Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Table #: \_\_\_\_\_\_\_\_\_ Period: \_\_\_\_\_ Date: \_\_\_\_\_

**1.2 Solving Equations with Variables on Both Sides\_Classwork**

*OBJECTIVE: Solve equations with variables on both sides of the equation. Determining number of solutions of an equation without solving. CCSS: 8.EE.7*

Goal: Get ONE variable alone on one side of the equal sign.

1. Use Distributive Property, if necessary.
2. Combine like terms, if necessary
3. Move one variable by adding its inverse to both sides of =.
4. Solve as usual.

1.

|  |  |
| --- | --- |
|  | Original problem |
| Move variables to one side. |
|  |
| Eliminate adding or subtracting |
| Eliminate multiplying or dividing |
| Solution! Remember…Check Your Answer! |

2.

|  |  |
| --- | --- |
| 3. | Original Problem |
| Do the Distributive Property First!!! |
| Move Variables to one Side. |
|  |
| Eliminate adding or subtracting |
| Eliminate multiplying or dividing |
| Solution! Remember…Check Your Answer! |
|  | Original Problem |
| Do the Distributive Property First!!! |
| Combine Like Terms |
| Move Variables to one Side. |
| Eliminate adding or subtracting |
| Eliminate multiplying or dividing |
| Solution! Remember…Check Your Answer! |

BACK 🡪

Video: <https://www.youtube.com/watch?v=ErLnHLDiM5E>

**PRACTICE PROBLEMS:**

1.  2.  3. 

4.  5.  6. 

7.  8.  9. 

10. $\frac{1}{3}\left(6x+12\right)=36$ 11.  12. 