

Exercice 1

Factoriser chacune des expressions littérales suivantes :

$$\begin{array}{l} A = 9x^2 - 42x + 49 \\ B = (6x + 5) \times (-7x + 2) + (5x - 5) \times (6x + 5) \\ C = 100x^2 - 100 \end{array} \quad \left| \quad \begin{array}{l} D = (x - 7)^2 - 16 \\ E = (10x + 2) \times (10x + 8) - (10x + 2) \\ F = (2x - 5) \times (8x + 10) + (8x + 10)^2 \end{array} \right.$$

Exercice 2

Factoriser chacune des expressions littérales suivantes :

$$\begin{array}{l} A = x^2 - 8x + 16 \\ B = -(x + 9)^2 + 16 \\ C = (x + 5) \times (3x + 10) + (x + 5) \times (4x + 10) \end{array} \quad \left| \quad \begin{array}{l} D = 81x^2 - 36 \\ E = (3x - 4)^2 + (3x - 4) \times (6x + 9) \\ F = -(7x + 5) \times (4x + 1) + 7x + 5 \end{array} \right.$$

Exercice 3

Factoriser chacune des expressions littérales suivantes :

$$\begin{array}{l} A = (-5x - 7) \times (10x - 10) + (-5x - 7) \times (-8x + 6) \\ B = x^2 + 16x + 64 \\ C = (x + 8)^2 - 49x^2 \end{array} \quad \left| \quad \begin{array}{l} D = 4x^2 - 16 \\ E = -(6x - 3) + (2x - 3) \times (6x - 3) \\ F = (-9x + 10) \times (7x - 1) + (-9x + 10)^2 \end{array} \right.$$

Exercice 4

Factoriser chacune des expressions littérales suivantes :

$$\begin{array}{l} A = (9x + 8) \times (x - 2) + (5x + 1) \times (9x + 8) \\ B = 100x^2 - 140x + 49 \\ C = (-x + 8)^2 - 64 \end{array} \quad \left| \quad \begin{array}{l} D = -25x^2 + 25 \\ E = -(7x - 1) \times (x + 5) + x + 5 \\ F = (9x + 2) \times (10x + 8) + (9x + 2)^2 \end{array} \right.$$

Exercice 5

Factoriser chacune des expressions littérales suivantes :

$$\begin{array}{l} A = (5x + 3) \times (3x + 10) + (-x + 8) \times (5x + 3) \\ B = (6x - 8)^2 - 64x^2 \\ C = 4x^2 - 8x + 4 \end{array} \quad \left| \quad \begin{array}{l} D = 49x^2 - 100 \\ E = 4x + 1 + (4x + 1) \times (5x + 3) \\ F = (x + 4) \times (8x + 2) - (8x + 2)^2 \end{array} \right.$$

Exercice 6

Factoriser chacune des expressions littérales suivantes :

$$\begin{array}{l} A = (5x + 10) \times (x + 4) + (-7x - 9) \times (x + 4) \\ B = 49x^2 + 126x + 81 \\ C = x^2 - (5x - 8)^2 \end{array} \quad \left| \quad \begin{array}{l} D = -64x^2 + 9 \\ E = (6x + 10) \times (4x + 6) - (6x + 10)^2 \\ F = (9x + 10) \times (9x + 2) + 9x + 2 \end{array} \right.$$