



Please write clearly in block capitals.

Centre number

--	--	--	--	--

Candidate number

--	--	--	--

Surname

Forename(s)

Candidate signature

I declare this is my own work.

Functional Skills Level 2 MATHEMATICS

Paper 1 Non-Calculator

Tuesday 28 February 2023

Morning

Time allowed: 30 minutes

Materials

For this paper you must have:

- mathematical instruments.
- You must **not** use a calculator.



For Examiner's Use	
Question	Mark
1–5	
6	
TOTAL	

Instructions

- Use black ink or black ball-point pen. Draw diagrams in pencil.
- Answer **all** questions.
- You must answer the questions in the spaces provided. Do not write outside the box around each page or on blank pages.
- If you need extra space for your answer(s), use the lined pages at the end of this book. Write the question number against your answer(s).
- Do all rough work in this book. Cross through any work you do not want to be marked.
- State the units of your answer where appropriate.

Information

- The marks for questions are shown in brackets.
- The maximum mark for this paper is 20.
- You may ask for more answer paper, graph paper and tracing paper. These must be tagged securely to this answer book.

Advice

In all calculations, show clearly how you work out your answer.



M A R 2 3 8 3 6 2 1 0 1

IB/Mar23/E7

8362/1
QAN 603/4258/4

FUNCTIONAL SKILLS ONLINE COURSES

The screenshot shows the 'Functional Skills English Initial Assessment' and 'Functional Skills Maths Initial Assessment' sections. Each section includes a 'Start Initial Assessment' button and a 'Pick my own' button. The English section also displays a 'Recommendations' box stating: 'Based on your results from this initial assessment, we estimate you are currently at **Level 1.5**. From this diagnostic, we think one of the following courses would be suitable: Functional Skills Maths Level 2'.

- ✓ Explainer videos on every topic
- ✓ Quick-fire style multiple choice questions
- ✓ Test your knowledge with exam-style questions
- ✓ Written solutions for all questions

- ✓ Your answers are analysed to determine your Current Level
- ✓ Suggested courses for you to enrol on based on your calculated level
- ✓ Always know the level you are currently working at
- ✓ Determine when you are ready to sit your exam

The screenshot shows a math topic page titled 'Why do we write?'. It features a question: 'Some students were asked about the number of hours they spent per week studying. Their answers are listed below: 5, 8, 12, 8, 15, 4, 5, 9, 21, 3. If all the students had the same number of hours spent studying, what would their answer be to 1 decimal place?'. Below the question is a diagram of a trapezoid with dimensions: top = 5 cm, bottom = 8 cm, height = 4 cm, and a slanted side. The question asks to calculate the area of the trapezoid using the formula $A = \frac{1}{2} (h + b) \times w$.

The screenshot shows the 'Using Numbers' topic page. It displays a 'Course Completion %' of 6.44% and a 'Using Numbers' section with 16 topics, 27.08% complete, and a 'Start Learning' button. Below this, it shows 'Previous Results for Addition and Subtraction (including)' with two entries: one from 25/04/2022 at 80% (Easy) and another from 18/01/2022 at 20% (Medium).

- ✓ See your progress through as you progress through each topic area
- ✓ Get your average scores for practice questions, topic tests and mock exams
- ✓ View all practice question, topic test and mock exam attempts over time
- ✓ View historical attempts to analyse your progress over time

Or visit
passfunctionalskills.co.uk

Section A

Do not write
outside the
boxAnswer **all** questions in the spaces provided.

1 Here are six numbers.

10 13 13 **14**
 A 15 18 21

Work out the median.

Circle your answer.

[1 mark]

11

13

14

15

2

Work out $\overbrace{(7+3)^2}^{10} - \overbrace{6 \times 4}^{24}$

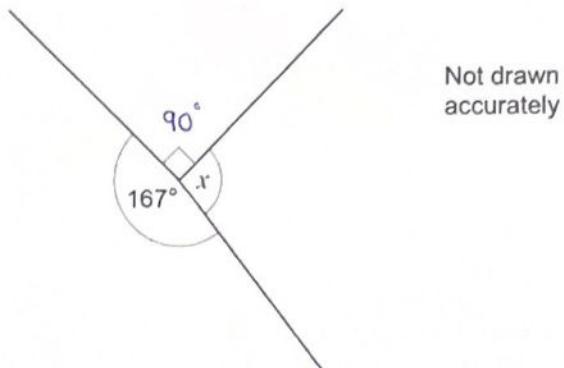
[2 marks]

$$(10)^2 - (24) = 100 - 24$$

$$= 76$$

Answer 76

0 2

3 Work out the size of angle x .Do not write
outside the
box

[2 marks]

$$167 + 90 + x = 360 \quad \text{angles in circle sum to}$$

$$360$$

$$x = 360 - 167 - 90$$

$$= 103$$

Answer $x = 103$ °

Turn over for the next question

Turn over ►



0 3

IB/Mar23/8362/1

4 Work out $3.762 \div 9$

[2 marks]

$$\begin{array}{r} 0.418 \\ \hline 9 \overline{)3.762} \end{array}$$

Answer 0.418

Do not write outside the box

5 The probability of an event happening is 83%

What is the probability of the event **not** happening?

[1 mark]

100 - 83 = 17

Answer 17 %

8



0 4

Section B

Answer all questions in the spaces provided.

6 Fudge

Calvin is making fudge.

6 (a) A recipe needs 9 ounces of butter to make 30 pieces of fudge.

Calvin wants to make 40 pieces.

He has 175 grams of butter.

How much **more** butter does he need?Give your answer in **grams**.

Use 1 ounce = 25 grams

[5 marks]

$$9 \div 30 = 0.3 \text{ ounces for 1 piece of fudge}$$

$$0.3 \times 40 = 12 \text{ ounces for 40 pieces of fudge}$$

$$12 \times 25 = 300 \text{ grams}$$

$$300 - 175 = 125 \text{ grams}$$

Answer 125 grams

Question 6 continues on the next page

Turn over ►



0 5

IB/Mar23/8362/1

Do not write
outside the
box

6 (b) Calvin makes the 40 pieces of fudge.

He covers

14 of the pieces in white chocolate

the remaining pieces in milk chocolate.

What fraction of the pieces does he cover in milk chocolate?

Give your answer in its simplest form.

[3 marks]

$$40 - 14 = 26$$

$$\frac{26}{40} = \frac{13}{20}$$

Answer

$\frac{13}{20}$

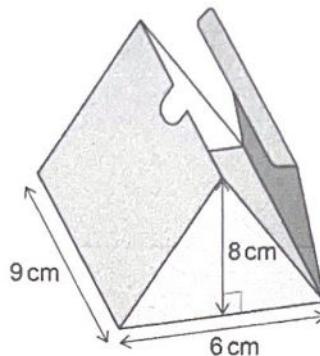


0 6

IB/Mar23/8362/1

6 (c) Calvin puts some of the fudge into a gift box.
The box is a triangular prism.

Do not write
outside the
box



To work out the volume of the box, he follows these steps.

Step 1 Work out the area of the triangular face.

Step 2 Multiply the answer to **Step 1** by the length of the box.

For this box, each piece of fudge needs 10 cm^3 of space.

How many pieces of fudge can Calvin fit in the box?

[4 marks]

$$\begin{aligned} \text{Triangular face area : } A &= 6 \times 8 \div 2 \\ &= 24 \text{ cm}^2 \end{aligned}$$

$$\begin{aligned} \text{Volume} &= 24 \times 9 \\ &= 216 \text{ cm}^3 \end{aligned}$$

$$216 \div 10 = 21.6$$

so can fit 21 pieces of fudge in box

Answer 21

12

END OF QUESTIONS



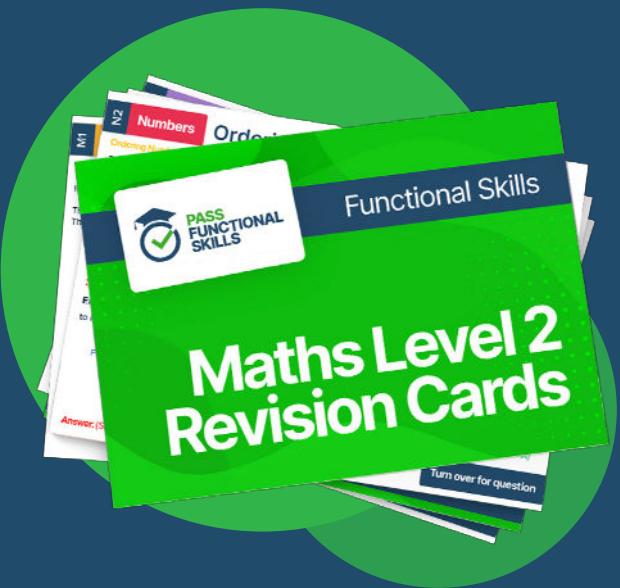
0 7



**PASS
FUNCTIONAL
SKILLS**



Functional Skills Maths
Level 2 Practice Papers



Functional Skills Maths
Level 2 Revision Cards



Functional Skills English Level 2
Practice Papers & Revision Cards



Functional Skills Maths
Level 2 Pocket Revision Guide

Or visit
passfunctionalskills.co.uk