

10-2 Practice Problems

DIRECTIONS: Find the product.

1) $x(2x^2 - 3x + 9)$

$$2x^3 - 3x^2 + 9x$$

2) $z^2(4z^4 + z^3 - 11z^2 - 6)$

$$4z^6 + z^5 - 11z^4 - 6z^2$$

3) $-a^5(-9a^2 + 5a + 13)$

$$9a^7 - 5a^6 - 13a^5$$

4) $(x+2)(x-3)$

	x	-3
x	x^2	$-3x$
2	$2x$	-6

$$x^2 - x - 6$$

5) $(4b - 3)(b - 7)$

	b	-7
$4b$	$4b^2$	$-28b$
-3	$-3b$	21

$$4b^2 - 31b + 21$$

6) $(3k - 1)((3k + 1)$

	$3k$	1
$3k$	$9k^2$	$3k$
-1	$-3k$	-1

$$9k^2 - 1$$

7) $(y - 6)^2$

	y	-6
y	y^2	$-6y$
-6	$-6y$	36

$$y^2 - 12y + 36$$

8) $(7w + 5)(11w - 3)$

$$77w^2 - 21w + 55w - 15$$

$$77w^2 + 34w - 15$$

9) $(s + 4)(s^2 + 6s - 5)$

$$s^3 + 6s^2 - 5s + 4s^2 + 24s$$

$$s^3 + 10s^2 + 19s - 20$$

10) $(5x + 2)(-3x^2 + 4x - 1)$

	$-3x^2$	$4x$	-1
$5x$	$-15x^3$	$20x^2$	$-5x$
2	$-6x^2$	$8x$	-2

$-15x^3 + 14x^2 + 3x - 2$

11) $(6z^2 + z - 1)(9z - 5)$

	$9z$	-5
$6z^2$	$54z^3$	$-30z^2$
z	$9z^2$	$-5z$
-1	$-9z$	5

$54z^3 - 21z^2 - 14z + 5$

12) $p(2p-3) + (p-3)(p+3)$

$2p^2 - 3p + p^2 + 3p - 3p - 9$

$3p^2 - 3p - 9$

13) $-3b^2(b + 11) - (4b - 5)(3b - 2)$

$-3b^3 - 33b^2 - [12b^2 - 8b - 15b + 10]$
 $-3b^3 - 33b^2 - 12b^2 + 8b + 15b - 10$

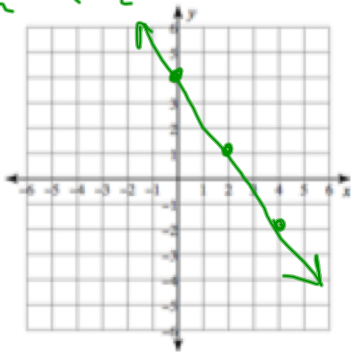
$-3b^3 - 45b^2 + 23b - 10$

SKILLZ REVIEW

Graph.

1) $3x + 2y = 8$

$y = -\frac{3}{2}x + 4$



List all pairs of numbers that multiply to the given number.

2) 24

1, 24
2, 12
3, 8
4, 6

Which number pair contains the largest perfect square?

3) Use 24

4, 6
↑
2, 2