

Y6 – Spring – Block 4 – Step 8 – Percentage of an amount – multi-step Answers

Question	Answer
1	a) 50 b) 20% of 500 = 100 90% of 500 = 450 30% of 500 = 150 70% of 500 = 350 60% of 500 = 300 100% of 500 = 500
2	5 = 10 ÷ 2, so 5% is half of 10%.
3	a) 2 b) 20 c) 200 d) 100 e) 300 f) 135 When the percentage stays at 5% and the number increases by a factor of 10, the answer also increases by a factor of 10
4	a) 255 b) 255 children’s alternative methods, e.g. find 25% and subtract from the number
5	Multiple possible answers, e.g. 20% Divide by 5 90% Subtract 10% from the whole 60% Add 10% and 50% 15% Add 10% and 5% 55% Add 50% and 5% 40% Multiply 10% by 4

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6	<p>a) 200 110 8</p> <p>b) 900 3,807 81</p> <p>c) 600 240 58.8</p> <p>d) 150 45 4.5</p> <p>e) 550 2,420 4.4</p> <p>f) 400 160 39.2</p>
7	<p>Yes</p> <p>When the percentage doubles and the number stays the same, the answer doubles. When the percentage stays the same and the number halves, the answer halves. So doubling the percentage would double the answer and halving the number would halve the answer. These cancel each other out, so the answer stays the same.</p>
8	<p>a) 20% of 40 = 8 40% of 20 = 8 25% of 60 = 15 60% of 25 = 15</p> <p>When the numbers for the percentage and the number are swapped, the answer stays the same.</p> <p>b) multiple possible answers, e.g. 10% of 70 = 70% of 10 and 50% of 80 = 80% of 50</p> <p>When the numbers for the percentage and the number are swapped, the answer stays the same. This always happens.</p>