

# Excellence

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

2.  $2\frac{1}{4} \times \frac{4}{9}$ .

3.  $\frac{5}{6} \times \frac{9}{20}$ .

4.  $\frac{7}{12} \times \frac{18}{21}$ .

5. A student says  $\frac{3}{4} \times \frac{2}{5} = \frac{5}{8}$ .  
Are they correct? Explain.

6. A recipe uses  $\frac{3}{4}$  of a cup of milk per batch.  
You make  $\frac{2}{3}$  of a batch.  
How much milk is needed?

7. Find a fraction so that  
 $\frac{3}{5} \times \square = \frac{9}{20}$ .

8. Fill in both blanks:  $\frac{\square}{6} \times \frac{3}{4} = \frac{5}{8}$ .

Which is greater:  $\frac{5}{6} \times \frac{3}{10}$   
or  $\frac{2}{3} \times \frac{3}{8}$ ? Show enough  
working to justify.

10. Is  $\frac{4}{9} \times \frac{3}{8} = \frac{12}{72} = \frac{1}{6}$  correct? Explain.

11. A strip is  $\frac{5}{6}$  m long. You use  $\frac{3}{5}$  of it. How many metres is that?

12. Complete: if  $\frac{2}{7} \times \frac{m}{3} = \frac{4}{21}$ , then  $m = \underline{\hspace{2cm}}$ .

13. Write  $3 \times \frac{4}{15}$  as a single simplified fraction.

14. A tank is  $\frac{7}{8}$  full and then  $\frac{2}{3}$  of that water remains. What fraction of the whole tank remains?

15. Which does not belong:  $\frac{1}{2} \times \frac{2}{3}$ ,  $\frac{2}{3} \times \frac{1}{2}$ ,  $\frac{3}{4} \times \frac{4}{9}$ ,  $\frac{5}{6} \times \frac{1}{2}$ ?

16. Explain why  $\frac{4}{5} \times \frac{3}{4}$  can be simplified before multiplying.