Section A

1	31, 37	**2**	1 for one omission and/or one extra
2	(a) $C = 360 + 20n$ final answer (b) 30	**2** **2**	1 for $20n$ seen **M1** for $250 = 7n + 40$ or better or for $210 \div 7$
3	(a) 0.1 o.e. (b) 300	**2** **2**	**M1** for sum = 1 s.o.i. **M1** for 0.3×1000, $\frac{300}{1000}$ or 300 seen
4	(a) 7/12 or 14/24 o.e. i.s.w. (b) 3/8	**2** **3**	**M1** for at least one of 9/12, 18/24, 2/12 or 4/24 o.e. seen **W2** for 9/24 o.e. i.s.w. or **M1** for $9/4 \times 1/6$ o.e. and **M1** for ¾ × ½ or M1 **ft** $\frac{\text{their } 9 \times 1}{4 \times 6}$ correctly evaluated
5	both sets of correct arcs ruled perpendicular drawn from P	**1** **1**	Ignore extra arcs tolerance 2° at line **and** line must pass within 1 mm of P and 1 mm of given line.
6	(a) 9 (b) 22 **angle** in **semicircle**[= 90°] [and angle sum of triangle = 180°]	**2** **1** **1**	**M1** for 360 / 40 o.e. If 90° is omitted, this is dependent on answer of 22°, or on 90° seen or used
7	(a) it is increasing o.e. (b) 90	**1** **3**	0 if contradicted **M1** for their $18 \div 12$ or 1.5 seen and **M1 dep**. for their 1.5×60 o.e. or **M1** for their 18 in 1/5 hr [**M2** for their $18 \div 1/5$ o.e. or their 18 × 5 o.e.]

Section B

8	7.2	**2**	**M1** for 2.4 seen or for 12× 3/5 o.e.
9	(a) 6 (b) 7 points plotted, tolerance 2mm smooth curve within 2 mm of at least 6 points (c) answers in range −0.6 to −0.3 and 4.3 to 4.6	**1** **P1** **C1** **1+1**	If table blank, allow this mark for correct plot at 6 on graph correct or ft from table no ft for curve if extra turning points or flat top independent of graph
10	(a) 7 : 8 (b) 48 c.a.o. (c) 76.8 i.s.w.	**1** **2** **4**	allow 7 to 8 **M1** for 120/5 [×2] or 24 seen **M1** for at least 3 of 15, 45, 75 etc seen **M1** for attempt at sum of (freq × their midpts) (in correct range) (at least 3 seen) [3840] **M1** for their sum of (freq × midpts) ÷ 50 [3840 ÷ 50] **dep** on attempt at $\sum fx$ soi **W3** for answer 61.8 or 91.8, otherwise allow last 2 Ms for endpoints used allow full marks for 77 after 3840 seen
11	(a)(i) 30 (a)(ii) $x > 6.5$ (or $x > 6\frac{1}{2}$ or $x > \frac{13}{2}$) c.a.o. final ans. (b) $[x =]\frac{y-8}{4}$ or $\frac{y}{4}-2$ o.e. as final answer	**2** **3** **2**	**M1** for $2x = 60$ or $x/5 = 6$ **W2** for 6.5, $6\frac{1}{2}$ or $\frac{13}{2}$ seen **or M2** for $x - 3 > 3.5$ **or M1** for $2x - 6 > 7$ and **M1** for $2x > 7 + 6$ or correct step ft after wrong first step seen **M1** for $y - 8 = 4x$ or $\frac{y}{4} = x + \frac{8}{4}$ or better
12	(a) 4[.0] www (b) obtuse(or greater than 90°) with attempt to compare lengths.	**3** **1**	**M1** for $2.4^2 + 3.2^2$ or 16 www and **M1** for sq. rt. of sum or difference of 2.4^2 and 3.2^2 answer **must** ft from their (a) **and** must have attempt at comparison of lengths. 0 if Pythagoras not attempted in (a)