

PROPORTIONAL CHANGE

Name: _____

Assessment Criteria: Calculate the result of any proportional change using multiplicative methods

Solving these problems without using multiplicative methods won't get you any marks!

1. A house was worth £180,000 at the start of 2004, and over the course of the next year its value rose by 14.5%. Work out the value of the house at the end of the year.

£ _____

2. A car was bought for £13,500, but depreciated by 27% over the first year. Work out the value of the car at the end of the year.

£ _____

3. There were 400,000 colonies of honeybees in the UK in 2007. This number dropped by $\frac{8}{25}$ during the winter of 2007-08. How many colonies were there after this drop?

4. Match each calculation to a method for working out its answer. Fill in the blank spaces.

2% of 400
A 2% increase on 400
A 2% decrease on 400

400×1.02
400×1.2
400×0.02

Overall, I think my success level is:

Low High
○ ○ ○ ○

Q	PROPORTIONAL CHANGE	☺	☹
	I can solve a percentage increase problem using a multiplicative method (one-step)		
	I can solve a percentage decrease problem using a multiplicative method (one-step)		
	I can solve a fractional increase problem using a multiplicative method (one-step)		
	I can solve a fractional decrease problem using a multiplicative method (one-step)		
	<i>I can explore connections in mathematics across a range of contexts</i>		
I need to practise ...			