LESSON MAKER PRO

Mystery Number Hunt

Use blanks to show unknown numbers.

GRADE 5 · 5.PFA.2.a

5.PFA.2.a "Describe the concept of a variable (presented as a box, letter, or other symbol) as a representation of an unknown quantity."

NAME _____ DATE _____

THE BIG IDEA

A variable is a blank or symbol that stands for an unknown quantity. Use the numbers and operations in an equation to find the number the blank represents.

WORKED EXAMPLE

____ + 17 = 45

1. The blank stands for an unknown number.
2. Subtract 17 from both sides.
3. 45 - 17 = 28.
4. Check: 28 + 17 = 45.

Answer: ___ = 28

PRACTICE 6 problems

1 ___ + 9 = 25

ANSWER _____

2 34 - ___ = 15

ANSWER _____

3 6 * ___ = 42

ANSWER _____

4 ___ / 5 = 8

ANSWER _____

5 63 / ___ = 9

ANSWER _____

6 4 + ___ + 3 = 18

ANSWER _____

APPLY IT Show your work

1 Noah saves $6 each week to buy a $30 game. The equation 6 * ___ = 30 shows the number of weeks Noah saves. What number belongs in the blank?

WORK SPACE

ANSWER _____

2 A club has 72 beads to share equally among 9 students. The equation 72 / 9 = ___ shows how many beads each student gets. What number belongs in the blank?

WORK SPACE

ANSWER _____

CHALLENGE One step up

CHALLENGE

The same blank is used in both equations: ___ + 14 = 39 and 2 * ___ = 50. Can the blank represent the same number in both equations? Explain.

_____

_____

ANSWER KEY

Mystery Number Hunt

GRADE 5 · 5.PFA.2.a

PART 1 · PRACTICE

#	PROBLEM	ANSWER
1	___ + 9 = 25	**___ = 16**
2	34 - ___ = 15	**___ = 19**
3	6 * ___ = 42	**___ = 7**
4	___ / 5 = 8	**___ = 40**
5	63 / ___ = 9	**___ = 7**
6	4 + ___ + 3 = 18	**___ = 11**

PART 2 · APPLY IT

1. **___ = 5 weeks** Divide 30 by 6. Noah must save for 5 weeks.
2. **___ = 8 beads** Divide 72 by 9. Each student gets 8 beads.

CHALLENGE

Yes. The blank is 25 in both equations because 25 + 14 = 39 and 2 * 25 = 50.

Accept a number alone or an equation showing the blank equals the correct number. For the challenge, accept an explanation that identifies 25 and checks both equations.