

بعض أشكال عملية الضرب

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

مثال

$$(3J + 5E)^2 = (3J)^2 + 2(3J)(5E) + (5E)^2 \\ = 9J^2 + 30EJ + 25E^2$$

$$(5A + 4Q)^2 = (5A)^2 + 2(5A)(4Q) + (4Q)^2 \\ = 25A^2 + 40AQ + 16Q^2$$

$$(3X + 2S)^2 = (3X)^2 + 2(3X)(2S) + (2S)^2 \\ = 9X^2 + 12SX + 4S^2$$

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

مثال

$$(4D - 2R)^2 = (4D)^2 - 2(4D)(2R) + (2R)^2 \\ = 16D^2 - 16DR + 4R^2$$

$$(J - 4Y)^2 = (J)^2 - 2(J)(4Y) + (4Y)^2 \\ = J^2 - 8JY + 16Y^2$$

$$(2D - 5F)^2 = (2D)^2 - 2(2D)(5F) + (5F)^2 \\ = 4D^2 - 20DF + 25F^2$$

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

مثال

$$(2X + 4U)(2X - 4U) = (2X)^2 - (4U)^2 \\ = 4X^2 - 16U^2$$

$$(2u + 3s)(2u - 3s) = (2u)^2 - (3s)^2 \\ = 4u^2 - 9s^2$$

$$(A + 3H)(A - 3H) = (A)^2 - (3H)^2 \\ = A^2 - 9H^2$$