

Divide by long division or synthetic division.

1. $\frac{x^2 + 9x - 7}{x - 3}$

2. $(2x^3 + 7x^2 - 18x - 22) \div (x + 4)$

3. $\frac{2x^3 + 3x^2 - 8x - 12}{2x + 3}$

4. $(3x^3 - 5x^2 + 10x - 3) \div (3x + 1)$

5. $(x^3 - 2x^2 - 75) \div (x - 5)$

6. $\frac{x^4 + 4x^2 - 45}{x^2 + 9}$

$$7. (4x^4 + 3x^3 + 2x + 1) \div (x^2 + x + 2)$$

$$8. (x^3 - 27) \div (x - 3)$$

$$9. (2x^4 + 5x^3 + 11x^2 + 35x - 21) \div (2x - 1)$$

$$10. \frac{2x^3 - 9x^2 + 15}{2x - 5}$$