

Chapter 13

Review

13.1 – Algebraic Expressions

- Identify terms and like terms in an expression.
- Simplify an expression.

Identify the terms and like terms in the expression.

1) $10x + 5 + 3x + 1$

2) $-2n + 7n - r + 10r$

13.1 – Algebraic Expressions

- Identify terms and like terms in an expression.
- Simplify an expression.

Simplify the expressions

3) $8v - 15v$

4) $7d + 5 - 4d$

5) $12x + 9 - 3x - 4$

6) $3(x - 4) + 5x$

13.2 – Adding and Subtracting Linear Expressions

- Identify linear vs non-linear equations
- Add/subtract linear equations

Find the sum or difference

7) $(x - 2) + (3x + 6)$

8) $(2n - 4) - (4n - 3)$

13.2 – Adding and Subtracting Linear Expressions

- Identify linear vs non-linear equations
- Add/subtract linear equations

Find the sum or difference

9) $2(-3y - 1) + (2y + 7)$

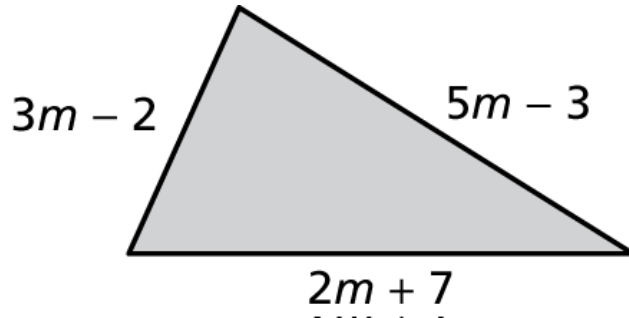
10) $(1 - 3k) - 4(2 + 5k)$

13.2 – Adding and Subtracting Linear Expressions

- Identify linear vs non-linear equations
- Add/subtract linear equations

Write an expression that represents the perimeter of the triangle.

11)



13.3 & 13.4 – Solving Equations Using Addition, Subtraction, Multiplication, or Division

Solve.

$$12) \mathbf{b} - 6 = -14$$

$$13) 5 = \mathbf{n} + 9$$

$$14) -6.4 = \mathbf{x} + 4.3$$

$$15) \mathbf{k} - \frac{1}{3} = \frac{5}{6}$$

13.3 & 13.4 – Solving Equations Using Addition, Subtraction, Multiplication, or Division

Solve.

$$16) -7n = 35$$

$$17) \frac{y}{-3} = 33$$

$$18) \frac{p}{-5} = -30$$

$$19) \frac{1}{5}d = -9$$

13.3 & 13.4 – Solving Equations Using Addition, Subtraction, Multiplication, or Division

Write the word sentence as an equation. Then solve.

20) 5 more than a number y is -2 .

$$y + 5 = -2$$

21) -13 is 4 less than a number n .

$$-13 = n - 4$$

13.3 & 13.4 – Solving Equations Using Addition, Subtraction, Multiplication, or Division

Write the word sentence as an equation. Then solve.

22) The quotient of a number j and -12 is 24 .

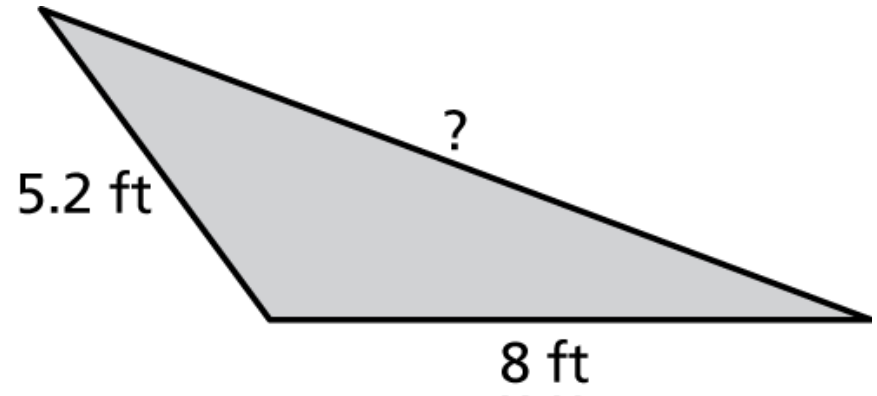
$$\frac{j}{-12} = 24$$

23) One fourth of a number k is -3 .

$$\frac{1}{4}k = -3$$

13.3 & 13.4 – Solving Equations Using Addition, Subtraction, Multiplication, or Division

24) The perimeter of a triangle is 25 feet. What is the length of the unknown side?



13.5 – Solving Two-Step Equations

$$25) -4x - 3 = -11$$

$$26) 12 = 2d + 3.2$$

13.5 – Solving Two-Step Equations

$$27) -1 + 5h = 14$$

$$28) \frac{1}{2}b + \frac{9}{4} = \frac{7}{4}$$

$$\frac{1}{2}b = \frac{-1}{2}$$

13.2 EXT – Factoring

Factor the following using the GCF

29) $24x - 18$

30) $6x - 27$

13.2 EXT – Factoring

Factor out the coefficient for the following

31) $12x - 72$

32) $14x - 42$

13.2 EXT – Factoring

Factor out the coefficient for the following

33) $-8r + 32$

34) $\frac{2}{5}x + \frac{4}{5}$