

Assignment 11

Simplify each radical expression.

1. $\sqrt{12}$

2. $\sqrt{36}$

3. $\sqrt{18}$

4. $\sqrt{8}$

5. $\sqrt{20}$

6. $\sqrt{25}$

7. $\sqrt{50}$

8. $\sqrt{27}$

Simplify each radical expression.

1. $3\sqrt{20}$

2. $2\sqrt{100}$

3. $2\sqrt{75}$

4. $5\sqrt{8}$

5. $3\sqrt{49}$

6. $6\sqrt{44}$

7. $5\sqrt{64}$

Name _____

Simplify the expressions by adding or subtracting the appropriate terms.

1. $3\sqrt{x} + 4\sqrt{y} + 2\sqrt{x} - \sqrt{y}$

2. $5\sqrt{3x} + 8 - 2\sqrt{x} + \sqrt{3x}$

3. $12 - \sqrt{2} + \sqrt{3} + 4\sqrt{2} - 10$

4. $\sqrt{7} + \sqrt{5} - 5\sqrt{7}$

5. $5\sqrt{2} - 3\sqrt{10} + \sqrt{10} + 6\sqrt{2}$

6. $3\sqrt{3} + 5\sqrt{3} - 3\sqrt{5} - 7\sqrt{3}$

7. $3x\sqrt{5} + 9y\sqrt{2} - y\sqrt{2} - 7x\sqrt{5}$

Solve by factoring. Remember you have to set the equation to zero before factoring.

$$1. \quad x^2 - 6x - 16 = 0$$

$$2. \quad 3x^2 - x = 24$$

$$3. \quad 9x^2 - 3x - 9 = x^2 + 3x$$

$$4. \quad x^2 + 8x + 28 = 3 - 2x$$

$$5. \quad 25x^2 - 81 = 0$$

$$6. \quad 2x^2 = 10x$$