AI TONG SCHOOL

2026

PRELIMINARY EXAMINATION
PRIMARY 6

MATHEMATICS
PAPER 1
(Booklet A)

DURATION (Booklets A and B) : 1 h 10 min

DATE : 18 AUGUST 2026

INSTRUCTIONS

1. Do not turn over this page until you are told to do so.
2. Follow all instructions carefully.
3. Answer all questions.
4. Use a 2B pencil to shade your answers in the Optical Answer Sheet (OAS).
5. The use of calculators is **NOT** allowed.

Name: _____ ( )

Class: Primary 6 _____

Marks:

Parent's Signature	: _____	
Date	: _____	

Paper 1 (Booklet A)	26

Paper 1 Booklet A

Questions **1** to **10** carry 1 mark each. Questions 11 to 18 carry 2 marks each.
For each question, four options are given. One of them is the correct answer.
Make your choice (1, 2, 3 or 4) and shade your answer on the Optical Answer Sheet.

(26 marks)

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1 In the number 9 402 517, which digit is in the ten thousands place?

(1) 0
(2) 2
(3) 5
(4) 4

2 Express 1050 cm in metres.

(1) 1.05 m
(2) 1.5 m
(3) 10.05 m
(4) 10.5 m

3 Which of the following is a common factor of 36 and 45?

(1) 9
(2) 6
(3) 5
(4) 4

4 The table below shows the time taken for four teams to complete a race.

Team	Time in seconds
A	31.5
B	34.0
C	33.4
D	30.9

Which team was first to complete the race?

(1) Team A
(2) Team B
(3) Team C
(4) Team D

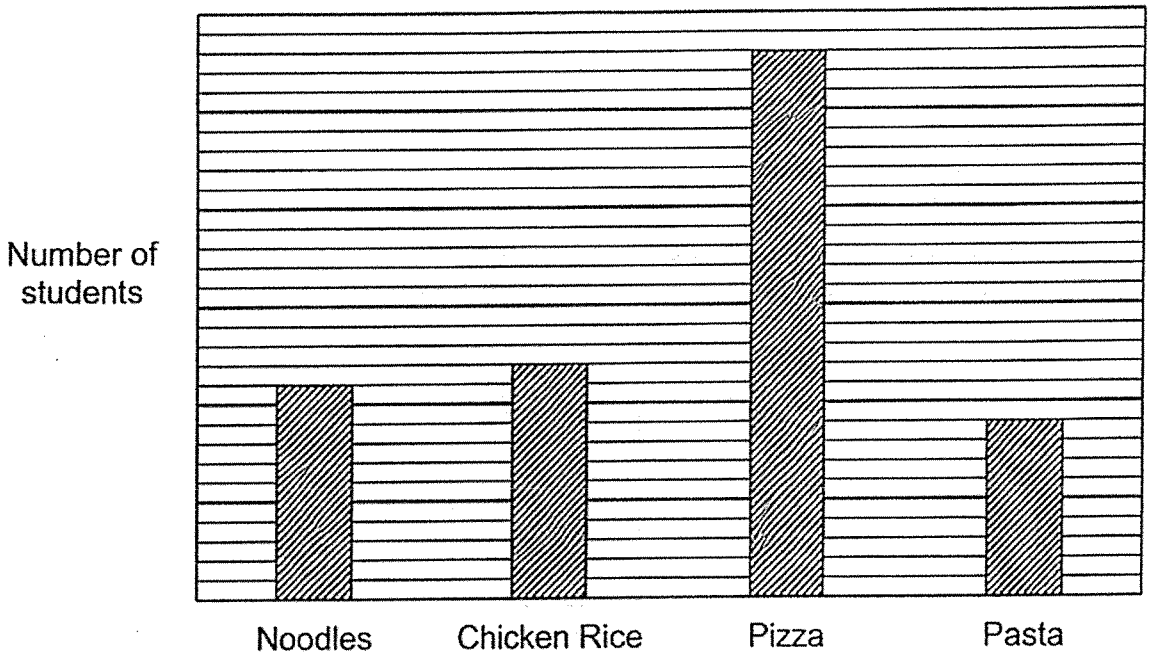
5 Arrange these fractions from the smallest to the largest.

$$\frac{7}{6}, \quad \frac{11}{12}, \quad 1\frac{1}{8}$$

	Smallest		Largest
(1)	$\frac{7}{6}$,	$1\frac{1}{8}$,	$\frac{11}{12}$
(2)	$1\frac{1}{8}$,	$\frac{7}{6}$,	$\frac{11}{12}$
(3)	$\frac{11}{12}$,	$\frac{7}{6}$,	$1\frac{1}{8}$
(4)	$\frac{11}{12}$,	$1\frac{1}{8}$,	$\frac{7}{6}$

Use the information below to answer Questions 6 and 7.

The bar graph shows the favourite food of a group of students.



6 Which is the least popular type of food?

(1) Noodles

(2) Chicken Rice

(3) Pizza

(4) Pasta

7 What is the ratio of the number of students who chose chicken rice to the total number of students who chose noodles, pizza and pasta?

(1) 1 : 4

(2) 1 : 5

(3) 3 : 7

(4) 4 : 13

8 There were 150 caps in a shop. 52% of the caps were sold.
How many caps were left?

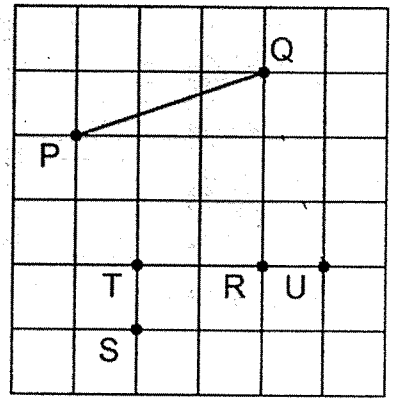
(1) 48

(2) 72

(3) 78

(4) 98

9 Jonas drew a line perpendicular to PQ in the square grid.
Which of the following lines is the line that he drew?



(1) SP

(2) SU

(3) TP

(4) QR

10 In a game, each player had to score more than 10 points to win a prize.
The results were shown in the table below.

Number of points scored	0 to 5	6 to 10	11 to 15	16 to 20
Number of players	3	18	29	10

How many players won a prize?

