

GENERAL CERTIFICATE OF SECONDARY EDUCATION
MATHEMATICS C (GRADUATED ASSESSMENT)
MODULE M1 – SECTION A

B271A

Candidates answer on the question paper

OCR Supplied Materials:

None

Other Materials Required:

- Geometrical instruments
- Tracing paper (optional)

Tuesday 20 January 2009
Morning

Duration: 30 minutes



Candidate Forename		Candidate Surname	
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Centre Number							Candidate Number				
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INSTRUCTIONS TO CANDIDATES

- Write your name clearly in capital letters, your Centre Number and Candidate Number in the boxes above.
- Use black ink. Pencil may be used for graphs and diagrams only.
- Read each question carefully and make sure that you know what you have to do before starting your answer.
- Show your working. Marks may be given for a correct method even if the answer is incorrect.
- Answer **all** the questions.
- Do **not** write in the bar codes.
- Write your answer to each question in the space provided, however additional paper may be used if necessary.

INFORMATION FOR CANDIDATES

- The number of marks is given in brackets [] at the end of each question or part question.
- The total number of marks for this Section is **25**.
- This document consists of **8** pages. Any blank pages are indicated.

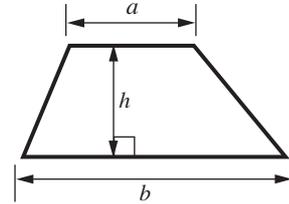
WARNING

No calculator can be used for Section A of this paper

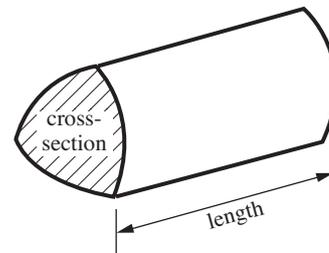
FOR EXAMINER'S USE	
SECTION A	
SECTION B	
TOTAL	

Formulae Sheet

Area of trapezium = $\frac{1}{2}(a + b)h$



Volume of prism = (area of cross-section) \times length



PLEASE DO NOT WRITE ON THIS PAGE

1

4	7	20	28	34	45	57
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Complete these sentences using numbers from the box.
You can use each number more than once.

- (a) The odd numbers are [2]
- (b) The number which can be divided exactly by 10 is [1]
- (c) The number nearest to 30 is [1]
- (d) The number which is odd **and** can be divided exactly by 5 is [1]

2 Work out.

(a) $37 + 14$

(a)..... [1]

(b) half of 124

(b)..... [1]

3 The Smith family flew to Florida for a holiday.

(a) The clock shows the time the plane left Manchester.

What time did the plane leave Manchester?



(a)..... [1]

(b) The plane flew six thousand one hundred and thirty four kilometres.

Write the number six thousand one hundred and thirty four in figures.

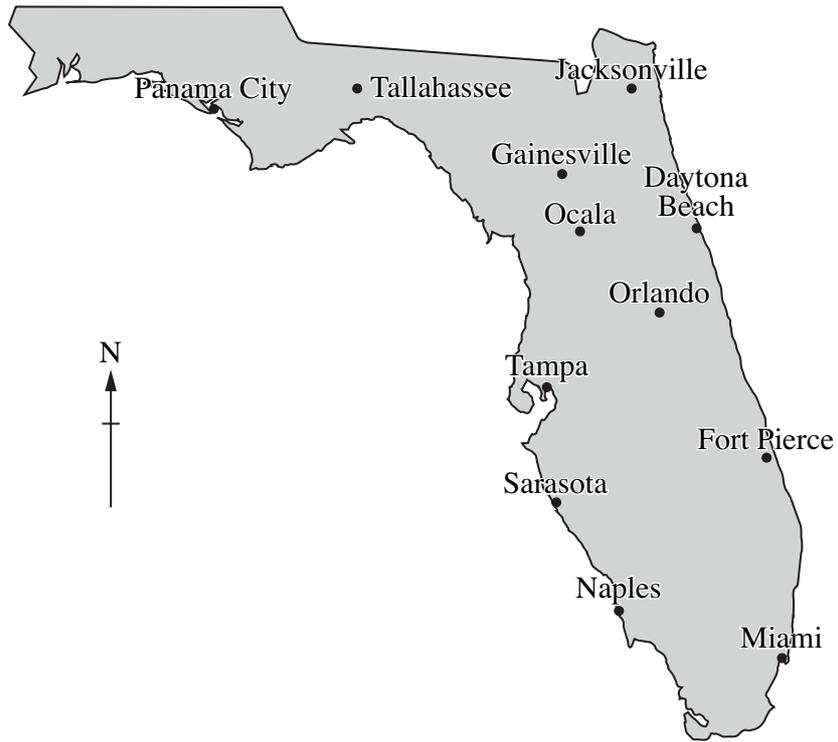
(b) [1]

(c) The Smith family left Orlando airport at 14:35 to drive to their hotel.
They arrived at the hotel at 15:20.

