

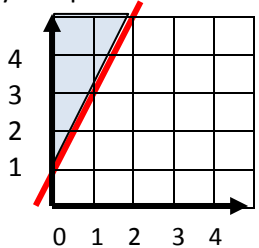





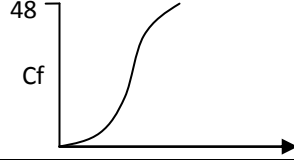



Name _____

Date _____

Class _____

Section A: Numbers & calculating		Section B: Algebra & Shape, space & measures		Section C: Using and applying	
8.1 1. Write $\frac{14}{15}$ as a recurring decimal 		8.4 11. Factorise: $x^2 - 15x + 36$		21. Linear-Quadratic-Cubic-Reciprocal Which type of function is represented by this equation? $y = \frac{6}{x}$	
8.1 2. Write 0.135 as a fraction		8.4 12. Factorise: $49x^2 - 25$			
8.2 3. Work out the balance for £240 invested for 20 years at 7% per annum 		8.5 14. Multiply & simplify: $(3x + 1)(3x - 1)$		22. What inequality is represented here? 	
8.2 4. The value of a scooter depreciates by 40% per year. Work out the current value of a scooter bought 4 years ago for £600. 		8.5 14. Multiply & simplify: $(2y + 7)^2$			
8.2 5. In a '80% off' sale, an coffee maker was £24.80 Work out the original price. 		8.6 15. Make u the subject of the formula: $s = \frac{uv}{u + v}$		23. $P(1^{\text{st}} \text{ traffic lights are RED}) = 0.8$ $P(2^{\text{nd}} \text{ traffic lights are RED}) = 0.2$ What is the probability that both are RED?	
8.2 6. A food bill has increased by 24% to £99.20. Work out the original cost. 		8.6 16. Make r the subject of the formula: $v = \frac{4\pi r^3}{3}$			
8.3 7. Write 6700000 in standard form:		8.7 17. $d = \sqrt{a^2 + b^2 + 2ab}$ Find d when $a = 9$ & $b = 5$		24. Max rolls 2 dice $P(\text{the total is 4}) = 0.07$ $P(\text{the total is 10}) = 0.1$ What is the probability that Max rolls 2 dice and gets totals of 4 or 10?	
8.3 8. Write 8.7×10^{-2} as an ordinary number		8.7 Give your answer correct to 3sf  18. $d = \sqrt{a^2 + b^2 + c^2}$ Find d when $a = 5.4$ $b = 8$ & $c = -7$			
8.3 9. Work out $(4.2 \times 10^9) + (3.6 \times 10^8)$ Give your answer in standard form		8.12 19. If $\sin 68^\circ = \frac{x}{16}$, find x (3sf) 		25. Show on the cumulative frequency graph how to take the upper quartile reading 	
8.3 10. Work out $(5.63 \times 10^5)^2$ to 3sf Give your answer in standard form 		8.13 LENGTH or AREA or VOLUME 20. Which measure does this expression represent: $a^3 \div a^2$			
Total (A)		Total (B)		Total (C)	
Test Total (A+B+C)		R (0-9)	Y (10-19)	G (20-25)	