

Accuplacer Study Modules

TOPIC: Add and Subtract Polynomials

1. Add the polynomials.
 $(4t + 9) + (4t^2 + 5t)$

$(4t^2 + 5t) + (4t + 9)$ Arrange with the highest degree first.

$4t^2 + 5t + 4t + 9$ Group the like terms.

$4t^2 + 9t + 9$ Combine like terms.

Answer

2. Find the perimeter of a rectangle with a length of q and a width of $(q-2)$.

$P = 2q + 2(q-2)$

Perimeter of a rectangle = $2l + 2w$

or

$q + q + (q-2) + (q-2)$

$q + q + q + q - 2 - 2$ Group the like terms.

$P = 4q - 4$ Combine like terms.

units

Answer

3. Find the difference.
 $(x^3 + 3x^2 + 5x - 4) - (3x^3 - 8x^2 - 5x + 6)$

Reverse the sign of each term we are subtracting.

$(x^3 + 3x^2 + 5x - 4) + (-3x^3 + 8x^2 + 5x - 6)$

Group the like terms.

$x^3 - 3x^3 + 3x^2 + 8x^2 + 5x + 5x - 4 - 6$

Combine like terms.

$-2x^3 + 11x^2 + 10x - 10$ Answer

4. Find the perimeter of a triangle with side lengths: 6 , $(b-1)$, and $(b-2)$.

$P = (b-1) + (b-2) + 6$ Perimeter = sum of the sides

$b + b - 1 - 2 + 6$ Group the like terms.

$P = 2b + 3$ Combine like terms.

units

Answer