

Surname	Initial(s)
Signature	

Paper Reference(s)

**5382F/07**

# Edexcel GCSE

**Mathematics (Modular) – 2381**

Paper 7 (Non-Calculator)

## Foundation Tier



Unit 2 Stage 1

Wednesday 30 June 2010 – Morning

Time: 30 minutes

**Materials required for examination**

Multiple Choice Answer Sheet  
Ruler graduated in centimetres and millimetres, protractor, compasses, HB pencil, eraser.

**Items included with question papers**

Nil

### **Instructions to Candidates**

Use a HB pencil. Do not open this booklet until you are told to do so.

**Before the test begins:**

Check that the answer sheet is for the correct test and that it contains your candidate details.

**How to answer the test:**

For each question, choose the right answer, A, B, C, D or E and mark it in HB pencil on the answer sheet.

For example, the answer C would be marked as shown.



Mark only **one** answer for each question. If you change your mind about an answer, rub out the first mark **completely**, then mark your new answer.

Answer **all** the questions.

Do any necessary calculations and rough work in this booklet. **Calculators must not be used.**

**You must not take this booklet or the answer sheet out of the examination room.**

### **Information for Candidates**

There are 25 questions in this question paper. The total mark for this paper is 25.

There are 12 pages in this question paper. Any blank pages are indicated.

### **Advice to Candidates**

Work steadily through the paper. Do not spend too long on one question.

If you cannot answer a question, leave it and attempt the next one.

Return at the end to those you have left out.

Printer's Log. No.

**H36813A**



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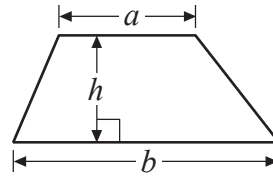
*Turn over*

## GCSE Mathematics

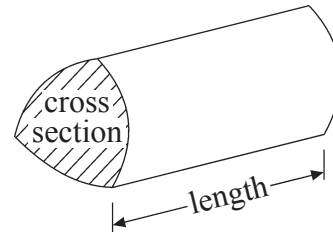
### Formulae: Foundation Tier

**You must not write on this formulae page.  
Anything you write on this formulae page will gain NO credit.**

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



**Volume of prism** = area of cross section  $\times$  length



Answer ALL TWENTY FIVE questions using the answer sheet.

You must NOT use a calculator.

1. What is the number 70 560 in words?

Seventy thousand and fifty six

**A**

Seven thousand five hundred and sixty

**B**

Seventy thousand five hundred and sixty

**C**

Seventy thousand five hundred and six

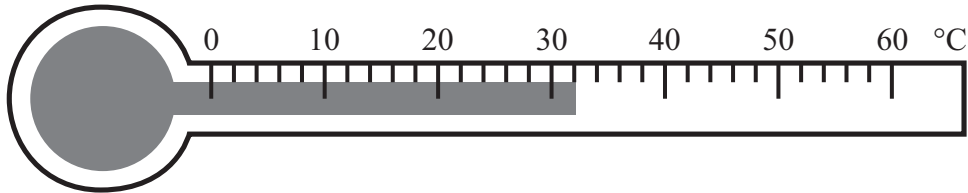
**D**

Seven thousand and fifty six

**E**

---

2. What temperature is shown on this thermometer?



31°C

**A**

30.2°C

**B**

30.1°C

**C**

32°C

**D**

44°C

**E**

---

3. What is the number 87 942 rounded to the nearest thousand?

87 000

**A**

90 000

**B**

87 900

**C**

88 000

**D**

100 000

**E**

---

4. One number is **not** a factor of 24  
Which number?

2

**A**

4

**B**

8

**C**

12

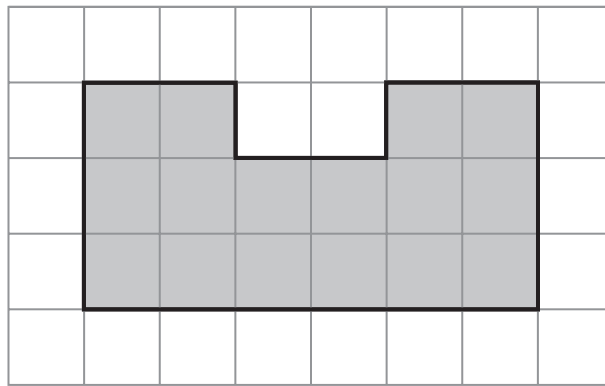
**D**

16

**E**

---

5. The diagram shows a shaded shape on a centimetre grid.



What is the perimeter of the shaded shape?

