

For the following two equations, write FULL SENTENCES explaining each step of your solution. Explain what you are doing and why you are doing it.

For example;

$$2x + 5 = -9$$

$$2x + 5 - 5 = -9 - 5$$

I am subtracting five from both sides of the equation so I can isolate the "2x" term.

Solve the following equations and include a FULL SENTENCE **describing** each step you took and **why**.

1. $4x + 8 = -16$

2. $2(x + 3) = 12$

3. Solve each equation. (6 marks)

(a) $-\frac{1}{2}(x - 4) = 1$

(b) $\frac{(a-9)}{3} - \frac{(2a-1)}{4} = \frac{7}{6}$

4. Solve for the stated unknown (4 marks)

(a) $v = \frac{d}{t}$ solve for “d”

(b) $R = P(5 + i)$ solve for “i”

5. Solve the following equations for “y” and then state the **SLOPE**, and **y-intercept**. (6 marks)

(a) $2x + y = 7$

(b) $3x + 4y - 12 = 0$