

Q1.

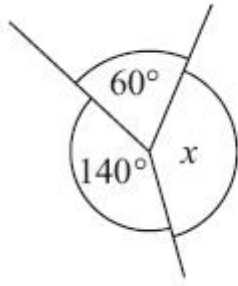


Diagram **NOT**
accurately drawn

(i) Work out the size of angle x .

.....^o

(ii) Give a reason for your answer.

.....
.....

(Total for Question is 2 marks)

Q1.

Question		Working	Answer	Mark	Notes
10	(i) (ii)	$360 - 140 - 60 = 160$	160 and reason	2	B1 for 160 C1 (indep) for <u>Angles at a point</u> add up to <u>360°</u> or <u>angles in a full</u> <u>turn</u> add up to <u>360°</u>

Q2.

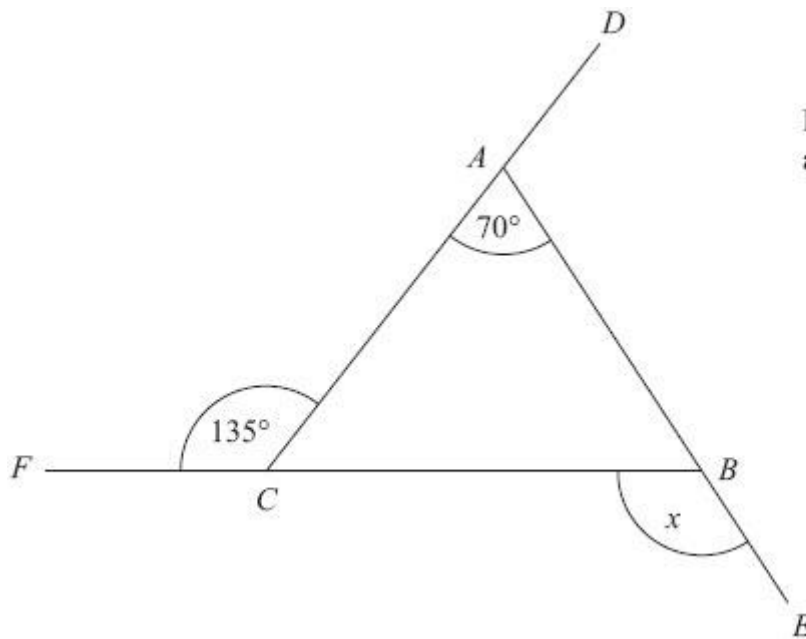


Diagram **NOT**
accurately drawn

DAC, *FCB* and *ABE* are straight lines.

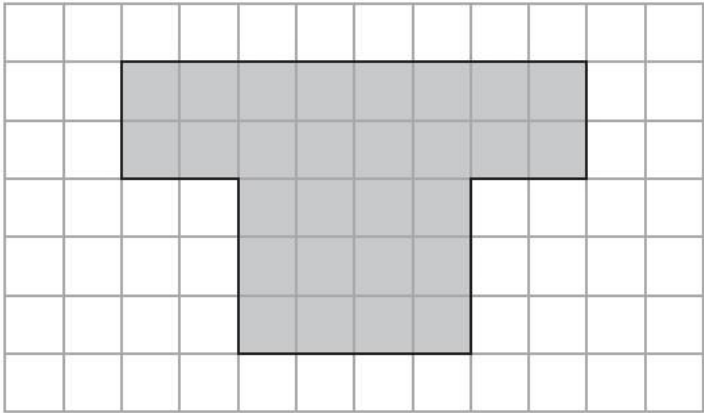
Work out the size of the angle marked *x*.
You must give reasons for your answer.

(Total for Question is 5 marks)

Q2.