- 20 cm      16 cm      22 cm      24 cm      40 cm  
**A**          **B**          **C**          **D**          **E**
- 

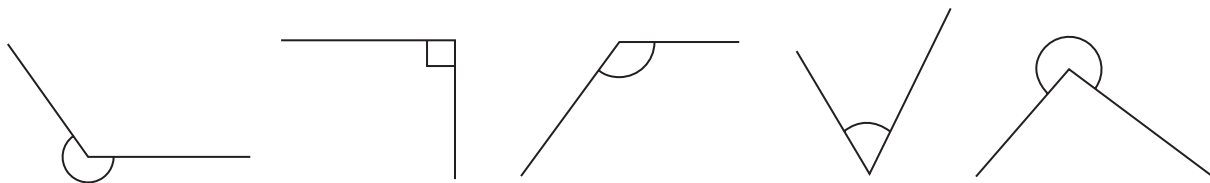
6. Here are the first five terms of a sequence.

-2              3              8              13              18

The next term of this sequence is

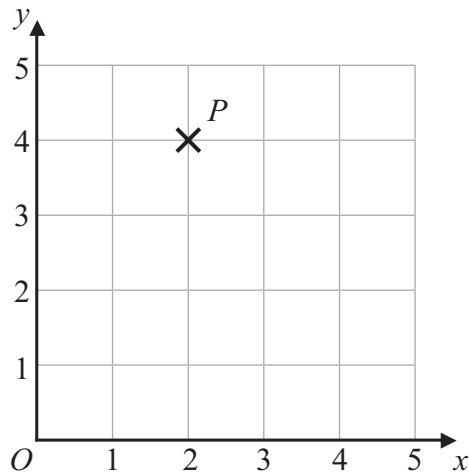
- 23              -23              25              28              19  
**A**          **B**          **C**          **D**          **E**
- 

7. One of the marked angles is an obtuse angle.  
 Which angle?



- A**          **B**          **C**          **D**          **E**
-

8.



What are the coordinates of the point  $P$ ?

- |          |          |          |          |          |
|----------|----------|----------|----------|----------|
| (0, 4)   | (4, 2)   | (2, 0)   | (0, 2)   | (2, 4)   |
| <b>A</b> | <b>B</b> | <b>C</b> | <b>D</b> | <b>E</b> |
- 

9. Which shape has diagonals that must cross at right angles?

- |           |               |          |           |               |
|-----------|---------------|----------|-----------|---------------|
| Rectangle | Parallelogram | Rhombus  | Trapezium | Quadrilateral |
| <b>A</b>  | <b>B</b>      | <b>C</b> | <b>D</b>  | <b>E</b>      |
- 

10. Which is the smallest number?

- |          |          |          |          |          |
|----------|----------|----------|----------|----------|
| 5        | -3       | -6       | 0        | 1        |
| <b>A</b> | <b>B</b> | <b>C</b> | <b>D</b> | <b>E</b> |
- 

11. Jane's age is  $n$  years.  
Duncan is 5 years younger than Jane.

What is Duncan's age?

- |          |          |          |          |          |
|----------|----------|----------|----------|----------|
| $5n$     | $5 - n$  | $n + 5$  | 5        | $n - 5$  |
| <b>A</b> | <b>B</b> | <b>C</b> | <b>D</b> | <b>E</b> |
-

12. Here is a rectangle.

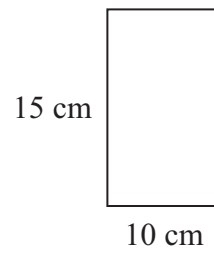


Diagram **NOT** accurately drawn

What is the area of this rectangle?

150 cm<sup>2</sup>

50 cm<sup>2</sup>

75 cm<sup>2</sup>

325 cm<sup>2</sup>

25 cm<sup>2</sup>

**A**

**B**

**C**

**D**

**E**

13. Which is the largest number?

0.6

0.604

0.64

0.6044

0.074

**A**

**B**

**C**

**D**

**E**

14.

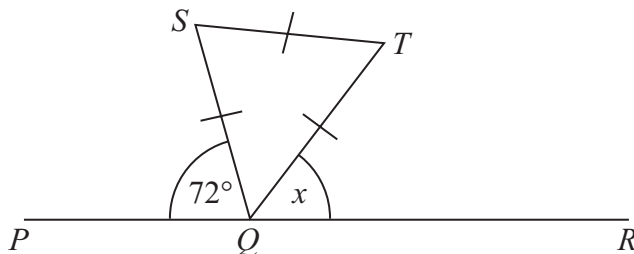


Diagram **NOT** accurately drawn

*PQR* is a straight line.

