## Adding Rational Numbers

Adding rational numbers follows the same rules as adding numerical fractions.

$$
\frac{a}{c}+\frac{b}{c}=\frac{a+b}{c}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{1}{9}+\frac{5}{12}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{4}{21}+\frac{7}{15}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{2}{7 x^{2}}+\frac{3 x}{14}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{5 x}{27}+\frac{4 x}{15}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{2 x-4}{x-2}+\frac{x+1}{2}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{6}{x+1}+\frac{5 x}{4}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{7}{3}+\frac{3}{12 x-8}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{2}{3 x^{2}+x}+\frac{8}{2 x}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{x+2}{2 x-2}+\frac{-2 x-1}{x^{2}-4 x+3}
$$

## Subtracting Rational Numbers

Subtracting rational numbers follows the same rules as subtracting numerical fractions.

$$
\frac{a}{c}-\frac{b}{c}=\frac{a-b}{c}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{3}{4 x}-\frac{x^{2}}{28}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{x}{x^{2}-x-12}-\frac{5}{12 x-48}
$$

Find the Least Common Denominator (LCD), rewrite the addition equation, and solve.

$$
\frac{x+1}{x^{2}+4 x+4}-\frac{6}{x^{2}-4}
$$

