



#### Fractions Ex 6.5 Q4

**Answer :**

(i)

$$\frac{3}{5} = \frac{9}{15}$$

Consider the numerators.

As  $3 \times 3 = 9$ , we will multiply both the numerator & denominator by 3.

$$\Rightarrow \frac{3}{5} \times \frac{3}{3} = \frac{9}{15}$$

(ii)

$$\frac{3}{5} = \frac{18}{30}$$

Consider the denominators.

As  $5 \times 6 = 30$ , we will multiply both the numerator & denominator by 6.

$$\Rightarrow \frac{3}{5} \times \frac{6}{6} = \frac{18}{30}$$

(iii)

$$\frac{3}{5} = \frac{21}{35}$$

Consider the denominators.

As  $5 \times 7 = 35$ , we will multiply both the numerator & denominator by 7.

$$\Rightarrow \frac{3}{5} \times \frac{7}{7} = \frac{21}{35}$$

(iv)

$$\frac{3}{5} = \frac{24}{40}$$

Consider the denominators.

As  $5 \times 8 = 40$ , we will multiply both the numerator & denominator by 8.

$$\Rightarrow \frac{3}{5} \times \frac{8}{8} = \frac{24}{40}$$

#### Fractions Ex 6.5 Q5

**Answer :**

(i)

$$\frac{45}{60} = \frac{15}{\text{Denominator}}$$

We will consider the numerators.

As  $45 \div 3 = 15$ , we will divide both the numerator & denominator by 3.

$$\Rightarrow \left( \frac{\frac{45}{3}}{\frac{60}{3}} \right) = \frac{15}{20}$$

(ii)

$$\frac{45}{60} = \frac{\text{Numerator}}{4}$$

We will consider the denominators.

As  $60 \div 15 = 4$ , we will multiply both the numerator & denominator by 15.

$$\Rightarrow \left( \frac{\frac{45}{15}}{\frac{60}{15}} \right) = \frac{3}{4}$$

(iii)

$$\frac{45}{60} = \frac{\text{Numerator}}{240}$$

We will consider the denominators.

As  $60 \times 4 = 240$ , we will multiply both the numerator & denominator by 4.

$$\Rightarrow \frac{45}{60} \times \frac{4}{4} = \frac{180}{240}$$

(iv)

$$\frac{45}{60} = \frac{135}{\text{Denominator}}$$

We will consider the numerators.

As  $45 \times 3 = 135$ , we will multiply both the numerator & denominator by 3.

$$\Rightarrow \frac{45}{60} \times \frac{3}{3} = \frac{135}{180}$$

#### Fractions Ex 6.5 Q6

Answer :

Firstly, we will reduce  $\frac{35}{42}$  into the lowest term.

Now, we will divide both the numerator & denominator by the HCFs of 35 & 42.

$$\Rightarrow \frac{35 \div 7}{42 \div 7} = \frac{5}{6}$$

$$(i) \quad \frac{5}{6} = \frac{15}{\text{Denominator}}$$

We will consider the numerators.

As  $5 \times 3 = 15$ , we will multiply both the numerator & denominator by 3.

$$\Rightarrow \frac{5 \times 3}{6 \times 3} = \frac{15}{18}$$

$$(ii) \quad \frac{5}{6} = \frac{\text{Numerator}}{18}$$

We will consider the denominators.

As  $6 \times 3 = 18$ , we will multiply both the numerator & denominator by 3.

$$\Rightarrow \frac{5 \times 3}{6 \times 3} = \frac{15}{18}$$

$$(iii) \quad \frac{5}{6} = \frac{\text{numerator}}{30}$$

We will consider the denominators ,

Since,  $6 \times 5 = 30$ , therefore multiplying both the numerator & denominator by 5

$$\Rightarrow \frac{5 \times 5}{6 \times 5} = \frac{25}{30}$$

$$(iv) \quad \frac{5}{6} = \frac{30}{\text{Denominator}}$$

We will consider the numerators.

As  $5 \times 6 = 30$ , we will multiply both the numerator & denominator by 6.

$$\Rightarrow \frac{5 \times 6}{6 \times 6} = \frac{30}{36}$$

\*\*\*\*\* END \*\*\*\*\*