The following problems represent the pre-knowledge necessary to be successful in mastering the content of Math 245 (College Algebra).

1. Factor: 
$$x^2 + x - 12$$

2. Add: 
$$\frac{x}{(x+2)(x+1)} + \frac{2x}{(2x-3)(x+1)}$$

3. Solve: 
$$\frac{x+1}{4} + \frac{x-2}{6} = 2$$

4. Solve: 
$$9x^2 - 16 = 0$$

5. Solve for 
$$x: xy - 5x = 2$$

6. Rationalize the denominator: 
$$\frac{6}{1+\sqrt{5}}$$

7. Graph 
$$f(x) = -3x + 2$$

The material above represents concepts covered in Math 125 (Intermediate Algebra) or Math 134 (Accelerated Elementary & Intermediate Algebra).