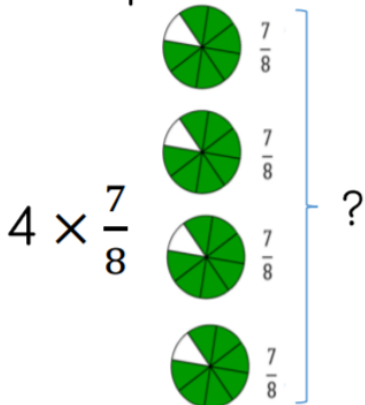


1.

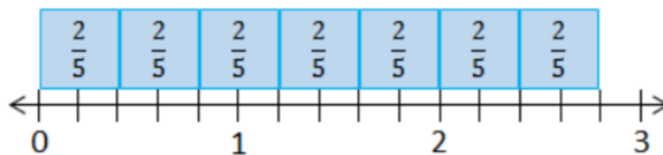
Complete:




$3 \times \frac{2}{3}$



$\frac{2}{5} \times 7$



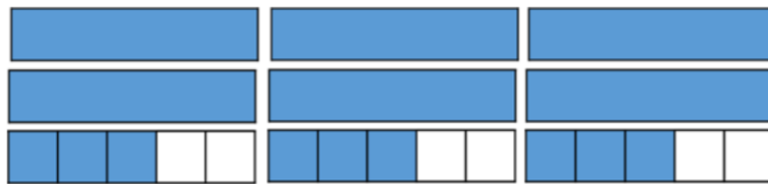
2.

Eva partitions $2 \frac{3}{5}$ to help her to calculate $2 \frac{3}{5} \times 3$ 

$2 \times 3 = 6$

$\frac{3}{5} \times 3 = \frac{9}{5} = 1 \frac{4}{5}$

$6 + 1 \frac{4}{5} = 7 \frac{4}{5}$



Use Eva's method to calculate:

$2 \frac{5}{6} \times 3$

$1 \frac{3}{7} \times 5$

$2 \frac{2}{3} \times 3$

$4 \times 1 \frac{1}{6}$

3.

Convert the mixed number to an improper fraction to multiply.

$2 \frac{3}{5} \times 3 = \frac{13}{5} \times 3 = \frac{39}{5} = 7 \frac{4}{5}$

Use this method to calculate:

$3 \times 2 \frac{2}{5}$

$1 \frac{5}{7} \times 3$

$2 \times 1 \frac{3}{4}$

$2 \times 1 \frac{1}{6}$

4.

Eva and Amir both work on a homework project.



Eva

I spent $4\frac{1}{4}$ hours a week for 4 weeks doing my project.

I spent $2\frac{3}{4}$ hours a week for 5 weeks doing my project.



Amir

Who spent the most time on their project?

Explain your reasoning.

5.

Dexter is calculating $\frac{1}{3} \times \frac{1}{2}$ by folding paper. He folds a piece of paper in half. He then folds the half into thirds. He shades the fraction of paper he has created. When he opens it up he finds he has shaded $\frac{1}{6}$ of the whole piece of paper.



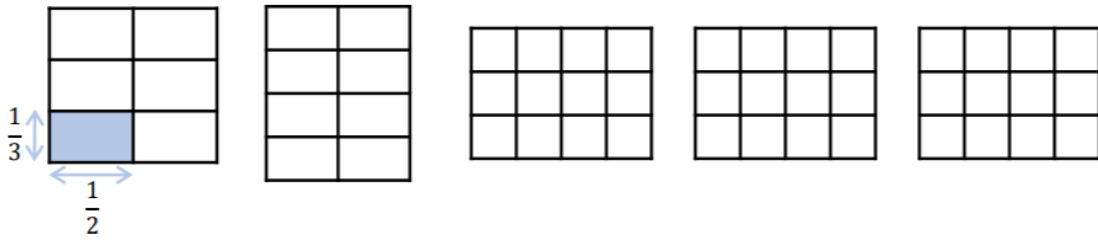
$\frac{1}{3} \times \frac{1}{2}$ means $\frac{1}{3}$ of a half. Folding half the paper into three equal parts showed me that $\frac{1}{3} \times \frac{1}{2} = \frac{1}{6}$

Represent and calculate the multiplications by folding paper.

$$\frac{1}{4} \times \frac{1}{2} = \quad \frac{1}{4} \times \frac{1}{3} = \quad \frac{1}{4} \times \frac{1}{4} =$$

6.

