

Varied Fluency

Step 9: Add 3 or More Fractions

National Curriculum Objectives:

Mathematics Year 5: (5F4) [Add and subtract fractions with the same denominator and denominators that are multiples of the same number](#)

Differentiation:

Developing Questions to support adding three fractions together where two denominators are the same and the other denominator is either double or half. Models and pictorial representations used.

Expected Questions to support adding three or more fractions together where all denominators are direct multiples of each other. Models and pictorial representations used.

Greater Depth Questions to support adding three or more fractions together where denominators are not all direct multiples of each other.

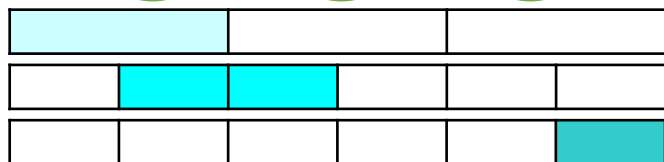
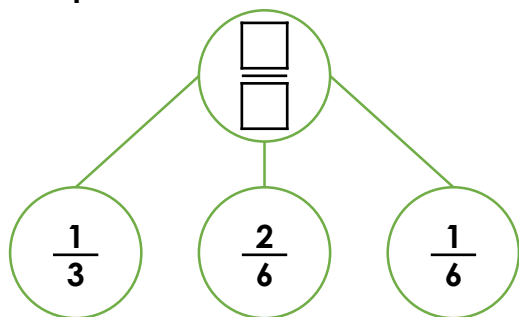
More [Year 5 Fractions](#) resources.

Did you like this resource? Don't forget to [review](#) it on our website.

Add 3 or More Fractions

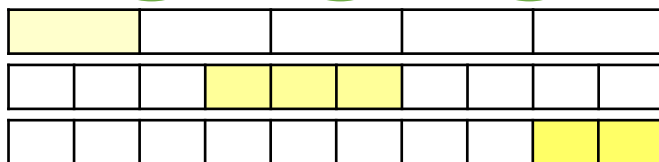
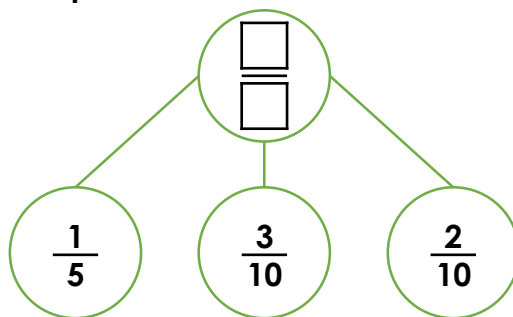
Add 3 or More Fractions

1a. Complete the model below.



VF

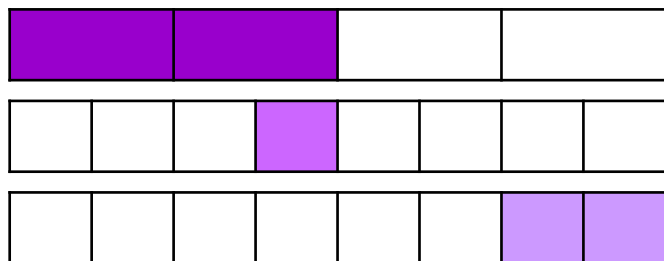
1b. Complete the model below.



VF

2a. Complete the calculation.

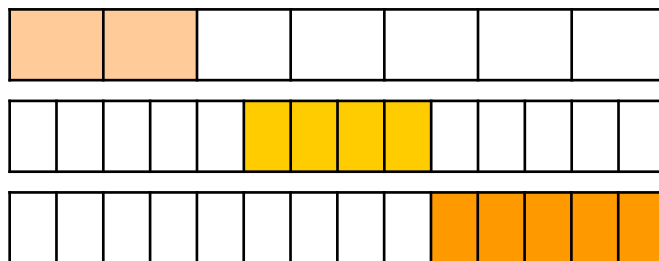
$$\frac{2}{4} + \frac{1}{8} + \frac{2}{8} = \frac{\boxed{}}{\boxed{}}$$



VF

2b. Complete the calculation.

$$\frac{2}{7} + \frac{4}{14} + \frac{5}{14} = \frac{\boxed{}}{\boxed{}}$$



VF

3a. Match the calculations to the correct answers.

