## **6-2 Solving Quadratic Equations by Factoring**

 $Name: \underline{\hspace{1cm}} Time \rightarrow Start: \underline{\hspace{1cm}} Finish: \underline{\hspace{1cm}} Total \ Time = \underline{\hspace{1cm}}$ 

Solve for the variable by factoring each polynomial.

1. 
$$x^2 + 2x = 24$$

$$2. x^2 + x - 40 = 7x$$

3. 
$$2n^2 - 6n = n + 4$$

4. 
$$4n^2 + 2n = -2n^2 + 13n - 4$$

5. 
$$9x^2 - 2x - 1 = 6x^2$$

6. 
$$9b^2 + 12 = -b^2 - 23b$$

7. 
$$2n^2 - 1 = n^2 + 24$$

8. 
$$4w^2 - 2 = -19w + 3$$