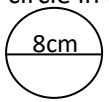
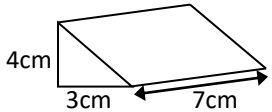
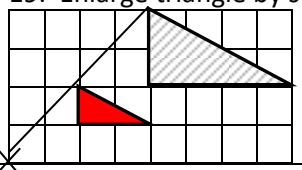
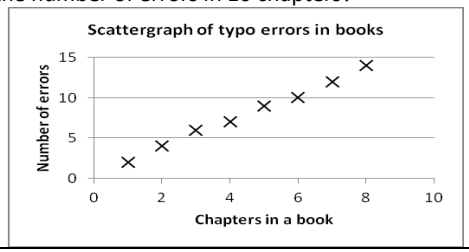
Maths Key Skills **Stage 8: Skill Check 2 - Answers**

Name: ..... Date: ..... Class/Group: .....

A: Number & Algebra		B: Algebra, Proportion, Geometry & Measure		C: Statistics & Probability	
1. Work out: 0.4 x 0.2	*8:1* **0.08**	11. Expand & simplify: (2b - 2)(b + 4)	*8:16* **$2b^2+6b-8$**	21. These are the probabilities of lunch chosen by class 8B Lunch / Burger / Pizza / Pasta / Baguette Probability / 0.15 / 0.35 / / 0.2 Calculate the missing probability	*8:26* **1-0.7 =0.3**
2. Write 36 as the product of its prime factors. Choose from: **A**. 2^2x3^2 **B**. 2^2 x9 **C**. 4 x 3^2	*8:2* **A**. 2^2x3^2	12. The ratio of boys: girls in a class is 4:3. Write the proportion of boys in the class as a fraction	*8:17* $\frac{4}{7}$		
3. Round off 0.49 correct to 1 significant figure	*8:3* **0.5**	13. 10 calculators cost £55. How much will 4 cost?	*8:18* **£22**	22. Of the 80 pupils in Y8, 38 are boys. On Monday 4boys and 2 girls were late. What is the probability that a pupil chosen is a girl and not late?	*8:27* $\frac{40}{80}=\frac{1}{2}$
4. Evaluate: $\sqrt[5]{32}$	*8:4* **2**	14. A car bought for £800 was sold for 20% more. What price was it sold for?	*8:19* **£960**		
5. Factorise $y^2 + 5y$	*8:6* **y(y + 5)**	15. A tap flows at 3 litres in 5 minutes. What is the average rate per hour	*8:20* **36litres/h**	23. A coin is tossed twice. What is the probability of rolling two HEADS?	*8:28* *HH,HT,TH,TT* $\frac{1}{4}$
6. Simplify $p^5 \div p^2$	*8:7* **p^3**	16. What is the sum of the interior angles of a pentagon?	*8:21* **540^0**		
7. Make 'w' the subject of the formula P = 2w + 5	*8:8* **w = p-5 / 2**	17. What is the area of this circle in terms of π 	*8:21* **16π cm^2**	24. Work out the modal class interval weekly pocket money Pocket money (£) / Frequency 1-3 / 2 4-6 / 9 7-9 / 5 10-12 / 4	*8:29* **£(4-6)**
8. Solve 4x - 3 = 2x + 5	*8:10* **2x=8 x=4**	18. Work out the volume of this prism. 	*8:22* **42cm^3**		
9. What is the gradient of the graph with the equation y = 2x + 7	*8:12* **2**	19. Enlarge triangle by sf ½ centre X 	*8:23* X	25. Would it be possible to use this graph to extrapolate for the number of errors in 10 chapters? 	*8:30* **YES Because the points follow a definite trend**
10. Give the nth term of the sequence 3 5 7 9 11 ...	*8:15* **2n+1**	20. Write down the 3-figure bearing for east direction	*8:25* **090^0**		
Total (A)		Total (B)		Total (C)	
Test Total (A+B+C)		R (0-9)	Y (10-19)	G (20-25)	