

بعض أشكال عملية الضرب

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

مثال

$$(4Z + 3H)^2 = (4Z)^2 + 2(4Z)(3H) + (3H)^2 \\ = 16Z^2 + 24HZ + 9H^2$$

$$(4M + 5S)^2 = (4M)^2 + 2(4M)(5S) + (5S)^2 \\ = 16M^2 + 40MS + 25S^2$$

$$(3G + 5E)^2 = (3G)^2 + 2(3G)(5E) + (5E)^2 \\ = 9G^2 + 30EG + 25E^2$$

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

مثال

$$(3S - 5R)^2 = (3S)^2 - 2(3S)(5R) + (5R)^2 \\ = 9S^2 - 30RS + 25R^2$$

$$(4z - i)^2 = (4z)^2 - 2(4z)(i) + (i)^2 \\ = 16z^2 - 8iz + i^2$$

$$(3n - 4e)^2 = (3n)^2 - 2(3n)(4e) + (4e)^2 \\ = 9n^2 - 24en + 16e^2$$

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

مثال

$$(m + 5h)(m - 5h) = (m)^2 - (5h)^2 \\ = m^2 - 25h^2$$

$$(d + 5r)(d - 5r) = (d)^2 - (5r)^2 \\ = d^2 - 25r^2$$

$$(2K + N)(2K - N) = (2K)^2 - (N)^2 \\ = 4K^2 - N^2$$