	Working	Answer	Mark	Notes
*	<p>(Method 1) Angle $ACB = 180 - 135$ $(= 45)$ (sum of <u>angles</u> on a straight line = <u>180</u>)</p> <p>Angle $ABC = 180 - 70 - 45 (=65)$ (sum of <u>angles</u> in a <u>triangle</u> = <u>180</u>)</p> <p>$(x =) 180 - 65$ $(=115)$ (sum of <u>angles</u> on a straight line = <u>180</u>) OR</p> <p>(Method 2) Angle $ACB = 180 - 135$ $(= 45)$ (sum of <u>angles</u> on a straight line = <u>180</u>)</p> <p>$(x =) 70 + 45$ $(=115)$ (<u>exterior angle</u> = <u>sum of interior opposite angles</u>)</p> <p>OR</p> <p>(Method 3) Angle $DAB = 180 - 70 = 110$ (sum of <u>angles</u> on a straight line = <u>180</u>)</p> <p>$(x =) 360 - 135 - 110$ (sum of <u>exterior angles</u> of a <u>polygon</u> = <u>360</u>)</p>	$x = 115$	5	<p>M1 for correct method to find angle DAB or angle ACB or angle ABC (may be implied by correct angle marked in diagram) M1 for complete correct method to find x A1 for $x = 115$</p> <p>C2 (dep on M1) for fully correct reasons for chosen method no extras (C1 (dep on M1) for one correct reason for chosen method)</p> <p>[NB $x = 115$ must be stated explicitly, 115 only scores A0]</p>

Q3.
Here is a shaded shape drawn on a centimetre grid.



(a) How many lines of symmetry does the shaded shape have?

.....
(1)

(b) Find the perimeter of the shaded shape.

..... cm
(1)

Here is a rectangle.

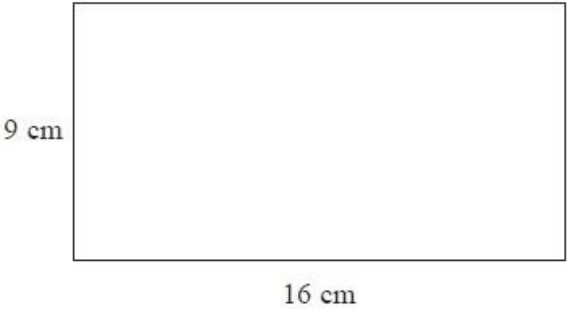


Diagram NOT accurately drawn

(c) Work out the area of this rectangle.

..... cm²
(2)

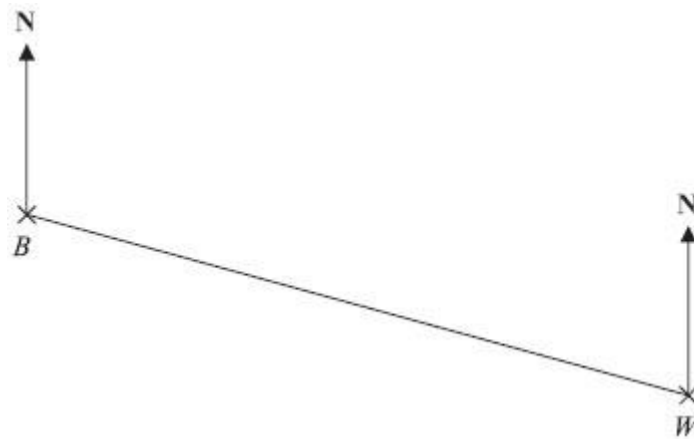
(Total for Question is 4 marks)

Q3.

PAPER: 1MA0_2F				
Question	Working	Answer	Mark	Notes
(a)		1	1	B1 cao
(b)		26	1	B1 cao
(c)		144	2	M1 for 16×9 A1 cao

Q4.

The diagram shows the positions of two villages, Beckhampton (*B*) and West Kennett (*W*).



Scale: 4 cm represents 1 km.

(a) Work out the real distance, in km, of Beckhampton from West Kennett.

.....

(2)

The village, Avebury (*A*), is on a bearing of 038° from Beckhampton.

On the diagram, *A* is 6 cm from *B*.

(b) On the diagram, mark *A* with a cross (\times).
Label the cross *A*.

(2)

(Total for Question is 4 marks)

Q4.

		Working	Answer	Mark	Notes
	(a)		2.5	2	M1 for 10 (cm) or "10" ÷ 4 A1 for 2.45 – 2.55
	(b)		A marked on diagram	2	M1 for a point marked (or line drawn) on a bearing of 038° from either point B or point W, OR for a point marked (or arc drawn) 6 cm from B A1 for the position of Avebury marked (accept without label if not ambiguous)

Q6.