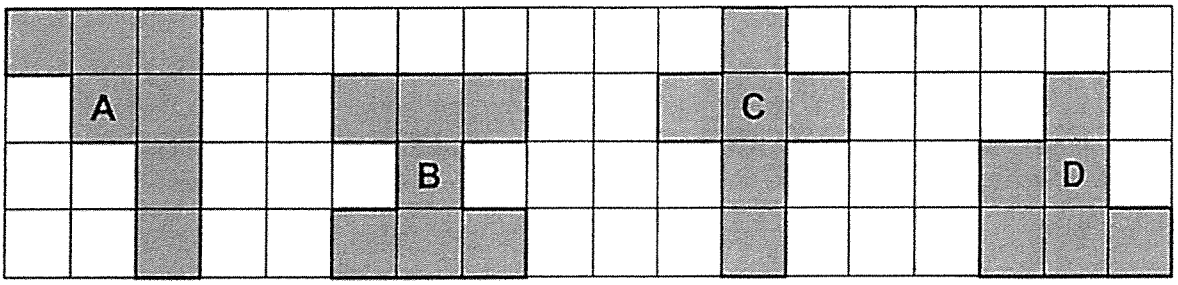
(1) 18

(2) 21

(3) 39

(4) 57

11 Four figures, A, B, C and D, are shown on a square grid.
Which two figures have the same perimeter?



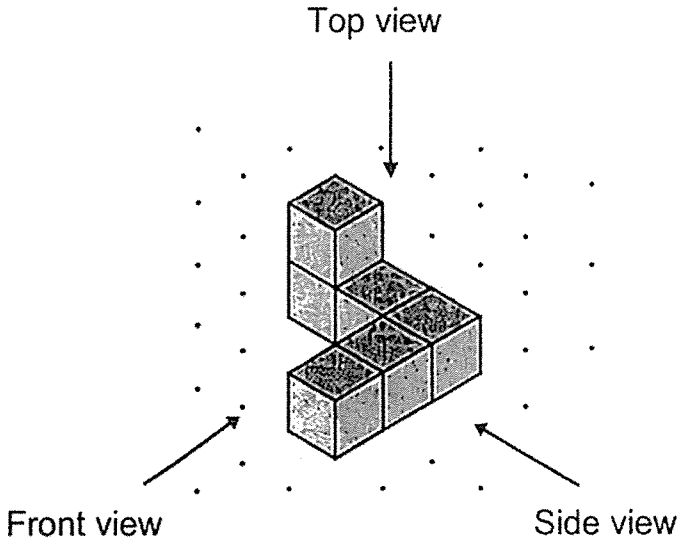
(1) A and B

(2) A and C

(3) B and D

(4) C and D

12 6 cubes are used to form the solid shown.



What is the greatest number of cubes that can be added to the figure without changing the top and side views?

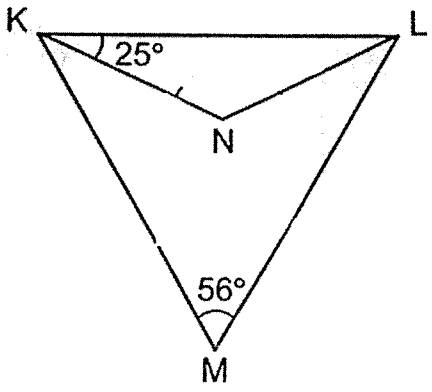
(1) 1

(2) 2

(3) 3

(4) 4

13 In the figure, KLM and KLN are two isosceles triangles.
KM = LM and KN = LN. ∠LKN = 25° and ∠KML = 56°. Find ∠NLM.



(1) 28°

(2) 31°

(3) 37°

(4) 62°

14 9.3 kg of rice were packed into three bags.
The mass of the first bag was twice as heavy as the second bag.
The mass of the second bag was 3 times as heavy as the third bag.
What was the mass of the second bag?

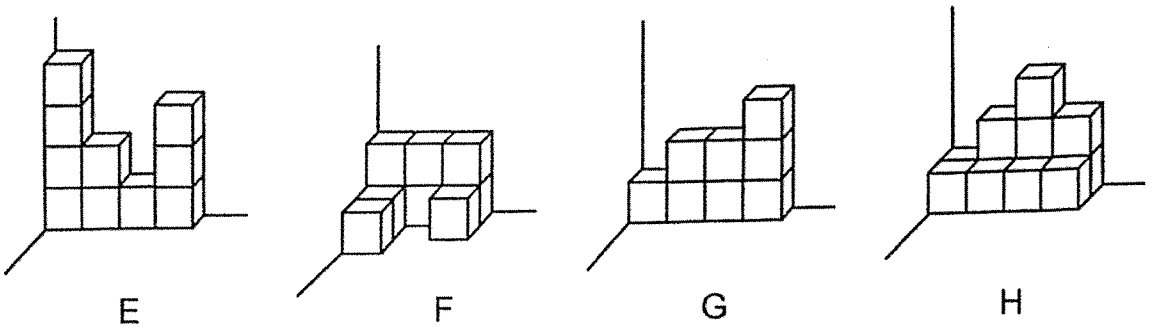
(1) 0.93 kg

(2) 2.79 kg

(3) 3.10 kg

(4) 4.65 kg

15 Unit cubes are used to form solids E, F, G and H.



E F G H

Alan rearranged the unit cubes from one of the solids to form a larger cube.
Which solid was it?

