

PSLE Foundation Mathematics

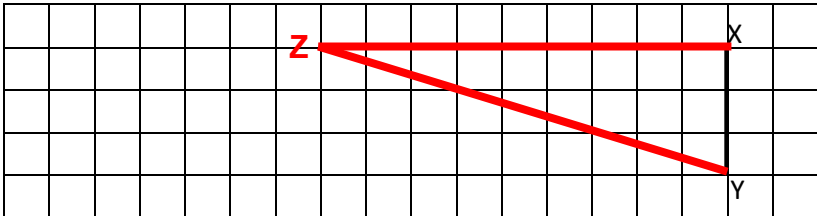
ANSWER KEY

Paper 1

Booklet A (30 marks)

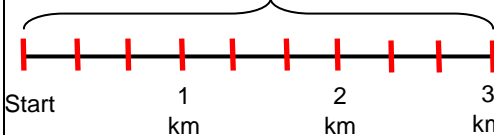
Q1	3	Q11	2
Q2	2	Q12	2
Q3	3	Q13	2
Q4	1	Q14	1
Q5	2	Q15	1
Q6	4	Q16	3
Q7	1	Q17	3
Q8	4	Q18	2
Q9	3	Q19	1
Q10	3	Q20	2

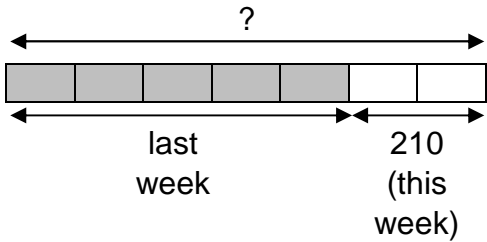
Booklet B (20 marks)

No.	Solution
Q21	$\frac{3}{8}$, $\frac{3}{4}$, $\frac{8}{3}$, $3\frac{1}{8}$ (A2)
Q22a	$\frac{49}{100}$ (A1)
Q22b	$15\frac{1}{5}$ (A1)
Q23	$180 - 76 - 76 = 28$ $90 - 28 = \underline{62^\circ}$ (M1, A1)
Q24	$20 + 28 + 40 + 20 = \underline{108}$ (M1, A1)
Q25	$3 + 6 = \underline{9}$ (A2)
Q26	$0.58 \text{ km} = 580 \text{ m}$ $\frac{1}{4} \times 580 = 580 \div 4 = \underline{145 \text{ m}}$ (M1, A1)
Q27	<div style="display: flex; align-items: center; justify-content: center;">  (A2) </div> <p>(Note: Both lines must be straight and Point Z must be labelled.)</p>

Q28	4 bottles ----- $\$2 \times 3 + \$1 = \$7$ 16 bottles ----- $\$7 \times 4 = \28 17 bottles ----- $\$28 + \$2 = \$30$ (M1, A1)
Q29	Smallest factor = 1 Greatest factor (actual whole number) = $28 - 1 = \underline{27}$ (M1, A1) OR Factors of 27 : 1, 3, 9, 27 (M1, A1)
Q30	$13 \text{ cm} \times 8 = \underline{104 \text{ cm}}$ (M1, A1)

Paper 2: 50 marks

No.	Solution	Alternative Answer / Remarks
Q1	$7 + 14 + 21 = \underline{42}$ (M1, A1)	$1 + 2 + 3 = 6$ (M1) $6 \times 7 = \underline{42}$ (A1)
Q2	$\$7000 \div 25 = \underline{\$280}$ (M1, A1)	
Q3	Base = $48 - 20 - 12 = 16 \text{ cm}$ Area = $\frac{1}{2} \times 12 \times 16 = \underline{96 \text{ cm}^2}$ (M1, A1)	
Q4	$2500 \text{ g} - 298 \text{ g} = 2202 \text{ g}$ (M1) $2202 \div 5 = \underline{440.4 \text{ g}}$ (A1)	$2.5 \text{ kg} - 0.298 \text{ kg} = 2.202 \text{ kg}$ (M1) $2.202 \div 5 = 0.4404 \text{ kg}$ $= \underline{440.4 \text{ g}}$ (A1)
Q5	$3 \div \frac{1}{3} = 9$ (M1) $9 + 1 = \underline{10}$ (A1)	Draw a diagram: 10 cones (A1)  (Award M1 for correct drawing.)
Q6	$\$3 - \$1.35 - \$0.75 = \0.90 (M1) $\frac{90}{300} = \frac{3}{10}$ (A1)	$135 + 75 = 210$ $300 - 210 = 90$ (M1) $\frac{90}{300} = \frac{3}{10}$ (A1)
Q7	$\$214.50 \times 4 = \858 (M1) $\$858 - \$288 - \$96 - \$199 = \underline{\$275}$ (A1)	$\$214.50 \times 4 = \858 (M1) $\$288 + \$96 + \$199 = \583 $\$858 - \$583 = \underline{\$275}$ (A1)

