

Luna's Space Adventure

Grade 3 · Missing factors · 3.OA.A.4

Name _____

Date _____



Astronaut Luna is exploring a far-off corner of space. Solve each problem to help Luna's mission go smoothly!

Find the missing number

What number makes it true?

$15 \div \square = 5$

$24 \div \square = 3$

$56 \div 8 = \square$

$\square \times 7 = 49$

$\square \times 5 = 10$

$3 \times \square = 9$

$15 \div 3 = \square$

$54 \div \square = 9$

$16 \div \square = 8$

$\square \times 9 = 36$

$24 \div 6 = \square$

$24 \div 3 = \square$

Riddle time

Solve each one, then use the code to answer the riddle.

What holds the moon up in the sky?

$^1 10 \div 2 = \square$

$^2 72 \div 9 = \square$

$^3 24 \div 3 = \square$

$^4 70 \div 7 = \square$

$^5 42 \div 7 = \square$

$^6 16 \div 4 = \square$

$^7 16 \div 8 = \square$

$^8 15 \div 3 = \square$

$^9 6 \div 2 = \square$

2 = A 3 = S 4 = E 5 = M 6 = B 7 = C

8 = O 9 = W 10 = N 11 = R 12 = I

1

2

3

4

5

6

7

8

9

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ANSWER KEY



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Find the missing number What number makes it true?

$15 \div \boxed{3} = 5$

$24 \div \boxed{8} = 3$

$56 \div 8 = \boxed{7}$

$\boxed{7} \times 7 = 49$

$\boxed{2} \times 5 = 10$

$3 \times \boxed{3} = 9$

$15 \div 3 = \boxed{5}$

$54 \div \boxed{6} = 9$

$16 \div \boxed{2} = 8$

$\boxed{4} \times 9 = 36$

$24 \div 6 = \boxed{4}$

$24 \div 3 = \boxed{8}$

Riddle time Solve each one, then use the code to answer the riddle.

What holds the moon up in the sky?

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2 = A 3 = S 4 = E 5 = M 6 = B 7 = C

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 M O O N B E A M S
1 2 3 4 5 6 7 8 9

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GUIDE

1 What this sheet practises

Finding the missing number in a multiplication or division: $16 \div ? = 8$. Your child uses the facts they know to work backwards.

2 A problem from the sheet, worked out

Find the missing number What number makes it true?

$$15 \div \boxed{3} = 5$$

$$24 \div \boxed{8} = 3$$

$$56 \div 8 = \boxed{7}$$

$$\boxed{7} \times 7 = 49$$

$$\boxed{2} \times 5 = 10$$

$$3 \times \boxed{3} = 9$$

$$15 \div 3 = \boxed{5}$$

$$54 \div \boxed{6} = 9$$

$$16 \div \boxed{2} = 8$$

How: Read the equation as a question: $16 \div ? = 8$ asks what 16 is divided by to make 8. Think of the multiplication fact with the same numbers: $8 \times 2 = 16$.

3 Words to know

factor a number being multiplied

unknown the missing number

equation a number sentence with an equals sign

fact family facts that use the same three numbers

4 Watch for

- Working out the numbers shown ($16 \div 8$) instead of finding the missing one.
- Not checking the equation with the number filled in.
- Mixing up the multiplication and division facts.

5 Where it fits

BEFORE

1.OA.D.8

Find the missing number in an addition or subtraction equation.

THIS SHEET

3.OA.A.4

Find the missing number in a multiplication or division equation.

NEXT

4.OA.B.4

Find factor pairs and multiples, and tell prime from composite numbers.

6 Helping at home

Play “I’m thinking of a number”: I multiplied my number by 6 and got 30. What was it?