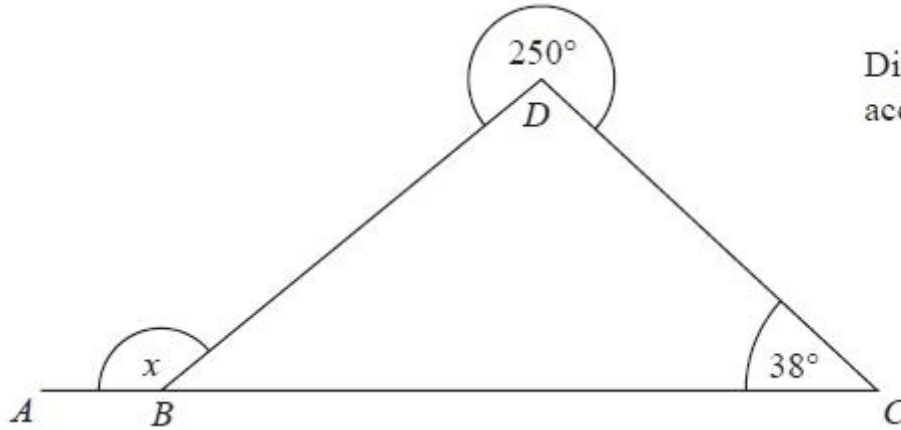


Diagram **NOT**
accurately drawn

ABC is a straight line.
Angle $BCD = 38^\circ$
The reflex angle $BDC = 250^\circ$

Work out the size of the angle marked x .
Give reasons for your answer.

(Total for Question is 4 marks)

Q6.

PAPER: 1MA0_2F				
Question	Working	Answer	Mark	Notes
*		148°	4	<p>M1 for (angle $BDC = 360 - 250 (=110)$ M1 (dep) for $180 - (180 - '110' - 38) (= 148)$ or for $'110' + 38 (= 148)$</p> <p>C2 (dep on M2) for $x = 148$ with full reasons, relevant to the complete correct method used, for example: <u>Angles at a point</u> add up to 360° and <u>angles in a triangle</u> add up to 180° and <u>angles on a straight line</u> add up to 180°; Or <u>Angles at a point</u> add up to 360° and <u>exterior angle</u> of a triangle is <u>equal</u> to the sum of the <u>interior opposite angles</u> or</p> <p>(C1 (dep on at least M1) for one reason relevant to correct method)</p>

Q7.

Here is a rectangle.

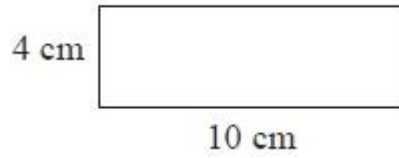
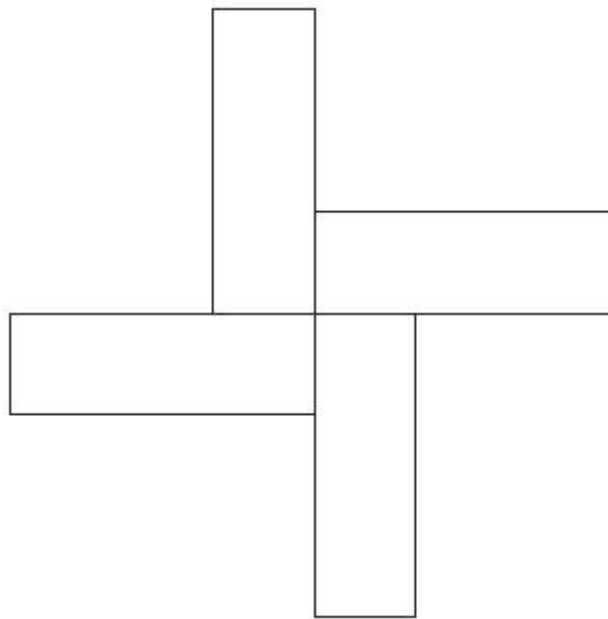


Diagram **NOT**
accurately drawn

The 12-sided shape below is made from 4 of these rectangles.



Work out the perimeter of the shape.

..... cm

(Total for Question is 3 marks)

Q7.

PAPER: IMA0_2F				
Question	Working	Answer	Mark	Notes
		80	3	M1 for intention to find missing side length $10 - 4 (=6)$ or perimeter of 4 rectangles eg $4 \times (10 + 4 + 10 + 4) (=112)$ M1 for complete method to find perimeter eg $4 \times (10 + 4 + '6')$ or $'112' - 8 \times 4$ A1 cao

Q8.

Here is a right-angled triangle.

