

حلل العبارات الآتية :

$$(أ) \quad (x-5)(3x+2)+x^2-25 \quad ؛ \quad (ب) \quad 9x^2-(x+1)^2 \quad ؛ \quad (ج) \quad x(x^2-3)$$

الحل :

$$(x-5)(3x+2)+x^2-25=(x-5)(3x+2)+(x-5)(x+5)=(x-5)(3x+2+x+5) \quad (1)$$

$$(x-5)(3x+2)+x^2-25=(x-5)(4x+7)$$

$$9x^2-(x+1)^2=(3x-x-1)(3x+x+1)=(2x-1)(4x+1) \quad (2)$$

$$x(x^2-3)=x(x-\sqrt{3})(x+\sqrt{3}) \quad (3)$$