



Expand $(8 - \sqrt{3})^2$ giving your answer in form $a + b\sqrt{3}$

C, D and E are such that

$$C:D = 1:4$$

D is $\frac{7}{8}$ of E

Work out the ratio of C:E

Rebecca has 9 cards, each with a number on it.

2 2 3 4 5 6 6 7 9

She picks three cards at random, without replacement.
Rebecca multiplies the three numbers to get a score.

Calculate the probability that the score is an even number

Solve to one decimal place

$$\frac{1}{2x+1} + \frac{4}{x-2} = 1$$