

Algebra and the Number Plane (2a) name

1) If $a = 2$, $b = 10$ and $c = 3$ find

a) $a^2 b - 3c$

b) $c(a^2 + b^2)$

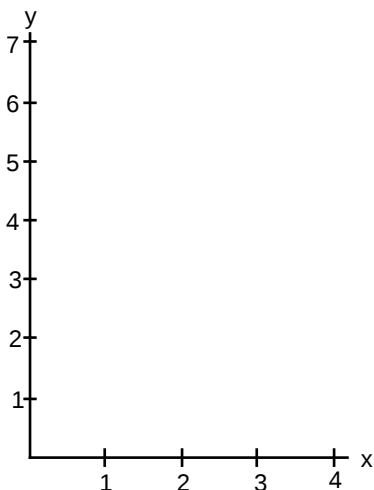
c) $(b + ac)^2$

d) $b^2 - (3c - a)$

2) Use the equation to complete the table and then plot the points

$$y = 2x + 1$$

x	0	1	2	3
y				



3) Simplify

a) $6a + 5b + 5a + 2b$

=

b) $3k + 8h + 6k$

=

c) $7xy + 3g + 5xy - g$

=

d) $y \times 3 \times y \times y \times 5 \times y =$

e) $h \times h \times h =$

f) $p \times p \times 9 \times k \times k \times p$

=

h) $p^5 \times p =$

i) $6y^3 \times 7y^7 =$

4) Expand

a) $9(y - 4) =$

b) $6(8a + 1) =$

c) $y(y - 7) =$

d) $4a(y + 7a) =$

e) $8g(5 - 2g) =$

5) Expand and simplify

$$4(2y + 7) + 5(y - 2)$$