(1) E
(2) F
(3) G
(4) H

16 Some books were arranged on four shelves, W, X, Y and Z.
There was a total of 114 books on shelves W and X.
There was a total of 180 books on shelves X, Y and Z.
The total number of books on the four shelves was 6 times the number of books on Shelf X. How many books were there on Shelf X?

(1) 42
(2) 49
(3) 57
(4) 66

17 Alicia received the same amount of pocket money every month.
In July, she spent $84 and saved the rest. In August, she spent only $60 and saved the rest. As a result, her savings increased by 30% in August.
How much was her pocket money?

(1) $104

(2) $140

(3) $164

(4) $224

18 A shop had some guppies and koi fish for sale. After selling some fishes, $\frac{1}{5}$ of the guppies and $\frac{3}{4}$ of the koi fish were left.

What fraction of the fishes were left?

(1) $\frac{5}{12}$

(2) $\frac{9}{32}$

(3) $\frac{9}{35}$

(4) $\frac{27}{35}$

AI TONG SCHOOL

2026

PRELIMINARY EXAMINATION
PRIMARY 6

MATHEMATICS
PAPER 1
(Booklet B)

DURATION (Booklets A and B) : 1 h 10 min

DATE : 18 AUGUST 2026

INSTRUCTIONS

1. Do not turn over this page until you are told to do so.
2. Follow all instructions carefully.
3. Answer all questions.
4. Use a dark blue or black ballpoint pen to write your answer in the space provided for each question.
5. Do not use correction fluid/tape.
6. Do not use highlighters on any part of your answers.
7. The use of calculators is **NOT** allowed.

Parent's signature:

_____

Marks:

Paper 1 (Booklet B)	24

Booklet B

Questions **19** to **30** carry 2 marks each. Show your working clearly and write your answers in the spaces provided. For questions which require units, give your answers in the units stated. (24 marks)

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19 **(a)** Find the value of 125 × 900.

Ans: (a) _____

(b) What is the value of 36 + (30 – 12) ÷ 3 × 2?

Ans: (b) _____

---

20 **(a)** Express 5.24 as a mixed number in the simplest form.

Ans: (a) _____

(b) Express $\frac{7}{8}$ as a decimal.

Ans: (b) _____

---

21 (a) Find the value of $\frac{2}{3} + \frac{3}{7}$.
Give your answer as a mixed number in its simplest form.

Ans: (a) _____

[2]

(b) Find the value of $4 \div \frac{2}{5}$.

Ans: (b) _____

[2]

---

22 A machine started printing some booklets at 11 50. It completed printing the booklets at 12 30.

(a) How long did it take to print the booklets?

Ans: (a) _____ min

[2]

(b) The machine printed 9 booklets in 2 minutes. At this rate, how many booklets did it print from 11 50 to 12 30?

Ans: (b) _____ [2]

4

23 Use all the digits 3, 5, 7, 8 to form

(a) the smallest multiple of 5

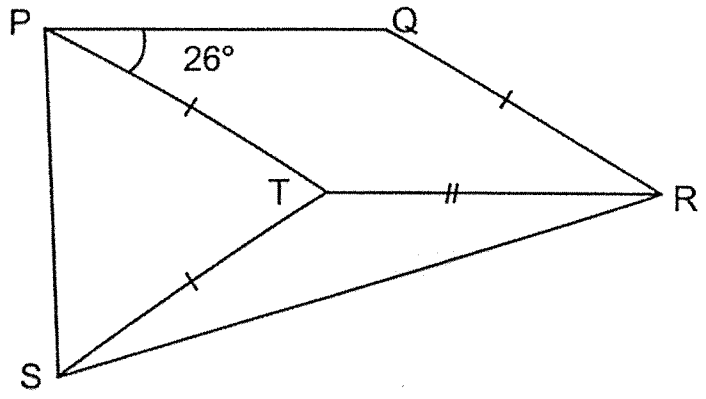
Ans: (a) _____

(b) the greatest number between 5000 and 8000.

Ans: (b) _____

---

24 In the figure, PQRT is a rhombus and PTS is an equilateral triangle. ∠QPT = 26°. Find ∠TSR.



Ans: _____

4

25 (a) Simplify the expression:

$102 + 15j - 13 + 6j$

Ans: (a) _____

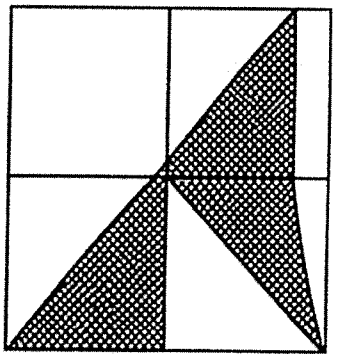
(b) Find the value of the expression when $x = 8$.

