

Algebra - Simultaneous Linear Equations

Solve the simultaneous equations

$$3x + 4y = 200$$

$$2x + 3y = 144$$

$$x = \dots\dots\dots$$

$$y = \dots\dots\dots$$

(Total 4 marks)

Algebra - Simultaneous Linear Equations

Solve the simultaneous equations

$$3x + 4y = 200 \quad \textcircled{1}$$

$$2x + 3y = 144 \quad \textcircled{2}$$

$$\textcircled{1} \times 3 \quad 9x + 12y = 600 \quad \textcircled{3}$$

$$\textcircled{2} \times 4 \quad 8x + 12y = 576 \quad \textcircled{4}$$

$$\textcircled{3} - \textcircled{4} \quad \underline{x = 24}$$

Substitute for x in $\textcircled{2}$

$$48 + 3y = 144$$

$$3y = 144 - 48$$

$$3y = 96$$

$$y = \frac{96}{3}$$

$$\underline{y = 32}$$

$$x = \underline{\quad 24 \quad}$$

$$y = \underline{\quad 32 \quad}$$

(Total 4 marks)