Q8	$1 - \frac{5}{7} = \frac{2}{7}$ $\frac{2}{7}$ ----- 210 $\frac{1}{7}$ ----- $210 \div 2 = 105$ (M1) $\frac{7}{7}$ ----- $105 \times 7 = \underline{735}$ (A1)	Draw a model:  2 units ----- 210 1 unit ----- $210 \div 2 = 105$ (M1) 7 units ----- $105 \times 7 = \underline{735}$ (A1)
Q9	$360 - 90 = 270^\circ$ (M1) $270 \div 2 = \underline{135^\circ}$ (A1)	
Q10	$\frac{8}{100} \times 65 = 5.2$ (M1) $65 + 5.2 = \underline{70.2 \text{ kg}}$ (A1)	$100\% + 8\% = 108\%$ 100% ----- 65 kg 1% ----- 0.65 kg 8% ----- $0.65 \times 8 = 5.2$ (M1) 108% ----- $65 + 5.2 = \underline{70.2 \text{ kg}}$ (A1)
Q11a	Handbell: $65 + 70 = 135$ Dance: $35 + 85 = 120$ Choir: $45 + 65 = \underline{110}$ (lowest) Band: $60 + 60 = 120$ Ans: Choir (A1)	
Q11b	Total: $60 + 65 + 70 = 195$ (M1) Average: $195 \div 3 = \underline{65}$ (A1)	
Q12a	$39 - 1 = 38$ $38 \times 4 = \underline{152}$ (A1)	
Q12b	$39 \times 152 = \underline{5928}$ (M1, A1)	
Q13a	$15\% \times \$1060 = \underline{\$159}$ (M1)	100% ----- \$1060 1% ----- \$10.60 15% ----- $10.60 \times 15 = \underline{\$159}$ (A1)
Q13b	$\$1060 - \$159 = \$901$ $7\% \times \$901 = \63.07 (M1) $\$901 + \$63.07 = \underline{\$964.07}$ (A1)	100% ----- $1060 - 159 = 901$ 1% ----- 9.01 7% ----- $9.01 \times 7 = 63.07$ 107% ----- $901 + 63.07 = \underline{\$964.07}$ (A1)
Q14a	$273 \div 7 = \underline{39 \text{ m}}$ (A1)	
Q14b	$39 \text{ m} + 7 \text{ m} = 46 \text{ m}$ $46 \text{ m} \times 7 \text{ m} = \underline{322 \text{ m}^2}$ (M1, A1)	$7 \text{ m} \times 7 \text{ m} = 49 \text{ m}^2$ $273 + 49 = \underline{322 \text{ m}^2}$ (M1, A1)

Q15a	$3 \text{ M} \text{ ---- } (2.30 - 0.15) \times 3 \quad (\text{M1})$ $= 2.15 \times 3$ $= \$6.45$ $21 \div 3 = 7$ $21 \text{ M} \text{ ---- } 6.45 \times 7 = \underline{\$45.15} \quad (\text{A1})$	$2.30 \times 3 = 6.90$ $0.15 \times 3 = 0.45$ $6.90 - 0.45 = 6.45 \quad (\text{M1})$ $21 \div 3 = 7$ $6.45 \times 7 = \underline{\$45.15} \quad (\text{A1})$
Q15b	$3 \text{ M} \text{ ----- } 3.20 \times 2 = \6.40 $21 \text{ M} \text{ ----- } 6.40 \times 7 = \$44.80 \quad (\text{M1})$ $\$45.15 - \$44.80 = \underline{\$0.35} \quad (\text{A1})$	
Q16a	$\frac{2}{3} \text{ ----- } 246$ $\frac{1}{3} \text{ ----- } 246 \div 2 = 123 \quad (\text{M1})$ $123 \div 3 = \underline{41} \quad (\text{A1})$	<p>Draw a model:</p> <p>2 units ----- 246</p> <p>1 unit ----- $246 \div 2 = 123 \quad (\text{M1})$</p> <p>$123 \div 3 = \underline{41} \quad (\text{A1})$</p>
Q16b	$\frac{1}{5} \text{ ----- } 246 + 123 = 369 \quad (\text{M1})$ $\frac{5}{5} \text{ ----- } 369 \times 5 = \underline{1845} \quad (\text{A1})$	<p>From model:</p> <p>1 unit ----- 123</p> <p>15 units ----- $123 \times 15 \quad (\text{M1})$</p> <p>$= \underline{1845} \quad (\text{A1})$</p>
Q17a	$\frac{3}{4} \times (35 \times 36 \times 40) \quad (\text{M1})$ $= \underline{37\,800 \text{ cm}^3} \quad (\text{A1})$	$\frac{3}{4} \times 40 \text{ cm} = 30 \text{ cm} \quad (\text{M1})$ $35 \times 36 \times 30 = \underline{37\,800 \text{ cm}^3} \quad (\text{A1})$
Q17b	$20 \times 20 \times 20 = 8000 \text{ cm}^3 \quad (\text{M1})$ $37\,800 - 8000 = 29\,800 \text{ cm}^3 \quad (\text{M1})$ $= \underline{29 \ell\, 800 \text{ m}\ell} \quad (\text{A1})$	
Q18a	<p>(i) $6 \times 4 = \underline{24} \quad (\text{A1})$</p> <p>(ii) $7 + 2 = \underline{9} \quad (\text{A1})$</p>	
Q18b	$15 - 2 = \underline{13} \quad (\text{A1})$	
Q18c	$72 \div 4 = 18 \quad (\text{M1})$ $18 - 2 = \underline{16} \quad (\text{A1})$	(May use listing.)