

- Use long division to divide:  $\frac{3x^2 + 3x - 14}{x - 2}$

$$\begin{array}{r}
 3x + 9 \\
 x - 2 \overline{) 3x^2 + 3x - 14} \\
 \underline{-(3x^2 - 6x)} \phantom{-14} \\
 9x - 14 \\
 \underline{-(9x - 18)} \\
 4
 \end{array}$$

$$3x + 9 + \frac{4}{x - 2}$$

- Use long division to divide:  $(6x^3 - 5x^2 - 3) \div (3x + 2)$

$$\begin{array}{r}
 2x^2 - 3x + 2 \\
 3x + 2 \overline{) 6x^3 - 5x^2 + 0x - 3} \\
 \underline{-(6x^3 + 4x^2)} \phantom{-3} \\
 -9x^2 + 0x \phantom{-3} \\
 \underline{-(-9x^2 - 6x)} \phantom{-3} \\
 6x - 3 \phantom{-3} \\
 \underline{-(6x + 4)} \\
 -7
 \end{array}$$

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