Ejercitacion y Entrega

1) A) $(2x-4).(3x-2) = \underline{6x^2 - 16x + 8}$

$6x^2 - 4x - 12x + 8$

B) $(2x-4)^3 = \underline{8x^3 - 48x^2 + 96x - 64}$

$(2x)^3 - 3.(2x)^2 \cdot 4 + 3.2x.4^2 - 4^3$

$8x^3 - 48x^2 + 96x - 64$

C) $(x-4)^2 = \underline{x^2 - 8x + 16}$

$(x-4)(x-4)$

$x^2 - 4x - 4x + 16$

D) $(3x-2)(3x+2) = \underline{9x^2 - 4}$

$(3x)^2 - (2)^2$

2) A) $2.(x-4)+4 = \sqrt[3]{-8}$

$2x - 4 = -2$

$x = \frac{2}{2} = 1$

B) $\begin{cases} ① \frac{x}{3} + \frac{2y}{5} = 23 \\ ② x + y = 53 \end{cases}$

$① \; 15.\frac{x}{3} + 15.\frac{2y}{5} = 23.15$

$5x + 6y = 345$

$x = 53 - y$

$5.(53-y)+6y = 345$

No Hay solucion

$265 - 5y + 6y = 345$

$y = 80$

3) A) [redacted] $9x + 2 = 2.(x+2)$

$9x + 2 = 2x + 4$

$7x = 2$

$x = \frac{2}{7}$

B) $2x(x-1) - \frac{9}{3} = \sqrt{3}.\sqrt{3} \quad (\sqrt{3})^2$

$2x^2 - 2x - 3 = 3$

$2x^2 - 2x - 6 = 0$

$x^2 - x - 3$

$(x-3)(x+1)$

$x = 3$

$x = -1$

4) A) $1 - 5x > -2x + 9$ $\quad S: \left(-\infty ; -\frac{2}{3}\right)$

$-5x + 2x < 9 - 1$

$-3x < 2$

$x < -\frac{2}{3}$

B) $2 \cdot (x-1) \leq \frac{\sqrt{9}}{-3} - 2^2$ $\quad S: \left(-\infty ; -\frac{3}{2}\right]$

$2x - 2 \leq -1 - 4$

$2x \leq -5 + 2$

$x \leq -\frac{3}{2}$