 1 - 3$$

$$x = -2$$

# Homework Questions???

10. Solve each equation.

What strategy did you use?

Verify the solution.

a)  $-12a = 15 - 15a$

b)  $10.6y = 2.1y - 27.2$

c)  $-10.8 + 7z = 5z$

d)  $6u - 11.34 = 4.2u$

e)  $-20.5 - 2.2b = -7.2b$

f)  $-5.3p = -9 - 8.9p$

11. Solve each equation. Verify the solution.

a)  $2 - 3n = 2n + 7$

b)  $13 - 3q = 4 - 2q$

c)  $-2.4a + 3.7 = -16.1 + 3.1a$

d)  $8.8v + 2.1 = 2.3v - 16.1$

e)  $-2.5x - 2 = -5.7x + 6$

f)  $6.4 - 9.3b = 25.3 - 3.9b$

17. Solve each equation. Verify the solution.

a)  $4(g + 5) = 5(g - 3)$

b)  $3(4j + 5) = 2(-10 + 5j)$

c)  $2.2(h - 5.3) = 0.2(-32.9 + h)$

d)  $0.04(5 - s) = 0.05(6 - s)$

$$36 + 3x = 3(6x - 8)$$

$$36 + 3x = 18x - 24$$

$$36 + 3x - 18x = \boxed{18x - 18x} - 24$$

$$36 - 15x = -24$$

$$\boxed{36 - 36} - 15x = -24 - 36$$

$$\frac{-15x}{-15} = \frac{-60}{-15}$$

$$x = 4$$

$$-6k + 4(5k + 4) = 37 + 7k$$

$$-6k + 20k + 16 = 37 + 7k$$

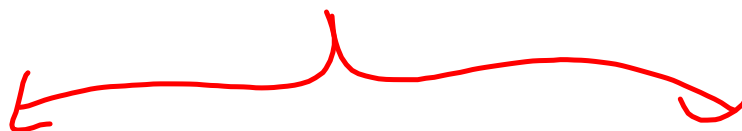
$$-6k + 20k - 7k + 16 = 37 + \boxed{7k - 7k}$$

$$\boxed{7k + 16 = 37}$$

$$7k + \boxed{16 - 16} = 37 - 16$$

$$\frac{7k}{7} = \frac{21}{7} \quad k = 3$$

$$2(r - 3) - 3 = 3r - 6$$



$$2r - 6 - 3 = 3r - 6$$

$$2r - 6 - 3 = 3r - 6$$

$$2r - 3r - 6 - 3 = \boxed{3r - 3} - 6$$

$$2r - 3r - 6 - 3 = \boxed{3r - 3} - 6$$

$$\boxed{-1r - 9 = -6}$$

Group!

$$-1r - 6 - 3 = -6$$

$$-1r \boxed{-9 + 9} = -6 + 9$$

$$-1r = 3$$

$$r = -3$$

$$\cancel{(4)} \frac{x}{\cancel{4}} = 6^{(4)}$$

$$x = 24$$



$$\cancel{(r)} \frac{122}{\cancel{r}} = 3(r) \quad , \quad r \neq 0$$

$$122 = 3r$$

$$\cancel{3}r = \frac{122}{\cancel{3}}$$

$$r = 40.6$$

$$(\cancel{s}) 2.4 = \frac{4.8(\cancel{s})}{\cancel{8}}, \quad s \neq 0$$

$$\frac{\cancel{2.4}s}{\cancel{2.4}} = \frac{4.8}{2.4}$$

$$s = 2$$

Two rental halls are considered for a wedding.

Hall A costs \$50 a person.

Hall B costs \$2000, plus \$40 per person.

$x$  = the number  
of people.

Determine the number of people for which the halls will cost the same to rent.

A. Write the equation then solve

$$\text{Hall A} = \text{Hall B}$$

$$50x = 2000 + 40x$$

$$50x - 40x = 2000 + \boxed{40x - 40x}$$

$$\frac{10x}{10} = \frac{2000}{10}$$

$$x = 200$$

Midunit review  
Page 286  
5, 7 [a, b, c, e, f], 8  
Extra Practice Worksheet

2, 6, 10, 17, 19

ID: 1

Pre-Algebra  
Assignment

Name \_\_\_\_\_  
Date \_\_\_\_\_ Period \_\_\_\_\_

Solve each equation.

1) $-17 + 16n = 47$	2) $\frac{-9 + m}{-5} = 5$
3) $\frac{-18 + r}{2} = -23$	4) $-1 + 2n = -21$
5) $7(8b + 6) = 42$	6) $-7(2 - 5x) - 8 = -22$
7) $4(v + 2) + 3v = -6$	8) $6(x + 1) = 6$
9) $3x + 5(1 + 7x) = -33$	10) $-5 = 2(2 - 8a) + 7$
11) $6 - 2x = 6(6x + 1)$	12) $-6(1 - 6n) = 6n + 24$
13) $-(1 - 6a) = 13 - a$	14) $-(k - 3) = 8 - 2k$
15) $25 + 2x = -5(-3x - 5)$	16) $-4 + 6x = 2(4x - 6)$
17) $-2(6 + 5d) - 5 = 3 - 6d$	18) $26 - p = -2(1 + 4p)$
19) $-2(x - 3) + 6x = 24 - 5x$	20) $29 - 5n = 6(-1 + 5n)$

Answers:  
1) 4  
2) -16  
3) -24  
4) -10  
5) -1  
6) 2  
7) -2  
8) 0  
9) -1  
10) -1  
11) -1  
12) -4  
13) 14  
14) 11  
15) 10  
16) 2  
17) 1  
18) -5  
19) 3  
20) 1