Rule #1: Substitution → If \( a = b \), then ___________________________________________________.

Equipment: Algebraic term = the _______________ of a __________________ and ______________.

Coefficient = The _________________ part of an algebraic term.

Rule #2: Distributive Law → \( a (b + c) = \) _________________, and \( a (b - c) = \) _________________.

Rule #3: Balance Rule → ________________________________________________.

5 Steps to Solve Basic Equations

(1) **Simplify both sides:**
   ➔ Use the Distributive Law.
   ➔ Combine like terms.

(2) **Collect the variables:**
   ➔ Use the Balance Rule.
   ➔ Subtract the term with the smallest coefficient.
   Subtracting a negative term is the same as adding its opposite (adding a positive term).

(3) **Collect the constants:**
   ➔ Use the Balance Rule.
   ➔ Subtract the constant on the same side as the variable.
   Subtracting a negative number is the same as adding its opposite (adding a positive).

(4) **Divide:**
   ➔ Use the Balance Rule.
   ➔ Divide by the coefficient of the variable.
   To divide by a fraction, multiply by its reciprocal (the flipped-over fraction).

(5) **If the variable is squared:**
   ➔ Use the Balance Rule.
   ➔ Take the square root of both sides.
   Don't forget the negative root.

**Is your answer correct? Test it!**

Substitute your answer for the variable in the original equation. Does it make the equation true?

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