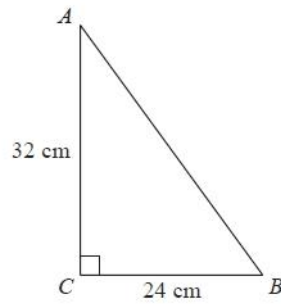


Diagram **NOT** accurately drawn

(a) Work out the length of AB .

..... cm
(3)

Inderpal is making two mirrors.

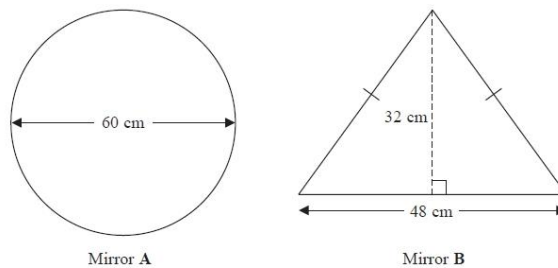


Diagram **NOT** accurately drawn

Mirror **A** is in the shape of a circle.
This mirror has a diameter of 60 cm.

Mirror **B** is in the shape of an isosceles triangle.
This mirror has base 48 cm and height 32 cm.

Inderpal buys metal strips to put around the edge of each mirror.
The metal strip is sold in lengths of one metre.
Each one metre length of metal strip costs £5.68

(b) Work out the total amount Inderpal pays.
You must show all your working.

£.....
(4)

(Total for Question is 7 marks)

Q8.

PAPER: IMA0_2F					
Question		Working	Answer	Mark	Notes
	(a)		40	3	M1 for $32^2 + 24^2$ M1 for $\sqrt{1600}$ or $\sqrt{(32^2 + 24^2)}$ A1 cao
	(b)		22.72	4	M1 for use of $\pi \times 60$ oe M1 for method to calculate perimeter of triangle, eg $2 \times '40' + 48 (=128)$ M1(dep M2) for complete method to find total length of strip for both mirrors or to find the cost of strip for one mirror, eg $2 \times £5.68$ A1 for £22.72 from correct working

Q9.

The diagram shows the distances, in kilometres, between some towns, by road.

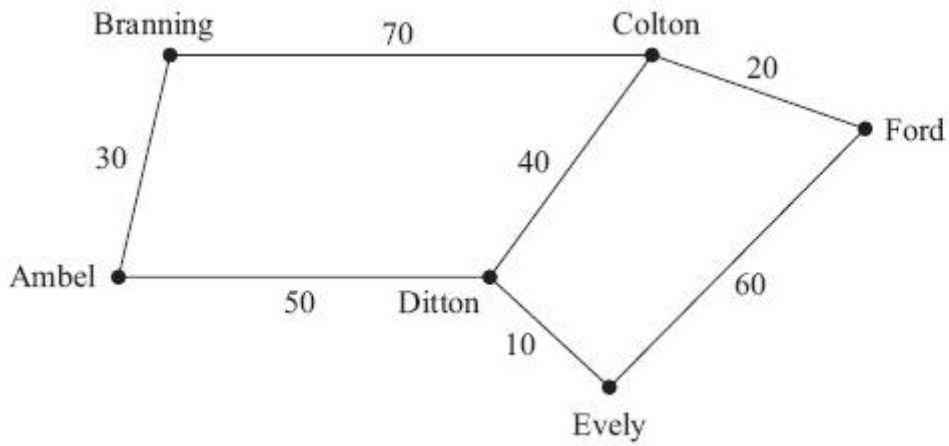


Diagram **NOT** accurately drawn

Work out the shortest distance between Ambel and Ford by road.

.....
(Total for Question is 2 marks)

Q9.

		Working	Answer	Mark	Notes
			110	2	M1 for $30 + 70 + 20 (=120)$ or $50 + 40 + 20 (=110)$ or $50 + 10 + 60 (=120)$ A1 cao

Q10.

Complete this table.

Write a sensible unit for each measurement.

	Metric	Imperial
The length of a pencil	centimetres
The weight of a tomato	ounces
The amount of milk in a bottle	pints

(Total for Question is 3 marks)

Q10.

		Working	Answer	Mark	Notes
			inches grams litres	3	B1 for inch(es) or ins B1 for gram(s) or g B1 for litre(s) or l or millilitre(s) or ml/ (accept centilitres or cc or cl or cm ³)