LESSON MAKER PRO

Multiple Missions

Check which numbers belong in a multiplication pattern.

GRADE 4 · 4.OA.B.4.a

4.OA.B.4.a "Determine whether a whole number in the range 1 to 100 is a multiple of a given one-digit number."

NAME _____ DATE _____

HOW TO CHECK

A multiple of a number is the product of that number and a whole number. Divide to check: if there is no remainder, the larger number is a multiple.

WORKED EXAMPLE

Is 64 a multiple of 8?

1. Divide: 64 / 8 = 8.
2. Check: 8 x 8 = 64.
3. There is no remainder.

Answer: Yes, 64 is a multiple of 8.

PRACTICE 6 problems

1 Is 54 a multiple of 6? Write yes or no.

ANSWER _____

2 Is 58 a multiple of 9? Write yes or no.

ANSWER _____

3 Is 76 a multiple of 4? Write yes or no.

ANSWER _____

4 Is 91 a multiple of 3? Write yes or no.

ANSWER _____

5 Is 85 a multiple of 5? Write yes or no.

ANSWER _____

6 Is 99 a multiple of 2? Write yes or no.

ANSWER _____

APPLY IT Show your work

1 You have 72 trading cards. Can you put them into packs of 9 with no cards left over? Explain using a multiplication fact.

WORK SPACE

ANSWER _____

2 A game has 65 tokens. Can you put them into groups of 6 with none left over? Explain using a multiplication fact.

WORK SPACE

ANSWER _____

CHALLENGE One step up

Find the greatest whole number less than 100 that is a multiple of both 4 and 6. Show how you know it works and why no larger number can work.

WORK SPACE AND ANSWER

ANSWER KEY

Multiple Missions

GRADE 4 · 4.OA.B.4.a

PART 1 · PRACTICE

#	PROBLEM	ANSWER
1	Is 54 a multiple of 6? Write yes or no.	**Yes.**
2	Is 58 a multiple of 9? Write yes or no.	**No.**
3	Is 76 a multiple of 4? Write yes or no.	**Yes.**
4	Is 91 a multiple of 3? Write yes or no.	**No.**
5	Is 85 a multiple of 5? Write yes or no.	**Yes.**
6	Is 99 a multiple of 2? Write yes or no.	**No.**

PART 2 · APPLY IT

1. **Yes. 9 x 8 = 72.** Because 72 is a multiple of 9, all the cards fit into 8 packs.
2. **No. 6 x 10 = 60, leaving 5 tokens.** The next multiple, 6 x 11 = 66, is greater than 65.

CHALLENGE

96. It works because 4 x 24 = 96 and 6 x 16 = 96. The next multiple of 4 is 100, so no larger number below 100 can work.

Accept correct division facts in place of multiplication facts in the word problems. For the challenge, students must show both that 96 works and that no larger number below 100 works.