

• Ecuación IRRACIONAL

$$\sqrt{x+7} + 1 = 2x$$

$$(\sqrt{x+7})^2 = (2x-1)^2$$

$$x+7 = 4x^2 - 2x - 2x + 1$$

$$4x^2 - 5x - 6 = 0$$

$$x = \frac{5 \pm \sqrt{(-5)^2 - 4 \cdot 4 \cdot (-6)}}{2 \cdot 4} =$$

$$= \frac{5 \pm 11}{8} =$$

$$x_1 = 2 \quad \checkmark$$

$$\cancel{x_2 = -\frac{3}{4}}$$

COMPROBAMOS:

$$;\sqrt{2+7} + 1 = 2 \cdot 2?$$

$$;\begin{matrix} 3 + 1 = 4? \\ 4 = 4 \end{matrix}$$

$$;\sqrt{-\frac{3}{4}+7} + 1 = 2 \cdot (-\frac{3}{4})?$$

$$;\sqrt{\frac{25}{4}} + 1 = -\frac{3}{2}?$$

$$;\frac{5}{2} + 1 = -\frac{3}{2}?$$

$$\frac{7}{2} \neq -\frac{3}{2}$$