

Elementary Campus
Mathematics – Grade VII
Revision Worksheet

Q1) a) Simplify.

$$6a + 3b - 2a - 5b$$

b) $s = 5t + \frac{1}{2}at^2$

Find the value of s when $t = 6$ and $a = 3$

Q2)

a) Expand $x(x + 8)$

b) Factorize completely. $6a - 3ab$

c) Solve. $5x - 6 = x + 3$

Q3) a) Expand the brackets and simplify.

i) $3(2d - 3) + 4(d + 1)$

ii) $(x - 4)(x - 3)$

b) Factorize $8p - 3pq$

Q4) a) Make m the subject of formula.

$$q = \frac{m}{7} + r$$

Q5) $v = 3 - 5t$

a) Work out the value of v when $t = 4$.

b) Make t the subject of the formula.

Q6) Factorise completely. $14xy - 7y^2$

Q7) a) Simplify. $3(2a - b) - b$

b) Factorise. $x^2 - 8xy$

Q8) Simplify. $3x - 4x + 7x$

Q9) Expand as a fraction in its simplest form.

a. $\frac{x+1}{2} + \frac{x+3}{3} - \frac{5x-1}{6}$

b. $\frac{2(a-b)}{7} - \frac{2a+3b}{14} + \frac{a+b}{2}$

c. $\frac{(x+3)}{3} + \frac{5(3x+4)}{6} + 1$

Q10) Solve each of the following equations.

a. $\frac{1}{3}x - 8 = 6$

b. $\frac{5}{2}y + 3\frac{1}{2} = \frac{2}{3}y + 5$

c. $2x + 3 = 9$

d. $2(3y + 5) - 7(y - 4) = 13$