$$\frac{3x}{4} + \frac{32}{x}$$

Ans: (b) _____

---

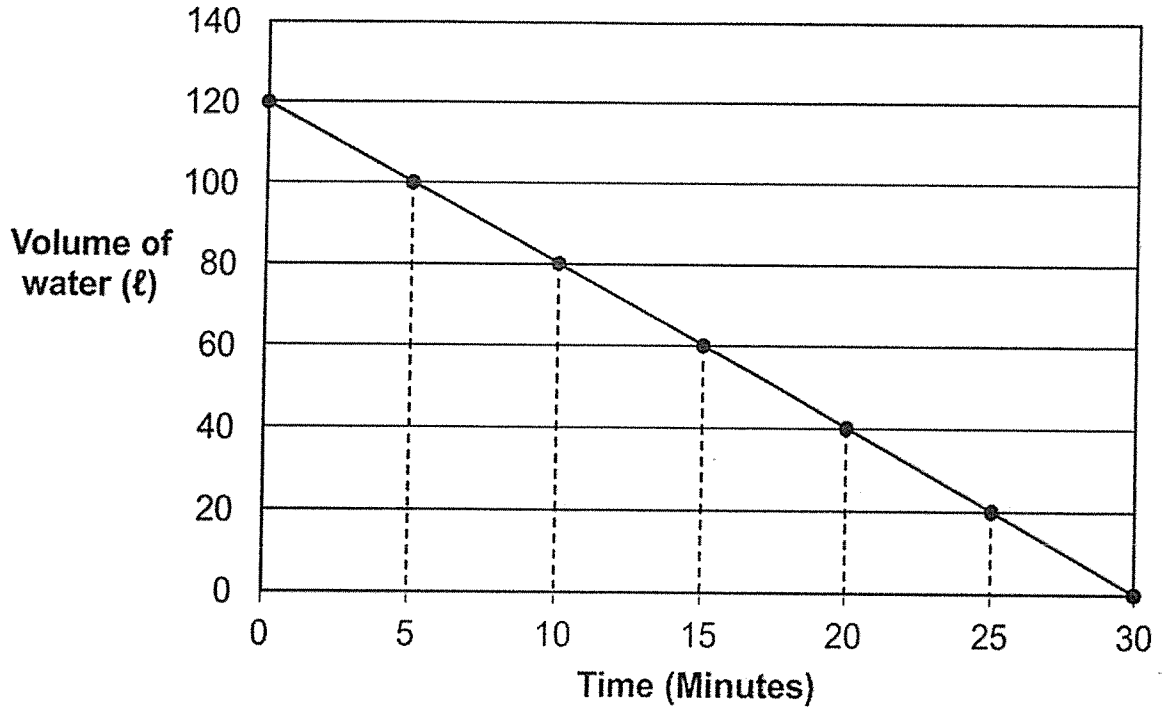
26. The figure below is made up of 4 identical squares.
What fraction of the figure is shaded?



Ans: _____

---

27 A tank was completely filled with water at first. A tap was turned on and water flowed out of the tank at a constant rate. The graph below shows the amount of water in the tank.



(a) How much water was left in the tank after the tap was turned on for 10 minutes?

Ans: (a) _____ ℓ

(b) How much water flowed out of the tank per minute?

Ans: (b) _____ ℓ

2

28 Two wheels with centres A and B were placed on a straight line as shown in Figure 1. Each wheel is of radius 7 cm.

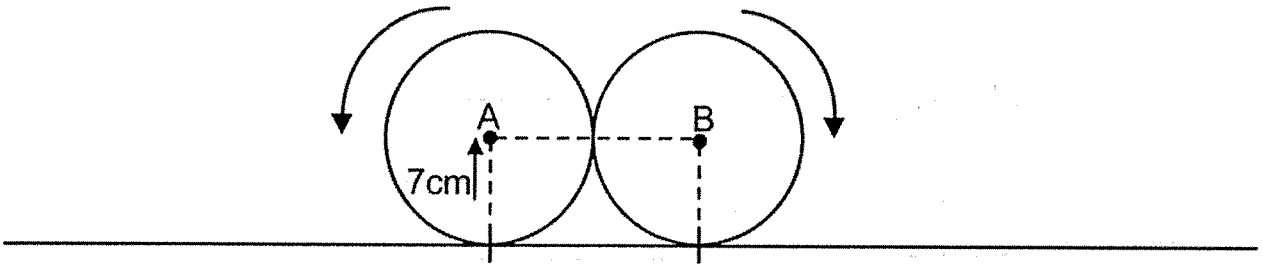


Figure 1

The wheels were rolled along a straight line in opposite directions.
Each wheel made 6 complete turns and came to a stop at the new positions as shown in Figure 2.

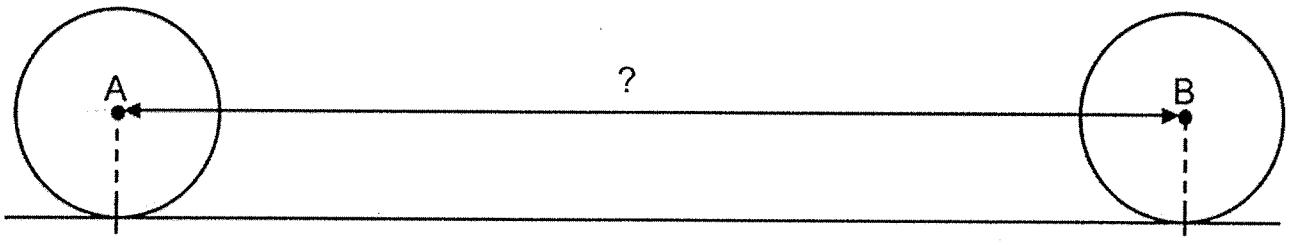


Figure 2

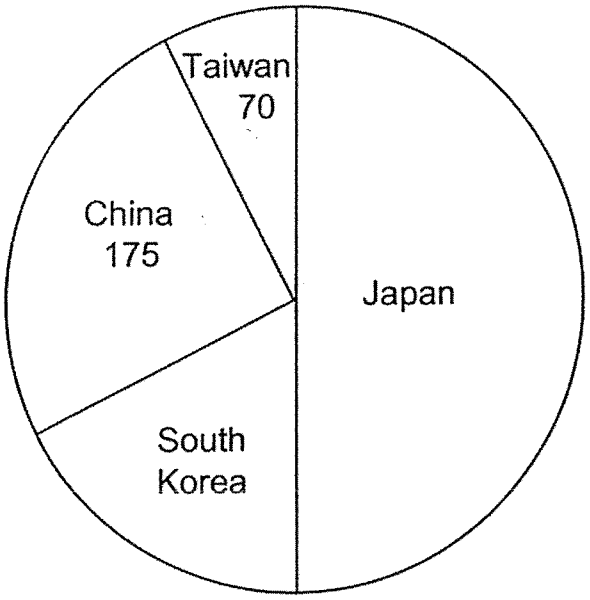
What is the distance between A and B after the turns? (Take $\pi = \frac{22}{7}$).

