

# PEMDAS with Polynomials Lesson Check-In **ANSWERS**

(1) Choose the correct answer to the question. \*

Which expression is equivalent to  $2(x^2 - 1) + 3x(x - 4)$ ?

A.  $5x^2 - 5$

C.  $5x^2 - 6$

B.  $5x^2 - 12x - 1$

D.  $5x^2 - 12x - 2$

Mark only one oval.

A.

B.

C.

D.

$$\begin{aligned} & 2(x^2 - 1) + 3x(x - 4) \\ & 2x^2 - 2 + 3x^2 - 12x \\ & 2x^2 - 2 + 3x^2 - 12x \\ & 5x^2 - 12x - 2 \end{aligned}$$

(2) Choose the correct answer to the question. \*

The expression  $2(x^2 + 3x - 5) - 3(2x^2 - 7x + 8)$  is equivalent to

A.  $-4x^2 + 27x - 34$

C.  $-4x^2 - 15x + 14$

B.  $-8x^2 + 27x - 34$

D.  $-8x^2 - 15x + 14$

Mark only one oval.

A.

B.

C.

D.

$$\begin{aligned} & 2(x^2 + 3x - 5) - 3(2x^2 - 7x + 8) \\ & 2x^2 + 6x - 10 - 6x^2 + 21x - 24 \\ & 2x^2 + 6x - 10 - 6x^2 + 21x - 24 \\ & -4x^2 + 27x - 34 \end{aligned}$$

(3) Choose the correct answer to the question. \*

The expression  $(5x^2 + 1) + (3x - 2)^2$  is equivalent to

A.  $5x^2 + 3x - 1$

C.  $5x^2 + 6x - 3$

B.  $14x^2 + 12x - 3$

D.  $14x^2 - 12x + 5$

Mark only one oval.

A.

B.

C.

D.

$$\begin{aligned} & (5x^2 + 1) + (3x - 2)(3x - 2) \\ & 5x^2 + 1 + 9x^2 - 6x - 6x + 4 \\ & 5x^2 + 1 + 9x^2 - 6x - 6x + 4 \\ & 14x^2 - 12x + 5 \end{aligned}$$

(4) Choose the correct answer to the question. \*

Perform the indicated operations:  $(x + 4)(x + 2) - (3x + 5)(x + 1)$

A.  $-2x^2 + 14x + 13$

C.  $-4x^2 + 13$

B.  $-2x^2 - 2x + 3$

D.  $-4x^2 + 3$

Mark only one oval.

A.

B.

C.

D.

$$\begin{aligned} & (x + 4)(x + 2) - (3x + 5)(x + 1) \\ & (x^2 + 2x + 4x + 8) - (3x^2 + 3x + 5x + 5) \\ & (x^2 + 6x + 8) - 1(3x^2 + 8x + 5) \quad \text{distribute -1} \\ & x^2 + 6x + 8 - 3x^2 - 8x - 5 \\ & x^2 + 6x + 8 - 3x^2 - 8x - 5 \\ & -2x^2 - 2x + 3 \end{aligned}$$