Section 6.3 Multiplying Polynomials

# Objective 1: Using the Distributive Property to Multiply Polynomials

To multiply a monomial times a polynomial that is not a monomial, use the distributive property.

Multiply.

|  |  |
| --- | --- |
| a.  | b.  |

The distributive property can also be used to multiply two binomials.

For example, to multiply , we can first distribute the to each factor in the second parentheses.

We can now apply the distributive property again to clear the parentheses. Then, combine the like terms.

Multiply.

|  |  |
| --- | --- |
| c.  | d.  |
| e.  | f.  |

g. Write the expression as a polynomial in standard form.

The distributive property can be applied to find the product of any two polynomials.

Multiply.

h.

i. Write the expression as a polynomial in standard form.