Ans: _____ cm

2

29 A group of adults was asked about their favourite country to visit.

$\frac{1}{2}$ of the adults chose Japan as their favourite country to visit.



(a) How many adults chose Japan as their favourite country to visit?

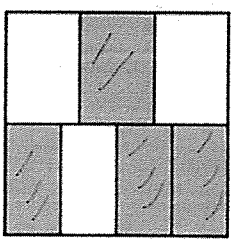
Ans: (a) _____

(b) What percentage of the adults chose South Korea as their favourite country to visit?

Ans: (b) _____

2

30 A square is first divided into two equal halves. The top half is further divided into 3 equal parts while the bottom half is divided into 4 equal parts. Some parts are then shaded as shown.



What is the ratio of the shaded area to the unshaded area of the square?

Ans: _____

2

End of Paper 1

AI TONG SCHOOL

2026

PRELIMINARY EXAMINATION

PRIMARY 6

MATHEMATICS
PAPER 2

DURATION : 1 h 20 min

DATE : 18 AUGUST 2026

INSTRUCTIONS

1. Do not turn over this page until you are told to do so.
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3. Answer all questions.
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6. Do not use highlighters on any part of your answers.
7. The use of an approved calculator is allowed.

Parent's signature:

_____

Marks :

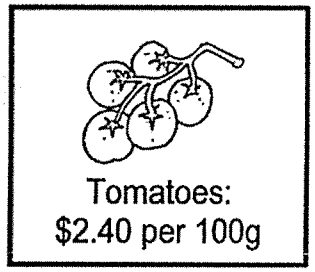
Paper 1	/50
Paper 2	/50
Total	/100

Paper 2

Questions **1** to **5** carry 2 marks each. Show your working clearly in the space provided for each question and write your answers in the spaces provided.
For questions which require units, give your answers in the units stated. (10 marks)

---

1 Mdm Tan bought 1.6 kg of tomatoes at the price shown. How much did she pay for the tomatoes?



Ans: $_____

---

and

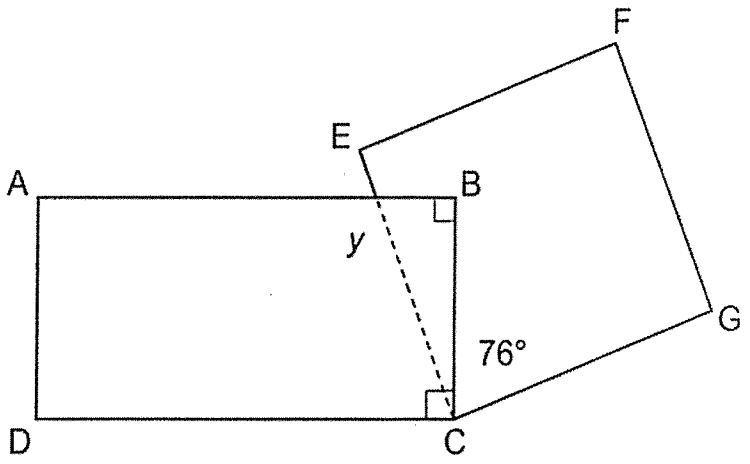
2 At a bookshop, markers are sold individually in packs of 8 as shown.

Asher has $50. How many markers can he buy at most?

Ans: _____

---

3 The figure below is made up of a rectangle ABCD and a square EFGC overlapping each other.



(a) Find $\angle x$.

Ans: (a) _____°

(b) Find $\angle y$.

Ans: (b) _____°

4 3 boys cycled an average distance of 23 km. 9 girls cycled an average distance of 17 km. What was the average distance each child cycled?

Ans: _____ km

---

5 4 identical squares of side 9 cm were cut from the corners of a rectangular cardboard measuring 70 cm by 45 cm as shown in Figure 1. The remaining cardboard was then folded to form an open box as shown in Figure 2.

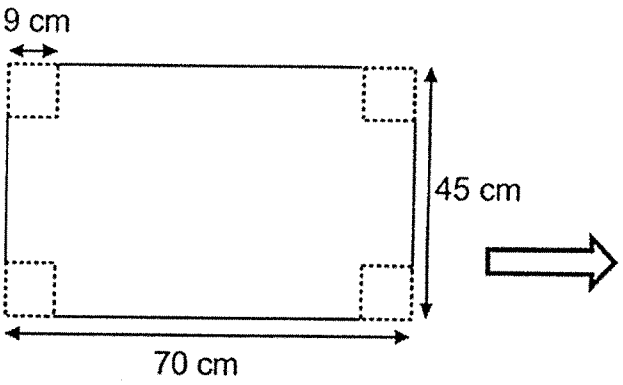


Figure 1

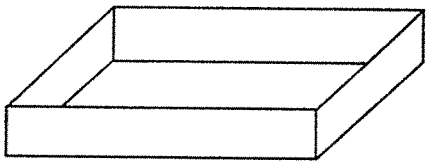


Figure 2

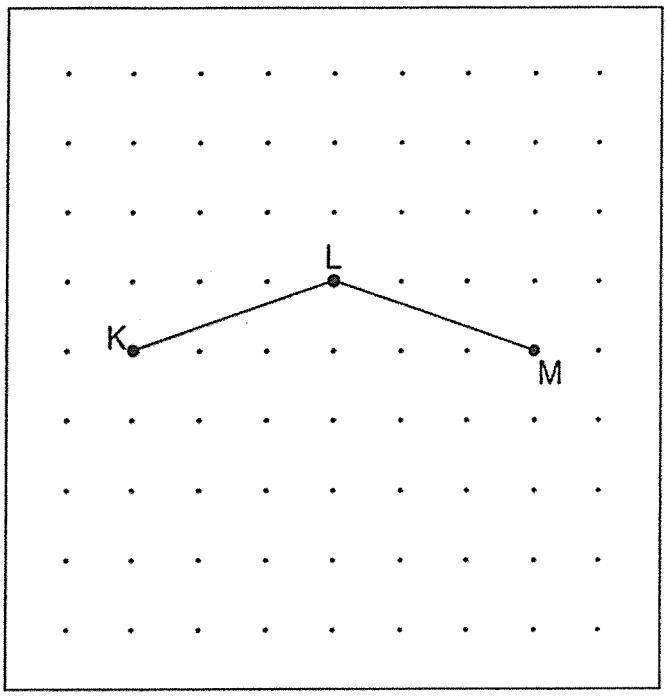
Find the volume of the box.

Ans: _____ cm^3

For questions **6** to **15**, show your working clearly in the space provided for each question and write the answers in the spaces provided.
The number of marks available is shown in the brackets [ ] at the end of each question or part-question. (40 marks)

---

6 Lines KL and LM are drawn on the square grid as shown below.



(a) Measure ∠KLM.

Ans : (a) _____ ° [1]

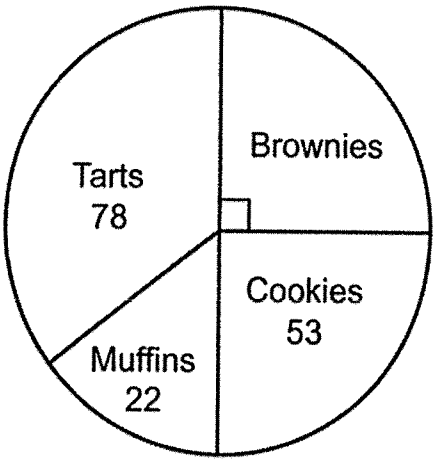
(b) By joining dots on the grid with straight lines, draw

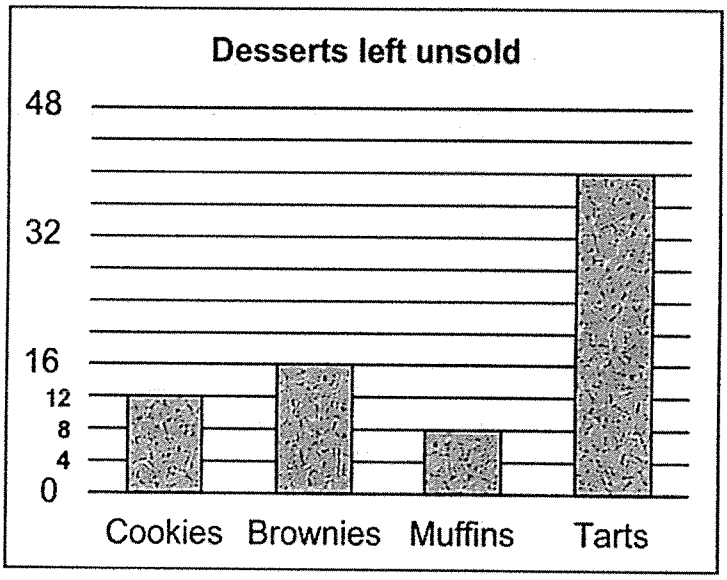
(i) trapezium JKLM such that JM is parallel to KL and JM is twice as long as KL. [1]

(ii) isosceles triangle LMN.
Triangle LMN does not overlap with Trapezium JKLM. [1]

---

7 The pie chart shows the number of different types of desserts baked by Renee on a particular day. The bar graph shows the number of desserts left unsold at the end of the day.





(a) How many brownies did Renee bake?

Ans : (a) _____ [2]

(b) Which type of dessert did Renee sell the most? How many of this type of dessert did she sell?

Ans : (b) Dessert: _____

_____ were sold. [2]

8 Ms Sharifah had some beads. $\frac{3}{5}$ of the beads were blue and the rest were red.

She used $\frac{1}{2}$ of the beads to make a necklace. $\frac{1}{5}$ of the beads used were red beads.

(a) What fraction of the red beads were used to make the necklace?

Ans : (a) _____ [1]

(b) 180 blue beads were used. How many beads did Ms Sharifah have at first?

Ans : (b) _____ [2]

9 Jacket A and Jacket B had the same usual price.
During a sale, both jackets were sold at discounted prices.

Mr Chan wanted to buy a jacket during the sale.
He could not buy Jacket B as he was short of $20, so he bought Jacket A and still had $10.50 left.

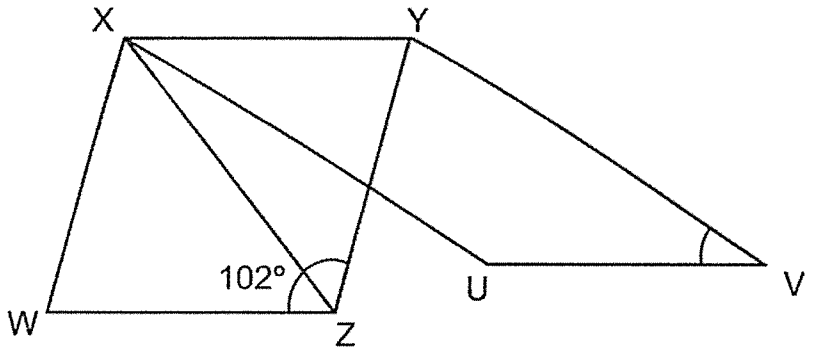
(a) What was the usual price of each jacket?

Ans : (a) $ _____ [2]

(b) How much money did Mr Chan have at first?

Ans : (b) $ _____ [2]

10 WXYZ is a rhombus and XYVU is a parallelogram. ∠WZY = 102° and ∠ZYV = 76°.



(a) Find ∠UVY.

Ans : (a) _____ ° [2]

(b) Find ∠ZXU.

Ans : (b) _____ ° [1]

(c) **Circle** the words that describe Triangle XYT correctly in the following statement :

XYT **(is / is not)** an isosceles triangle because it **(has / does not have)** 2 equal angles.

[1]

11 42 students were asked to help pack some boxes of cards.
However, 3 students did not turn up. As a result, each of the remaining students had to pack p more boxes of cards.

(a) What was the number of boxes of cards each student had to pack at first?
Express your answer in terms of p.

Ans : (a) _____ [2]

(b) Find the total number of boxes of cards that were packed when $p = 5$.

Ans : (b) _____ [1]

12 Fandi had 20 small identical boxes and 24 large identical boxes.
He used 798 marbles to fill up 12 small boxes and 9 large boxes completely.
The number of marbles he used to fill up 5 large boxes completely was the same as that for 6 small boxes.

(a) How many marbles were needed to fill up a large box completely?

Ans : (a) _____ [2]

(b) How many more marbles did Fandi need to fill up the remaining boxes completely?

Ans : (b) _____ [3]

13 Ken had some 1-dollar coins and Jun Wei had some 50-cent coins at first. After Ken used $\frac{1}{4}$ of his coins and Jun Wei used $\frac{3}{5}$ of his coins, they had the same number of coins left. Ken and Jun Wei had a total of $81 left.

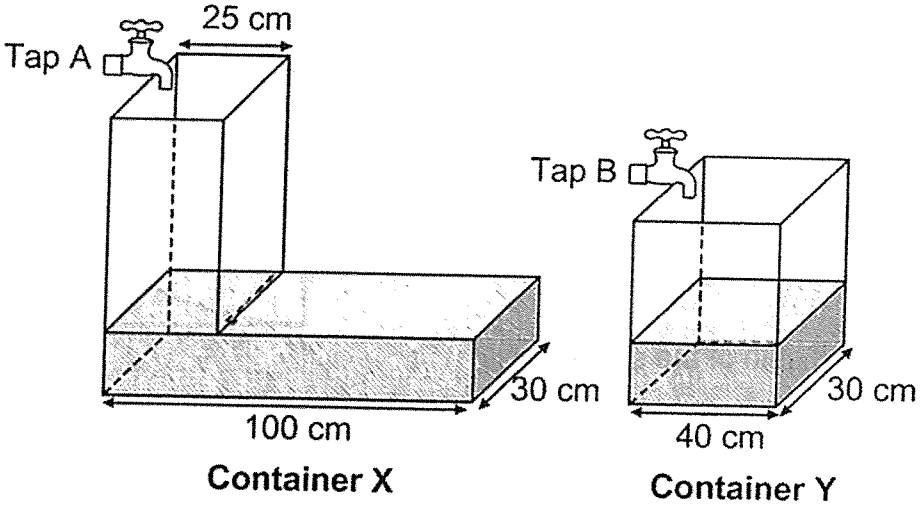
(a) How many coins did each boy have left?

Ans : (a) _____ [2]

(b) How much money did Jun Wei have at first?

Ans : (b) $_____ [2]

14 At first, Containers X and Y were filled with some water to the same height. There were 30.6 litres more water in Container X than Container Y.



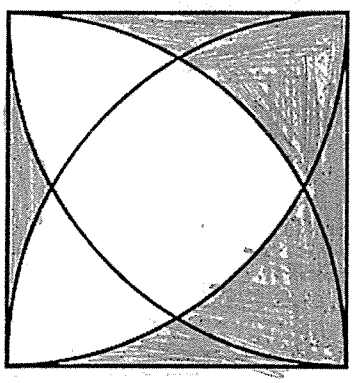
(a) What was the height of water in the two containers at first?

Ans : (a) _____ cm [2]

(b) Both taps A and B were turned on at the same time.
Water flowed into Container X at a rate of 4.35 litres per minute and into Container Y at a rate of 3.6 litres per minute.
After 2 minutes, tap B was turned off.
How long did it take for tap A to fill up Container X such that the height of the water in Container X was twice the height of the water in Container Y?

Ans: (b) _____ min [3]

15 The figure is made up of identical quarter circles and a square of area 289 cm^2.
(Take $\pi = 3.14$)



(a) Find the length of the square.

Ans : (a) _____ cm [1]

(b) Find the perimeter of the unshaded part.

Ans : (b) _____ cm [2]

(c) Find the total area of the shaded parts.

