

Try to solve the problems in each skill. Then give yourself a proficiency score on how well you understand that skill. Remember that the proficiency scores go from 1 (no idea) to 4 (mastery). Explain why you rated yourself that way.

Skill: I can solve 2-step linear equations

$$1. \quad 2x - 5 = 11 \quad \begin{array}{l} +5 \quad +5 \\ \hline 2x = 16 \\ \hline x = 8 \end{array}$$

$$2. \quad \frac{2(x-5)}{2} = \frac{10}{2} \quad \begin{array}{l} x-5 = 5 \\ +5 \quad +5 \\ \hline x = 10 \end{array}$$

$$3. \quad \frac{x}{3} - 4 = 5 \quad \begin{array}{l} +4 \quad +4 \\ \hline \frac{x}{3} = 9 \\ \hline x = 27 \end{array}$$

$$4. \quad \left(\frac{x-4}{3} = 5\right) \cdot 3 \quad \begin{array}{l} x-4 = 15 \\ +4 \quad +4 \\ \hline x = 19 \end{array}$$

Proficiency Score:

Explanation:

Skill: I can solve linear equations with variables on both sides

$$1. \quad 3x - 5 = 2x + 7 \quad \begin{array}{l} -2x \quad -2x \\ \hline x - 5 = 7 \\ +5 \quad +5 \\ \hline x = 12 \end{array}$$

$$2. \quad 4(x+1) = 2x - 6 \quad \begin{array}{l} 4x + 4 = 2x - 6 \\ -2x \quad -2x \\ \hline 2x + 4 = -6 \\ -4 \quad -4 \\ \hline 2x = -10 \\ \hline x = -5 \end{array}$$

Proficiency Score:

Explanation:

Challenge Problems:

$$3. \quad \left(\frac{x}{3} - 4 = 2x + 1\right) \cdot 3 \quad \begin{array}{l} x - 12 = 6x + 3 \\ -3 \quad -3 \\ \hline x - 15 = 6x \\ -x \quad -x \\ \hline -15 = 5x \\ \hline x = -3 \end{array}$$

$$4. \quad \left(\frac{x}{3} - \frac{x}{4} = 1\right) \cdot 12 \quad \begin{array}{l} 4x - 3x = 12 \\ \hline x = 12 \end{array}$$

Proficiency Score:

Explanation:

