

Name: Tues 23rd
Date: Mon 22nd Feb

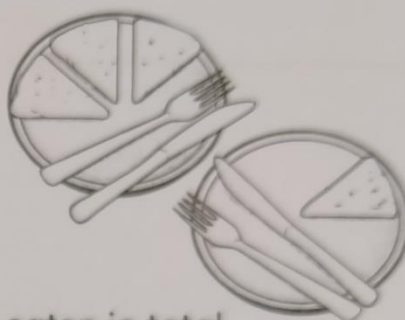
Problem solving – adding and subtracting fractions ②

- 1 Mo and Amelia each eat some Spanish omelette.

Mo eats $\frac{5}{8}$ of his Spanish omelette.

Amelia eats $\frac{7}{8}$ of her Spanish omelette.

What fraction has been eaten in total?



$\frac{12}{8}$ of the Spanish omelettes have been eaten in total.

- 2 The answer to each of the following questions is $\frac{7}{5}$.

Complete the questions.

a) $\frac{9}{5} - \frac{2}{5} = \frac{7}{5}$

e) $\frac{10}{5} - \frac{3}{5} = \frac{7}{5}$

b) $\frac{3}{5} + \frac{4}{5} = \frac{7}{5}$

f) $2 - \frac{3}{5} = \frac{7}{5}$

c) $\frac{1}{5} + \frac{1}{5} + \frac{5}{5} = \frac{7}{5}$

g) $2 - \frac{1}{5} - \frac{2}{5} = \frac{7}{5}$

d) $1 + \frac{2}{5} = \frac{7}{5}$

h) $\frac{1}{5} + \frac{3}{5} + \frac{3}{5} = \frac{7}{5}$ or $\frac{1}{5} + \frac{1}{5} + \frac{5}{5}$

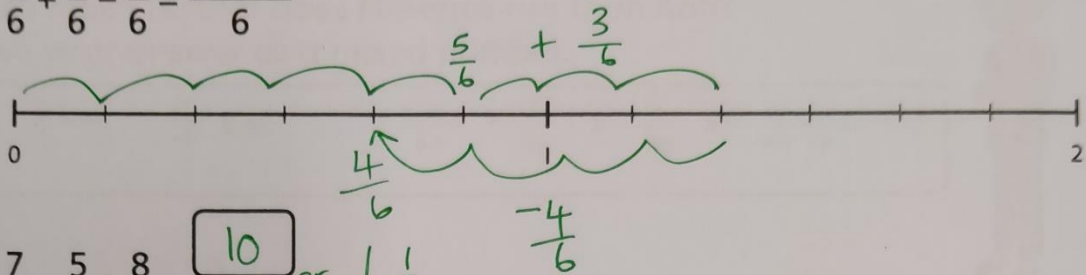
$\frac{1}{5} + \frac{2}{5} + \frac{4}{5}$ or $\frac{2}{5} + \frac{2}{5} + \frac{3}{5}$

I can see more than one answer to h). I wonder how many correct answers there are.

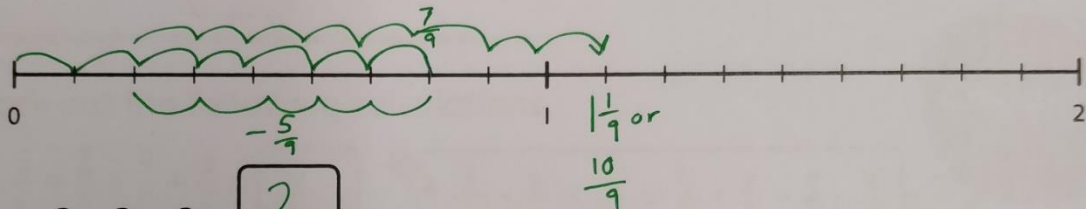


- 3 Use the number lines to help you complete the following calculations.

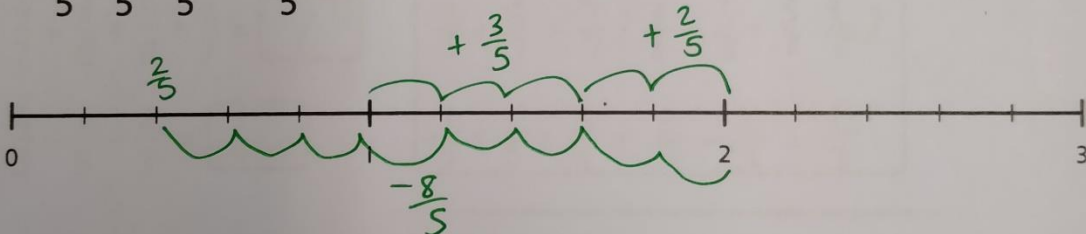
a) $\frac{5}{6} + \frac{3}{6} - \frac{4}{6} = \frac{\boxed{4}}{6}$



b) $\frac{7}{9} - \frac{5}{9} + \frac{8}{9} = \frac{\boxed{10}}{9}$ or $1\frac{1}{9}$



c) $1 + \frac{3}{5} + \frac{2}{5} - \frac{8}{5} = \frac{\boxed{2}}{5}$



- 4 Three jars contain $\frac{3}{8}$ kg, $\frac{7}{8}$ kg and $\frac{7}{8}$ kg of coffee.

Each jar can hold a total of 1 kg.

How many full jars of coffee can be made using the coffee?

Explain your answer.

$\frac{3}{8} + \frac{7}{8} + \frac{7}{8} = \frac{17}{8} = 2\frac{1}{8}$ Two full jars
with $\frac{1}{8}$ left over.

- 5 Florence and Kofi are running a race.

Florence runs 3 km in total. Kofi runs $\frac{3}{4}$ km in total.

How much further does Florence run than Kofi?

Give your answer as a mixed number.



$$3 \text{ km} - \frac{3}{4} \text{ km}$$

$$\frac{12}{4} - \frac{3}{4} = \frac{9}{4} \text{ or } 2\frac{1}{4}$$

Florence runs $2\frac{1}{4}$ km more than Kofi.

I will use a fraction strip to help me.



- 6 Work out the following calculations.

a) $\frac{3}{6} + \frac{2}{5} + \frac{3}{6} + \frac{3}{5} = \boxed{2}$

b) $\frac{4}{7} + \frac{3}{8} + \frac{5}{8} + \frac{3}{7} = \boxed{2}$

c) $\frac{4}{5} + \frac{1}{5} - \frac{2}{3} = \boxed{\frac{1}{3}}$



$$\frac{3}{6} + \frac{3}{6} = \frac{6}{6} = \frac{5}{5} + \frac{2}{5} + \frac{3}{5} = \frac{10}{5} = 2$$

$$\frac{4}{7} + \frac{3}{7} = \frac{7}{7} = \frac{8}{8} + \frac{3}{8} + \frac{5}{8} = \frac{8}{8} = 2$$

$$\frac{4}{5} + \frac{1}{5} = \frac{5}{5} = \frac{3}{3} - \frac{2}{3} = \frac{1}{3}$$

CHALLENGE

Reflect

The answer is $\frac{17}{10}$. What was the question?

Create your own calculation.

- This could be any calculation that equals $\frac{17}{10}$.
- _____
- _____
- _____