A. $\frac{2}{8} + \frac{3}{16} + \frac{6}{16} =$



$\frac{15}{16}$

B. $\frac{1}{8} + \frac{7}{16} + \frac{6}{16} =$



$\frac{14}{16}$

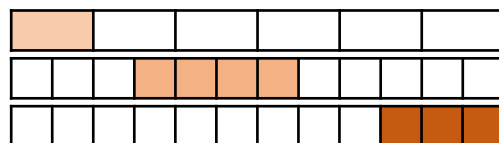
$\frac{13}{16}$



VF

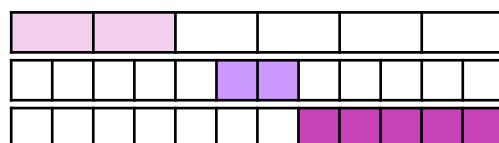
3b. Match the calculations to the correct answers.

A. $\frac{1}{6} + \frac{4}{12} + \frac{3}{12} =$



$\frac{11}{12}$

B. $\frac{2}{6} + \frac{2}{12} + \frac{5}{12} =$



$\frac{9}{12}$

$\frac{10}{12}$

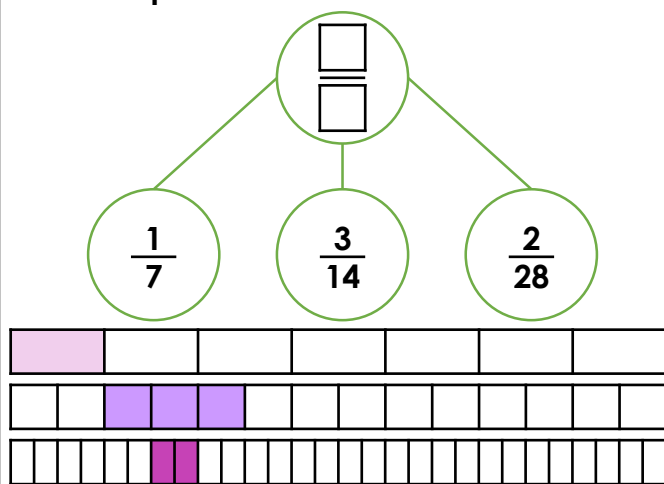


VF

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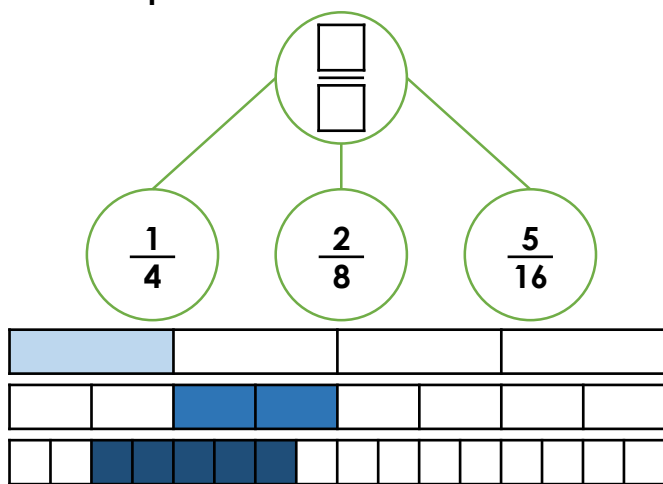
Add 3 or More Fractions

4a. Complete the model below.



VF

4b. Complete the model below.



VF

5a. Complete the calculation.

$$\frac{1}{3} + \frac{1}{6} + \frac{3}{12} = \frac{\boxed{}}{\boxed{}}$$



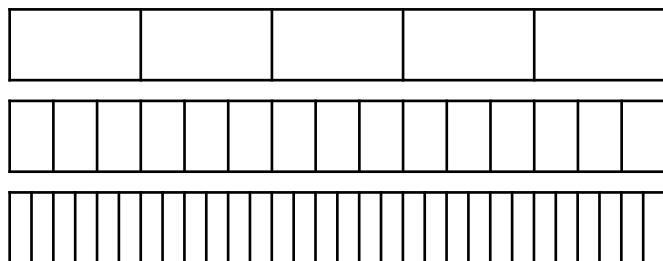
Shade the bar model to help you.



VF

5b. Complete the calculation.

$$\frac{1}{5} + \frac{2}{15} + \frac{3}{30} = \frac{\boxed{}}{\boxed{}}$$



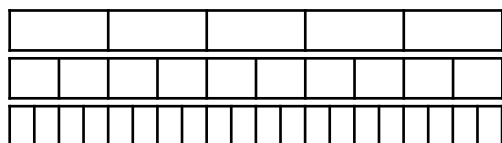
Shade the bar model to help you.



VF

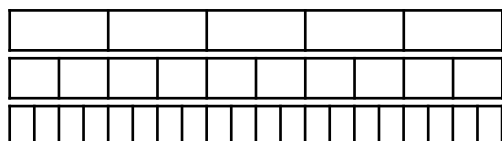
6a. Match the calculations to the correct answers.

