

Dividiere die Brüche und wandle in einen gemischten Bruch um, falls möglich:

① a) $\frac{5}{14} : \frac{5}{6} =$

b) $\frac{11}{21} : \frac{1}{7} =$

c) $\frac{2}{3} : \frac{4}{25} =$

d) $\frac{12}{19} : \frac{3}{4} =$

② a) $\frac{1}{17} : \frac{5}{17} =$

b) $\frac{1}{42} : \frac{1}{44} =$

c) $\frac{3}{20} : \frac{3}{31} =$

d) $\frac{1}{4} : \frac{23}{34} =$

③ a) $\frac{3}{10} : \frac{6}{25} =$

b) $\frac{7}{8} : \frac{5}{14} =$

c) $\frac{3}{7} : \frac{13}{21} =$

d) $\frac{4}{9} : \frac{10}{11} =$

④ a) $\frac{17}{30} : \frac{1}{5} =$

b) $\frac{2}{35} : \frac{2}{37} =$

c) $\frac{1}{2} : \frac{23}{32} =$

d) $\frac{3}{11} : \frac{6}{17} =$

⑤ a) $\frac{5}{38} : \frac{1}{12} =$

b) $\frac{4}{13} : \frac{2}{23} =$

c) $\frac{7}{20} : \frac{3}{8} =$

d) $\frac{9}{10} : \frac{1}{10} =$

Dividiere die Brüche und wandle in einen gemischten Bruch um, falls möglich:

$$\textcircled{1} \quad \text{a) } \frac{5}{14} : \frac{5}{6} = \frac{5}{14} \cdot \frac{6}{5} = \frac{1 \cdot 3}{7 \cdot 1} = \frac{3}{7} \quad \text{b) } \frac{11}{21} : \frac{1}{7} = \frac{11}{21} \cdot \frac{7}{1} = \frac{11 \cdot 1}{3 \cdot 1} = 3 \frac{2}{3}$$

$$\text{c) } \frac{2}{3} : \frac{4}{25} = \frac{2}{3} \cdot \frac{25}{4} = \frac{1 \cdot 25}{3 \cdot 2} = 4 \frac{1}{6} \quad \text{d) } \frac{12}{19} : \frac{3}{4} = \frac{12}{19} \cdot \frac{4}{3} = \frac{4 \cdot 4}{19 \cdot 1} = \frac{16}{19}$$

$$\textcircled{2} \quad \text{a) } \frac{1}{17} : \frac{5}{17} = \frac{1}{17} \cdot \frac{17}{5} = \frac{1 \cdot 1}{1 \cdot 5} = \frac{1}{5} \quad \text{b) } \frac{1}{42} : \frac{1}{44} = \frac{1}{42} \cdot \frac{44}{1} = \frac{1 \cdot 22}{21 \cdot 1} = 1 \frac{1}{21}$$

$$\text{c) } \frac{3}{20} : \frac{3}{31} = \frac{3}{20} \cdot \frac{31}{3} = \frac{1 \cdot 31}{20 \cdot 1} = 1 \frac{11}{20} \quad \text{d) } \frac{1}{4} : \frac{23}{34} = \frac{1}{4} \cdot \frac{34}{23} = \frac{1 \cdot 17}{2 \cdot 23} = \frac{17}{46}$$

$$\textcircled{3} \quad \text{a) } \frac{3}{10} : \frac{6}{25} = \frac{3}{10} \cdot \frac{25}{6} = \frac{1 \cdot 5}{2 \cdot 2} = 1 \frac{1}{4} \quad \text{b) } \frac{7}{8} : \frac{5}{14} = \frac{7}{8} \cdot \frac{14}{5} = \frac{7 \cdot 7}{4 \cdot 5} = 2 \frac{9}{20}$$

$$\text{c) } \frac{3}{7} : \frac{13}{21} = \frac{3}{7} \cdot \frac{21}{13} = \frac{3 \cdot 3}{1 \cdot 13} = \frac{9}{13} \quad \text{d) } \frac{4}{9} : \frac{10}{11} = \frac{4}{9} \cdot \frac{11}{10} = \frac{2 \cdot 11}{9 \cdot 5} = \frac{22}{45}$$

$$\textcircled{4} \quad \text{a) } \frac{17}{30} : \frac{1}{5} = \frac{17}{30} \cdot \frac{5}{1} = \frac{17 \cdot 1}{6 \cdot 1} = 2 \frac{5}{6} \quad \text{b) } \frac{2}{35} : \frac{2}{37} = \frac{2}{35} \cdot \frac{37}{2} = \frac{1 \cdot 37}{35 \cdot 1} = 1 \frac{2}{35}$$

$$\text{c) } \frac{1}{2} : \frac{23}{32} = \frac{1}{2} \cdot \frac{32}{23} = \frac{1 \cdot 16}{1 \cdot 23} = \frac{16}{23} \quad \text{d) } \frac{3}{11} : \frac{6}{17} = \frac{3}{11} \cdot \frac{17}{6} = \frac{1 \cdot 17}{11 \cdot 2} = \frac{17}{22}$$

$$\textcircled{5} \quad \text{a) } \frac{5}{38} : \frac{1}{12} = \frac{5}{38} \cdot \frac{12}{1} = \frac{5 \cdot 6}{19 \cdot 1} = 1 \frac{11}{19} \quad \text{b) } \frac{4}{13} : \frac{2}{23} = \frac{4}{13} \cdot \frac{23}{2} = \frac{2 \cdot 23}{13 \cdot 1} = 3 \frac{7}{13}$$

$$\text{c) } \frac{7}{20} : \frac{3}{8} = \frac{7}{20} \cdot \frac{8}{3} = \frac{7 \cdot 2}{5 \cdot 3} = \frac{14}{15} \quad \text{d) } \frac{9}{10} : \frac{1}{10} = \frac{9}{10} \cdot \frac{10}{1} = \frac{9 \cdot 1}{1 \cdot 1} = 9$$