

## Divide Mixed Numbers (7-5)

Dividing Mixed Numbers	
Step 1	Change the <u>mixed numbers</u> to <u>improper fractions</u> .
Step 2	<u>divide (KCF)</u> the fractions.
Step 3	<u>Simplify</u> , if possible.

**Example 1:** Divide the fractions.

I Do	We Do
$4\frac{2}{5} \div 12$ $\frac{22}{5} \div \frac{12}{1}$ $\parallel \frac{22}{5} \cdot \frac{1}{12} = \frac{11}{30}$	$3\frac{1}{7} \div \frac{13}{14}$ $\frac{22}{7} \div \frac{13}{14}$ $\frac{22}{7} \cdot \frac{14}{13} = \frac{44}{13}$ $= 3\frac{5}{13}$

**Example 2:** Divide the mixed numbers.

$$\frac{\cancel{28}}{5} \div \frac{\cancel{21}}{\cancel{15}}$$

I Do	We Do
$5\frac{3}{5} \div 1\frac{6}{15}$ ① $\frac{28}{5} \div \frac{21}{15}$ ② $4\frac{\cancel{28}}{15} \cdot \frac{\cancel{15}^3}{\cancel{21}_3} = \frac{12}{3} = 4$	$6\frac{1}{4} \div 1\frac{1}{14}$ $\frac{25}{4} \div \frac{15}{14}$ $5\frac{\cancel{25}}{4} \cdot \frac{\cancel{14}^7}{\cancel{15}_3} = \frac{35}{6}$
$\boxed{4}$	$\boxed{5\frac{5}{6}}$

**Example 3:** Use what you know about fractions to divide.

I Do
<p>You have 30 pounds of sunflower seeds. If you want to divide the seeds into <math>\frac{1}{5}</math> pound bags, how many bags will you need?</p> $30 \div 1\frac{1}{5}$ $\frac{30}{1} \div \frac{6}{5}$ $5\frac{\cancel{30}}{1} \cdot \frac{\cancel{5}}{\cancel{6}_1} = \frac{25}{1} = \boxed{25 \text{ bags}}$