Name_____ Date_____ Period_____

LESSON 8-2 · SESSION 1 · PRACTICE · FORM A

Addition Equations

Learning target – I can solve an addition equation by subtracting the same amount from both sides. · 6.EE.B.7

REMEMBER

- **Inverse operations** undo each other. Subtraction undoes addition.
- Subtract the same number from **both sides** to keep the equation balanced.
- **Check** by putting your answer into the original equation.

WORKED EXAMPLE

A team had some points, then scored 14 more and has 40. Solve $y + 14 = 40$.

Step 1 Subtract 14 from both sides: $y + 14 - 14 = 40 - 14$.

Step 2 Simplify: $y = 26$.

Step 3 Check: $26 + 14 = 40$.

Answer **$y = 26$ points**

WORDS **inverse operation** *(operación inversa)* · **isolate** *(aislar)* · **one-step equation** *(ecuación de un paso)*

PRACTICE

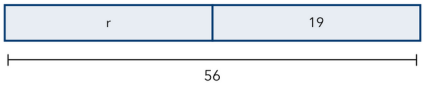
show your work · label units

1. Solve each equation.

a. $n + 23 = 60$ ___ **b.** $14 + p = 39$ ___ **c.** $x + 17 = 45$ ___

d. $y + 8.5 = 21$ ___ **e.** $m + 15 = 33$ ___ **f.** $w + 2.5 = 9$ ___

2. **Field Trip Seats.** A bus leaves school with r riders. At the next stop 19 more riders get on. Now there are 56 riders.



a. Write an addition equation. _____

b. Solve it. _____

c. Check your solution. _____

3. **Hiking Distance.** Priya hiked 12.5 miles on Sunday. That was 3.5 miles more than she hiked on Saturday. Write and solve an equation for s, Saturday's miles.

Hint *Saturday's miles + 3.5 = Sunday's miles.*

Show your work.

Answer_____ miles

4. **Aquarium Fish.** A tank held f fish. The owner added 14 more. Then it held 62 fish. Solve $f + 14 = 62$.

Hint *Subtract 14 from both sides.*

Show your work.

f =_____

5. **Savings Jar.** Devin had d dollars in a jar. He added $16. Then the jar held $73. Solve $d + 16 = 73$.

Show your work.

d =_____

6. **Rainfall Total.** A rain gauge held r inches on Monday. On Tuesday it caught 2.4 more inches. The total was 5.9 inches. Write and solve an equation.

Hint *Subtract 2.4 from both sides. Line up the decimal points.*

Show your work.

Answer_____ inches

7. **Book Pages.** Malia read p pages last night. This morning she read 38 more pages, for 91 pages in all. Write and solve an equation. Check it.

Hint *Undo + 38 on both sides.*

Show your work.

Answer_____ pages

8. **Savings Goal.** A student saved s dollars. After earning $46 more, the total is $128.

a. Write an equation. _____

b. Solve it. _____

c. The student now wants $200 in all. Write and solve an equation for e, the extra amount needed. _____

FIND THE ERROR

explain the mistake, then fix it

9. **Jonah's Work.** To solve $b + 26 = 40$, Jonah subtracted 26 from the left side only. He wrote $b = 40$. Explain his mistake. Then solve correctly.

_____

_____

_____

TEST PRACTICE

choose the best answer

10. Solve $y + 15 = 42$.

A $y = 57$ **B** $y = 27$ **C** $y = 15$ **D** $y = 630$

11. To solve an addition equation, you –

A subtract from one side only

B multiply both sides

C subtract the same number from both sides

D add the same number to both sides

SELF-CHECK CODE *find your answer · copy its letter into that problem's box · spell a math word*

53	8.3	57	37	9	76	3.5	48	82	75
C	**X**	**A**	**B**	**A**	**Z**	**N**	**L**	**E**	**Q**

#2b	#3	#4	#5	#6	#7	#8b

CHECK YOURSELF	☐ I can do this on my own	☐ I need a little help	☐ I have a question about #___