

حلول تمارين درس مفهوم معادلة -1-(1) العبارات الحرفية:1.1. تبسيط حساب حرفي:حل التمرين 1:

$9 \times n = 9n$	$x \times 3 = 3x$	$12 \times (7 - 3) = 12 \times (7 - 3)$
$4 \times (3, 2 + 6) = 4 \times (3, 2 + 6)$	$n \times x = nx$	$2 \times \pi \times r = 2\pi r$
$(3 + 6) \times (7 - 1) = (3 + 6)(7 - 1)$		$16 \times 3,5 \times x = 16 \times 3,5x$

حل التمرين 2:

$3 \times a \times b = 3ab$	$3 \times a + 3 \times b = 3a + 3b$	$8 \times a \times 2 = 16a$
$5 + 3 \times b = 5 + 3b$	$5 \times a + 3 \times 2 = 5a + 6b$	$2 \times 3 \times a \times (b \times c) = 6abc$
$c \times c \times 3 = 3c^2$	$9 + d \times d \times d = 9 + d^3$	

حل التمرين 3:

$1 \times a + a \times a = a + a^2$	$a \times a \times a - 0 \times b = a^3$	$6 \times a \times a - a = 6a^2 - a$
$2 \times a \times 3 \times a = 6a^2$	$a \times a \times b \times 3 = 3a^2b$	$1 \times a \times a \times b + 2 = a^2b + 2$
$a \times 2 \times b \times a \times b = 2a^2b^2$	$(a + b) \times (a + b) = (a + b)(a + b)$	

حل التمرين 4:

$(4,5 + 6) \times a = (4,5 + 6)a$
$(3,5 + 5) \times a + (5,1 - 1) \times b = (3,5 + 5)a + (5,1 - 1)b$
$(3,5 - 3 \times x) \times (10 + 2 \times x) = (3,5 - 3x)(10 + 2x)$
$10 \times a \times 2 \times b = 20ab$
$(7,5 - 3 \times a) \times (1,5 \times b - 1) = (7,5 - 3a)(1,5b - 1)$
$(1,6 - 0,2 \times a) \times (10 + a) \times a = (1,6 - 0,2a)(10 + a)a$

حل التمرين 5:

$3 \times a \times 5 = 15a$	$8 \times a \times 3 \times b = 24ab$	$2 \times a + 5 \times b = 2a + 5b$
$a \times a - 4 = a^2 - 4$	$3 \times x - 4 \times y = 3x - 4y$	$3 + 2 \times 1,5 \times b = 3 + 3b$
$3 \times a + 2 = 3a + 2$		$5 \times (3 \times b + 2) = 5(3b + 2)$

حل التمرين 6:

$x \times x \times x \times 3 = 3x^3$	$x \times x + 2 \times x = x^2 + 2x$	$x \times 2 \times x + 5 = 2x^2 + 5$
$x \times x \times x + 2 = x^3 + 2$	$x \times 8 + y \times 5 = 8x + 5y$	$6 \times a \times a \times 3 \times a = 18a^3$
$7 + a \times 5 \times a \times a = 7 + 5a^3$		$5 \times (2 + 6 \times b) = 5(2 + 6b)$

1.2. إيجاد علامات الضرب المخفية:

حل التمرين 1:

$5a^2 = 5 \times a \times a$	$2 - b^3 = 2 - b \times b \times b$
$a^2 + 2b^3 = a \times a + 2 \times b \times b \times b$	$a^2 b^3 = a \times a \times b \times b \times b$
$x^2 + 2xy + y^2 = x \times x + 2 \times x \times y + y \times y$	$x^2 + 3x + 2y = x \times x + 3 \times x + 2 \times y$
$x^2 y = x \times x \times y$	$x^2 + y^2 = x \times x + y \times y$

حل التمرين 2:

$6a + 3e = 6 \times a + 3 \times e$	$4bf = 4 \times b \times f$	$5(9 + c^2) = 5 \times (9 + c \times c)$
$16d^3 = 16 \times d \times d \times d$	$2a + 3b - 4c^2 = 2 \times a + 3 \times b - 4 \times c \times c$	
$3ab - 5a + 7bc = 3 \times a \times b - 5 \times a + 7 \times b \times c$		
$8c^2 - 1 + 2c^3 = 8 \times c \times c - 1 + 2 \times c \times c \times c$		
$2d + 3d^2 = 2 \times d + 3 \times d \times d$		

حل التمرين 3:

$49x + 63x^2 = 49 \times x + 63 \times x \times x$	$14x - 21y^2 = 14 \times x - 21 \times y \times y$
$3x^2 + 5x = 3 \times x \times x + 5 \times x$	$2x^2 + 5x = 2 \times x \times x + 5 \times x$
$6x - 21x^2 = 6 \times x - 21 \times x \times x$	$2x^2 - 6y^2 = 2 \times x \times x - 6 \times y \times y$
$35x + 49y^2 = 35 \times x + 49 \times y \times y$	$7x + 21x^2 = 7 \times x + 21 \times x \times x$

حل التمرين 4:

$7x^2 + 10x = 7 \times x \times x + 10 \times x$	$-5x - 15x^2 = -5 \times x - 15 \times x \times x$
$2(3x - 6y) = 2 \times (3 \times x - 6 \times y)$	$24x + 27y = 24 \times x + 27 \times y$
$3x^2 + 5xy = 3 \times x \times x + 5 \times x \times y$	$35x - 4xy^2 = 35 \times x - 4 \times x \times y \times y$
$6xy - 7x^2 = 6 \times x \times y - 7 \times x \times x$	$-21x + 49x^2 = -21 \times x + 49 \times x \times x$



Latreche MIFA