

Find the length of BC.

$$3 \times 1.5 = 4.5 \text{ cm}$$

$$4.5 - 3 = 1.5 \text{ cm}$$

Solve

$$3x + 5 = 15 - 1.5x$$

$$\frac{3x + 5}{10 - x} = 1.5$$

$$4.5x = 10$$

$$x = 2.2$$

A shirt is increased in price by 20% at the start of 2021.

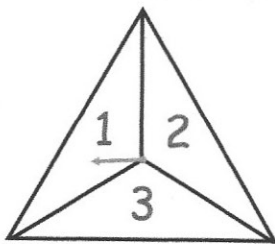
In the sales, in March, it is then reduced in price by 15%.

Work out the overall change in price since 2020.

$$100 \xrightarrow{\times 1.2} 120 \xrightarrow{\times 0.85} 102$$

$$x \quad 1.2x \quad 1.02x$$

2% increase



$$P(22) = \frac{1}{3} \times \frac{1}{3}$$

$$\frac{1}{9}$$

Shown is a fair spinner.

The spinner is spun twice.

A score is found by multiplying the two numbers together.

Find the probability of scoring a 4

A group of scientists want to estimate the number of squirrels in a wood. They catch and ring 20 squirrels. They return the 20 squirrels to the wood.

They then catch 50 squirrels and 13 are ringed.

Estimate the number of squirrels in the wood.

$$\frac{20}{N} = \frac{13}{50}$$

$$13N = 1000$$

$$N \approx 77$$