*QST* is an equilateral triangle.

Angle *SQP* = 72°

What is the size of the angle marked *x*?

72°

48°

30°

54°

45°

**A**

**B**

**C**

**D**

**E**

15. Mr Akbar left home at 08 35 to go to work.  
He arrived at work at 09 17

How many minutes did it take Mr Akbar to get to work?

- |            |            |            |            |            |
|------------|------------|------------|------------|------------|
| 52 minutes | 82 minutes | 78 minutes | 42 minutes | 68 minutes |
| <b>A</b>   | <b>B</b>   | <b>C</b>   | <b>D</b>   | <b>E</b>   |
- 

16.  $12 + 8 \times 2 - 1 =$

- |          |          |          |          |          |
|----------|----------|----------|----------|----------|
| 27       | 20       | 21       | -4       | 39       |
| <b>A</b> | <b>B</b> | <b>C</b> | <b>D</b> | <b>E</b> |
- 

17. Here are the first four terms of a sequence.

1                      7                      13                      19

One of these numbers is a term of this sequence.  
Which number?

- |          |          |          |          |          |
|----------|----------|----------|----------|----------|
| 45       | 47       | 49       | 51       | 53       |
| <b>A</b> | <b>B</b> | <b>C</b> | <b>D</b> | <b>E</b> |
- 

18.  $n$  is an odd number.

One of these expressions **always** represents an even number.  
Which expression?

- |          |          |          |          |          |
|----------|----------|----------|----------|----------|
| $n + 2$  | $2n + 1$ | $2n - 1$ | $n + 1$  | $3n$     |
| <b>A</b> | <b>B</b> | <b>C</b> | <b>D</b> | <b>E</b> |
-

19. Here is a right-angled triangle.

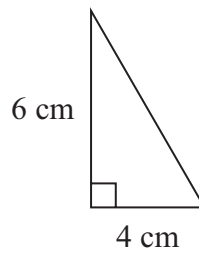


Diagram **NOT**  
accurately drawn

What is the area of this triangle?

12 cm<sup>2</sup>

24 cm<sup>2</sup>

5 cm<sup>2</sup>

10 cm<sup>2</sup>

6 cm<sup>2</sup>

**A**

**B**

**C**

**D**

**E**

---

20.  $-8 - 5 =$

-13

-3

40

13

3

**A**

**B**

**C**

**D**

**E**

---

21.

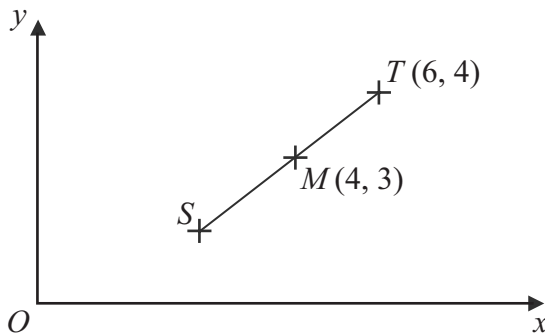


Diagram **NOT**  
accurately drawn

*T* is the point (6, 4).

*M* is the point (4, 3).

*M* is the midpoint of *ST*.

Which are the coordinates of the point *S* ?

(2, 1)

(2, 2)

$(5, 3\frac{1}{2})$

(3, 2)

(3, 1)

**A**

**B**

**C**

**D**

**E**

---



22.  $\frac{27}{8} =$

$2\frac{7}{8}$

**A**

$\frac{8}{27}$

**B**

$3\frac{1}{8}$

**C**

$2\frac{3}{8}$

**D**

$3\frac{3}{8}$

**E**

---

23. The Highest Common Factor (HCF) of 24 and 40 is

2

**A**

8

**B**

120

**C**

4

**D**

960

**E**

---

24.  $36.8 \times 1.65 = 60.72$

The value of  $3.68 \times 165$  is

0.6072

**A**

60.72

**B**

607.2

**C**

6072

**D**

60720

**E**

---

25. Here are the first five terms of an arithmetic sequence.

-2

3

8

13

18

Which is the expression for the  $n$ th term of this sequence?

$n - 2$

**A**

$5n - 2$

**B**

$n + 5$

**C**

$5n - 7$

**D**

$5n$

**E**

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**TOTAL FOR PAPER: 25 MARKS**

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