3.5 Solving First-Degree Equations Involving Multiple Steps – Part 1

When the left side and right side of an equation are completely simplified, then the equation is ready to be solved. Using two operations is necessary to solve a multi-step equation. To solve the equation, we must make use of the order of operations (PE**MDAS**). However, when solving the equation we complete any addition/subtraction, first, then multiplication/division.

Class Notes – Solve each first-degree equation and check. If you do not solve an equation, explain why.

Set 1 $3x + 2 = 8$	$5x - 6 = 9$	$4m = 10 = 26$
Set 2 $5 + \frac{d}{2} = 37$	$\frac{p}{3} + 9 = -8$	$\frac{w^2}{11} + 10 = 15$

Set 3		
Set 4		

Review – Solve each first-degree equation and check. If you do not solve an equation, explain.

R#1 $2x - 7 = 17$		$5x + 7 = -38$

R#2 $6x - 4 = 20$	$4x - 3 = 13$	
R#3 $4x + 1 = 49$		$3x - 9 = 12$

Homework –

Solve each first-degree equation and check. If you do not solve an equation, explain.

1) $7 + 2x = 27$ **2)** $10 - 2x = 28$ **3)** $-3x + 6 = 6$ **4)** $-7x + 7 = -77$

5) $7x - 4 = 24$ **6)** $4x + 8 = 4$ **7)** $2x + 5 = 9$ **8)** $1 - 5x = -59$

9) $5x + 4 = -41$ **10)** $3x - 8 = 1$ **11)** $7x + 7 = 84$ **12)** $-6 + 3x = 27$

13) $-2x + 7 = -11$ **14)** $6 - 2x = -8$ **15)** $3x + 7 = 28$ **16)** $6x - 10 = 26$

Synthesis

TBD