A. $\frac{2}{5} + \frac{2}{10} + \frac{2}{20} =$



$\frac{15}{20}$

B. $\frac{1}{5} + \frac{4}{10} + \frac{3}{20} =$



$\frac{14}{20}$

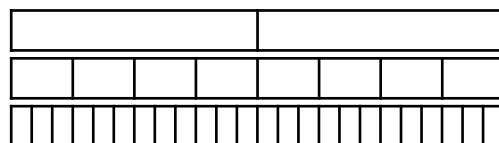
$\frac{16}{20}$



VF

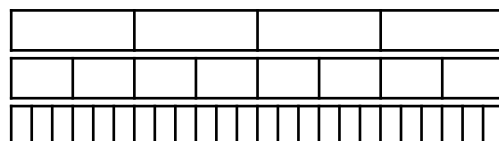
6b. Match the calculations to the correct answers.

A. $\frac{1}{2} + \frac{2}{8} + \frac{2}{24} =$



$\frac{22}{24}$

B. $\frac{1}{4} + \frac{3}{8} + \frac{6}{24} =$



$\frac{21}{24}$

$\frac{20}{24}$

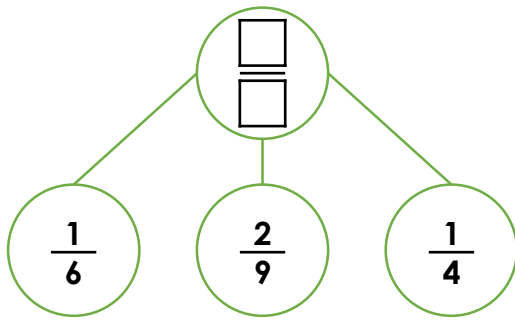


VF

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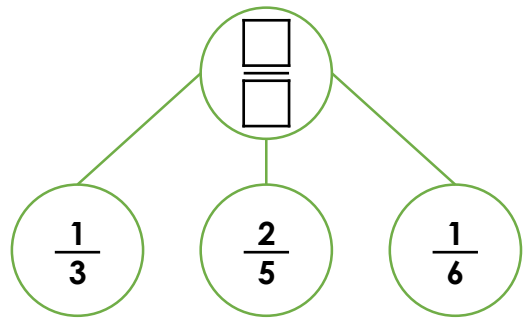
Add 3 or More Fractions

7a. Complete the model below.



VF

7b. Complete the model below.



VF

8a. Complete the calculation.

$$\frac{2}{3} + \frac{1}{7} + \frac{1}{6} = \frac{\boxed{}}{\boxed{}}$$



VF

8b. Complete the calculation.

$$\frac{1}{3} + \frac{2}{8} + \frac{2}{6} = \frac{\boxed{}}{\boxed{}}$$



VF

9a. Match the calculations to the correct answers.

A. $\frac{1}{4} + \frac{1}{6} + \frac{1}{3} =$ $\frac{3}{4}$

$\frac{16}{24}$

B. $\frac{1}{3} + \frac{1}{4} + \frac{1}{8} =$ $\frac{17}{24}$



VF

9b. Match the calculations to the correct answers.

A. $\frac{2}{5} + \frac{1}{6} + \frac{4}{15} =$ $\frac{9}{10}$

$\frac{5}{6}$

B. $\frac{1}{3} + \frac{1}{6} + \frac{6}{15} =$ $\frac{5}{10}$



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Developing

1a. $\frac{5}{6}$

2a. $\frac{7}{8}$

3a. $A = \frac{13}{16}$; $B = \frac{15}{16}$

Expected

4a. $\frac{12}{28}$ (accept equivalent fractions)

5a. $\frac{9}{12}$ or $\frac{3}{4}$

6a. $A = \frac{14}{20}$; $B = \frac{15}{20}$

Greater Depth

7a. $\frac{23}{36}$

8a. $\frac{41}{42}$

9a. $A = \frac{3}{4}$; $B = \frac{17}{24}$

Varied Fluency
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Developing

1b. $\frac{7}{10}$

2b. $\frac{13}{14}$

3b. $A = \frac{9}{12}$; $B = \frac{11}{12}$

Expected

4b. $\frac{13}{16}$

5b. $\frac{13}{30}$

6b. $A = \frac{20}{24}$; $B = \frac{21}{24}$

Greater Depth

7b. $\frac{27}{30}$ (accept equivalent fractions)

8b. $\frac{22}{24}$ (accept equivalent fractions)

9b. $A = \frac{5}{6}$; $B = \frac{9}{10}$