How long did it take to drive to their hotel?

(c).....minutes [1]

(d) This map shows some places in Florida.



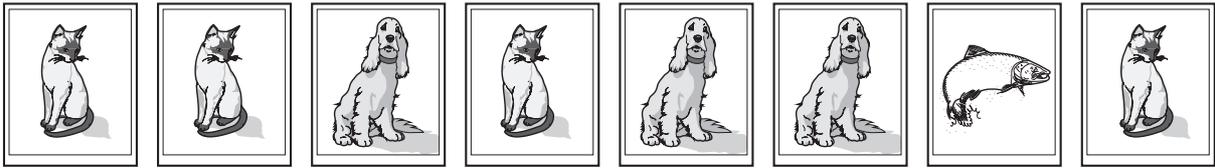
- (i) Which town is East of Tallahassee? (d)(i).....[1]

- (ii) Which town is South-west of Fort Pierce? (ii).....[1]

- (iii) Mr Smith drives from Tampa to Miami.
In what direction does he drive? (iii).....[1]

- (iv) The distance from Tampa to Miami is 246 miles.
Write 246 to the nearest ten. (iv).....[1]

4 Wayne puts these cards on a table.



evens

impossible

unlikely

likely

certain

He takes a card without looking.

Choose a word from the box to complete each of these sentences.

- (a) It is that he takes a card showing a cat. [1]
- (b) It is that he takes a card showing a hamster. [1]

5 Here is a number pattern.

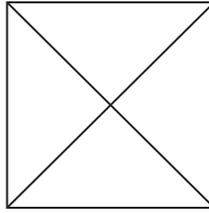
17 20 23 26 29

- (a) What is the next number in this pattern? (a).....[1]
- (b) Explain how you worked out your answer.
..... [1]

6 Chris orders three pizzas.

(a) Chris eats $\frac{3}{4}$ of his pizza.

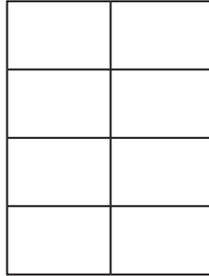
Shade $\frac{3}{4}$ of this shape.



[1]

(b) Jean eats $\frac{1}{4}$ of her pizza.

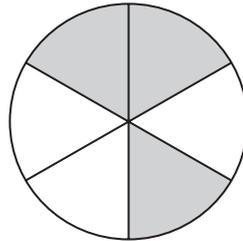
Shade $\frac{1}{4}$ of this shape.



[1]

(c) Lois eats some slices of her pizza.

What fraction of this shape is shaded?



(c)..... [1]

7 Write these measurements in order of size starting with the shortest.

500 mm

5 m

5 cm

5 mm

.....
shortest

.....

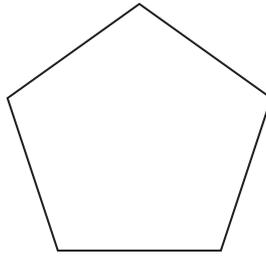
.....

.....

[2]

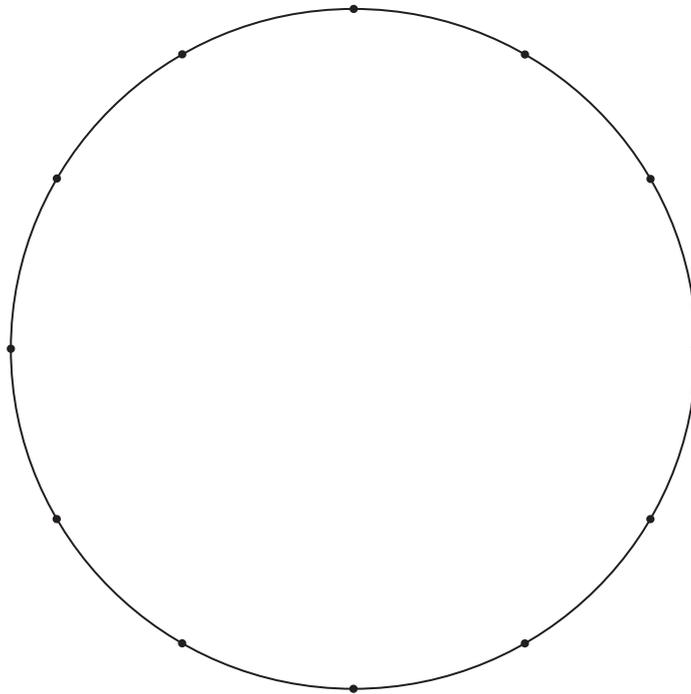
TURN OVER FOR QUESTION 8

8 (a) Write down the name of this shape.



(a)..... [1]

(b) Draw a hexagon in this circle.
Use the dots on the circle to help you.



[1]