Alex is drawing diagrams to represent multiplying fractions.



Shade the diagrams to calculate:

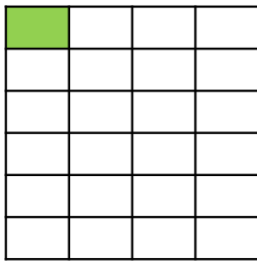
$$\frac{1}{3} \times \frac{1}{2} = \quad \frac{1}{4} \times \frac{1}{2} = \quad \frac{1}{3} \times \frac{1}{4} = \quad \frac{2}{3} \times \frac{1}{4} = \quad \frac{2}{3} \times \frac{3}{4} =$$

Write your answers in their simplest form.

7.

The shaded square in the grid below is the answer to a multiplying fractions question.

What was the question?



8.

Dexter has $\frac{2}{5}$ of a chocolate bar. He shares it with his friend. What fraction of the chocolate bar do they each get?



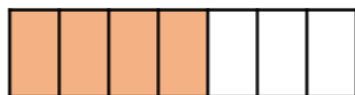
9.

Use the diagrams to help you calculate.

$$\frac{3}{4} \div 3 =$$



$$\frac{4}{7} \div 4 =$$



$$\frac{4}{7} \div 2 =$$



10.

Calculate.

$$\frac{1}{11} \div 1 = \quad \frac{2}{11} \div 2 = \quad \frac{3}{11} \div 3 = \quad \frac{4}{11} \div 4 =$$

$$\frac{2}{11} \div 2 = \quad \frac{4}{11} \div 2 = \quad \frac{6}{11} \div 2 = \quad \frac{8}{11} \div 2 =$$

$$\frac{3}{11} \div 3 = \quad \frac{6}{11} \div 3 = \quad \frac{9}{11} \div 3 = \quad 1\frac{1}{11} \div 3 =$$

11.

Tommy says,



Dividing by 2 is the same as finding half of a number so $\frac{4}{11} \div 2$ is the same as

$$\frac{1}{2} \times \frac{4}{11}$$

Do you agree?

Explain why.

12.

Match the equivalent calculations.

$$\frac{1}{4} \times \frac{12}{13}$$

$$\frac{12}{13} \div 2$$

$$\frac{1}{6} \times \frac{12}{13}$$

$$\frac{12}{13} \div 6$$

$$\frac{1}{2} \times \frac{12}{13}$$

$$\frac{12}{13} \div 4$$

$$\frac{1}{3} \times \frac{12}{13}$$

$$\frac{12}{13} \div 3$$

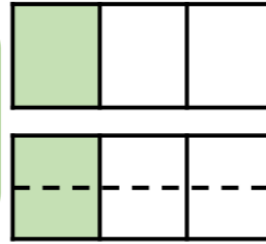
13.

Mo is dividing $\frac{1}{3}$ by 2



I have divided one third into 2 equal parts. Each part is worth $\frac{1}{6}$

$$\frac{1}{3} \div 2 = \frac{1}{6}$$



Draw diagrams to calculate:

$$\frac{1}{3} \div 3 = \quad \frac{2}{3} \div 3 = \quad \frac{1}{5} \div 3 = \quad \frac{2}{5} \div 3 =$$

14.

Calculate:

$$\frac{1}{5} \text{ of } 30 = \quad \frac{1}{5} \text{ of } 60 = \quad \frac{1}{5} \text{ of } 120 = \quad \frac{1}{5} \text{ of } 240 =$$

$$\frac{2}{5} \text{ of } 30 = \quad \frac{1}{5} \text{ of } 600 = \quad \frac{1}{10} \text{ of } 120 = \quad \frac{6}{5} \text{ of } 240 =$$

$$\frac{4}{5} \text{ of } 30 = \quad \frac{1}{5} \text{ of } 6,000 = \quad \frac{1}{20} \text{ of } 120 = \quad \frac{11}{5} \text{ of } 240 =$$

15.

Calculate:

$$\frac{1}{4} \text{ of } \underline{\quad} = 12 \quad \frac{1}{4} \text{ of } \underline{\quad} = 36 \quad \frac{1}{4} \text{ of } \underline{\quad} = 108$$

$$\frac{1}{12} \text{ of } \underline{\quad} = 12 \quad \frac{3}{4} \text{ of } \underline{\quad} = 36 \quad \frac{4}{4} \text{ of } \underline{\quad} = 108$$