

Assessors should accept alternative correct method of working other than those detailed in the mark scheme. These should be considered at internal standardisation.				
Question	Assessment Criteria	Answer	Notes	Marks
1	1.1	a $2(3.5 + 2.7), 2 \times 6.2$ perimeter = 12.4m	1 for correct use of formula 1 for correct answer	4
		b $2 \times \pi \times 24 = 150.7964 = 150.80\text{cm}$ or $2 \times 3.14 \times 24 = 150.72\text{cm}$	1 for correct use of formula 1 for correct answer (allow answers if π rounded)	
2	2.1 2.2	a $\frac{1}{2} \times 5.2 \times 8.75 = 22.75\text{cm}^2$	1 mark correct method 1 mark correct answer	5
		b $(7.6 \times 12.05) + (7.85 \times 5.75) = 136.72\text{m}^2$ or $(15.45 \times 5.75) + (7.6 \times 6.3) = 136.72\text{m}^2$ or $(15.45 \times 12.05) - (6.3 \times 7.85) = 136.72\text{m}^2$	1 mark correct use of formula 1 mark correct answer 1 mark use of cm^2 in at least one answer	
3	3.1	$18 \times 9.5 \times 15.75 = 2693.25\text{cm}^3$	1 mark correct use of formula 1 mark correct answer 1 mark use of cm^3	3
4	3.1	$r^2 = 0.4 \times 0.4 = 0.16$ $\pi \times 0.16 = 3.14 \times 0.16 = 0.5024$ $h \times 0.5024 = 0.60288\text{m}^3$ to 2 decimal places 0.60 m^3	1 mark correct use of formula 1 mark correct answer (allow follow through i.e. only deduct marks for error once) 1 mark correct rounding 1 mark use of m^3	4
5	4.1	12.5cm scale actual length = $12.5 \times 150 = 1875\text{cm} = 18\text{m } 75\text{cm} = 19\text{m}$ 15cm scale depth actual depth = $15 \times 150 = 2250\text{cm} = 22\text{m } 50\text{cm} = 23\text{m}$	1 mark multiplying 12.5 by 150 1 mark correct answer 1 mark multiplying 15 by 150 1 mark correct answer	4

6	4.1	$4.5 \times 30 = 135$ miles	1 mark correct method 1 mark correct answer	2
7	5.1	a appropriate scale selected b scale drawing dimensions for length and width of patio c scale drawing dimensions for length and width of shed Accurate scale drawing showing garden patio shed	1 mark appropriate scale selected 1 mark each dimension correct 1 mark each dimension correct 1 mark correct method for calculating scale 1 mark each correctly drawn item	9
8	6.1	a yes – 1 pair of lines identified	1 mark accurately identifying pair of lines	4
		b no pairs of lines identified	1 mark no parallel lines	
		c yes – 2 pairs of lines identified	1 mark accurately identifying each pair of lines	
9	6.2	Measure the ground along the length of the house	1 mark ground 1 mark length of house Accept any answer that shows understanding 1 mark if only ground mentioned	2

Total marks available: 37 marks

Pass mark: 30 marks