

MORE EXAMPLES...

$$1) \underline{5x}(2x^2 - 5)$$

$$= 10x^3 - 25x$$

$$2) (\underline{4x} - \underline{3y^3})(\underline{2x} - \underline{y^2})$$

$$= 8x^2 - 4xy^2 - 6xy^3 + 3y^5$$

$$3) 2(\underline{7w^2} - \underline{w}) - 3w(\underline{w} + \underline{1}) - (\underline{w^2} - \underline{4w} + \underline{2})$$

$$= \underline{14w^2} - \underline{2w} - \underline{3w^2} - \underline{3w} - \underline{w^2} + \underline{4w} - \underline{2}$$

$$= 10w^2 - w - 2$$

version!

$$4) (3w - 2)^2$$

$$(3w - 2)(3w - 2)$$

$$9w^2 - 6w - 6w + 4$$

$$= 9w^2 - 12w + 4$$

Shortcut

$$(3w - 2)^2$$

$$= 9w^2 - 12w + 4$$

$$5) 5(4w + 3)^2$$

$$5(16w^2 + 24w + 9)$$

$$= 80w^2 + 120w + 45$$

Now the grand finale!!!

- Put it all together to expand and simplify

$$(x+3)(2x-5) + 2(x-1)^2 - (2x+3)(4x-1)$$

$$2x^2 - 5x + 6x - 15 + 2(x^2 - 2x + 1) - (8x^2 - 2x + 12x - 3)$$

$$\underline{2x^2} - \underline{5x} + \underline{6x} - 15 + \underline{2x^2} - \underline{4x} + 2 - \underline{8x^2} + \underline{2x} - \underline{12x} + \underline{3}$$

$$\underline{\underline{-4x^2 - 13x - 10}}$$

$$(x+7)(1-3x) - (2x-5)^2 - 2(3x+1)(5-x)$$

$$x - 3x^2 + 7 - 21x - (4x^2 - 20x + 25) - 2(15x - 3x^2 + 5 - x)$$

$$x - 3x^2 + 7 - 21x - 4x^2 + 20x - 25 - 30x + 6x^2 - 10 + 2x$$

$$= -x^2 - 28x - 28$$

Practice for tonight....

A blue circle containing the handwritten text "Sheet #61?". The word "Sheet" is written on the top line, and "#61?" is written on the bottom line.