Algebra 2 6.4 Proving Identities

b) Algebraically prove the following identities.

1. $(a - b)^2 = a^2 - 2ab + b^2$

b)

2. $a^3 + b^3 = (a + b)(a^2 - ab + b^2)$

b)

3. $(ax + b)(x + a) = ax^2 + a^2x + bx + ab$

b)

4. $(a + b)^3 = a^3 + b^3 + 3a^2b + 3ab^2$

b)