Ans : (c) _____ cm^2 [2]

End of Paper 2

YEAR : 2026
LEVEL : PRIMARY 6
SCHOOL : AI TONG SCHOOL
SUBJECT : MATHEMATICS
TERM : PRELIMINARY EXAMINATION

(BOOKLET A)

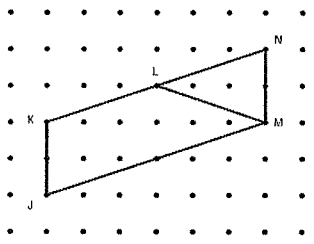
Q1	1	Q2	4	Q3	1	Q4	4	Q5	4
Q6	4	Q7	1	Q8	2	Q9	1	Q10	3
Q11	2	Q12	2	Q13	3	Q14	2	Q15	3
Q16	1	Q17	3	Q18	2				

(BOOKLET B)

Q19	(a) $125 \times 900 = 112\,500$ Ans: 112 500 (b) $30 - 12 = 18$ $36 + 18 \div 3 \times 2 = 48$ Ans: 48	Q20	(a) $5.24 = 5\frac{24}{100} = 5\frac{6}{25}$ Ans: $5\frac{6}{25}$ (b) $\frac{7}{8} = \frac{875}{1000} = 0.875$ Ans: 0.875
Q21	(a) $\frac{2}{3} + \frac{3}{7} = \frac{14}{21} + \frac{9}{21}$ $= \frac{23}{21} = 1\frac{2}{21}$ Ans: $1\frac{2}{21}$ (b) $4 \div \frac{2}{5} = 4 \times \frac{5}{2} = 10$ Ans: 10	Q22	(a) 11 50 to 12 00 = 10 min 12 00 to 12 30 = 30 min 10 + 30 = 40 min Ans: 40 min (b) $40 \div 2 \times 9 = 180$ Ans: 180 booklets
Q23	(a) A multiple of 5 ends in 5. Smallest arrangement = 3785 Ans: 3785 (b) Greatest number below 8000 = 7853 Ans: 7853	Q24	$\angle PTR = 180° - 26° = 154°$ $\angle PTS = 60°$ $\angle STR = 360° - 154° - 60° = 146°$ ST = TR $\angle TSR = (180° - 146°) \div 2$ Ans: 17°
Q25	(a) $102 + 15j - 13 + 6j$ $= 89 + 21j$ Ans: $89 + 21j$ (b) $\frac{3 \times 8}{4} + \frac{32}{8} = 6 + 4$ Ans: 10	Q26	Half of the figure = $\frac{1}{2}$ Unshaded triangle = $\frac{1}{8}$ Fraction shaded = $\frac{1}{2} - \frac{1}{8} = \frac{3}{8}$ Ans: $\frac{3}{8}$
Q27	(a) From the graph at 10 min: Ans: 80 ℓ (b) $(120 - 100) \div 5 = 4$ Ans: 4 ℓ per minute	Q28	Circumference = $2 \times \frac{22}{7} \times 7 = 44$ cm Each wheel moves $6 \times 44 = 264$ cm Initial distance AB = 14 cm $14 + 264 + 264 = 542$ Ans: 542 cm

Q29	China = 25% = 175 adults Total = 175 ÷ 25% = 700 (a) Japan = $\frac{1}{2}$ × 700 Ans: 350 adults (b) South Korea = 700 – 350 – 175 – 70 = 105 105 ÷ 700 × 100% = 15% Ans: 15%	Q30	Top shaded = $\frac{1}{3} \times \frac{1}{2} = \frac{1}{6}$ Bottom shaded = $\frac{3}{4} \times \frac{1}{2} = \frac{3}{8}$ Total shaded = $\frac{1}{6} + \frac{3}{8} = \frac{13}{24}$ Unshaded = $\frac{11}{24}$ Ans: 13 : 11

PAPER 2

Q1	1.6 kg = 1600 g 1600 ÷ 100 = 16 16 × \$2.40 = \$38.40 Ans: \$38.40	Q2	12 packs cost 12 × \$3.90 = \$46.80 \$50 – \$46.80 = \$3.20 \$3.20 ÷ \$0.60 = 5 remainder \$0.20 12 × 8 + 5 = 101 Ans: 101 markers
Q3	(a) x = 360° – 90° – 76° Ans: 194° (b) EC ⊥ CG y = 90° + 14° Ans: 104°	Q4	3 × 23 = 69 km 9 × 17 = 153 km 69 + 153 = 222 km 3 + 9 = 12 222 ÷ 12 = 18.5 Ans: 18.5 km
Q5	Length = 70 – 9 – 9 = 52 cm Breadth = 45 – 9 – 9 = 27 cm Height = 9 cm 52 × 27 × 9 = 12 636 Ans: 12 636 cm^3	Q6	(a) From the grid, ∠KLM ≈ 143° Ans: 143° (b) One correct construction is shown: 
Q7	(a) Other desserts = 78 + 22 + 53 = 153 153 is 75% of all desserts. Total = 153 ÷ 75% = 204 Brownies = 25% × 204 = 51 Ans: 51 brownies (b) Sold: cookies 53 – 12 = 41 Brownies 51 – 16 = 35 Muffins 22 – 8 = 14 Tarts 78 – 40 = 38 Ans: Cookies; 41 were sold	Q8	Red beads = $\frac{2}{5}$ of total Red beads used = $\frac{1}{5} \times \frac{1}{2} = \frac{1}{10}$ of total (a) $\frac{1}{10} \div \frac{2}{5} = \frac{1}{4}$ Ans: $\frac{1}{4}$ (b) Blue beads used = $\frac{4}{5} \times \frac{1}{2} = \frac{2}{5}$ $\frac{2}{5}$ of total = 180 Total = 180 ÷ 2 × 5 = 450 Ans: 450 beads

Q9	Let usual price be P. Money Mr Chan had = P – $57 – $20 = P – $77 Also = 65%P + $10.50 35%P = $87.50 (a) P = $250 (b) $250 – $77 = $173 Ans: (a) $250 (b) $173	Q10	Rhombus: ∠XYZ = 180° – 102° = 78° (a) ∠XYV = 78° + 76° = 154° ∠UVY = 180° – 154° = 26° (b) ∠YXZ = 102° ÷ 2 = 51° ∠YXU = 26° ∠ZXU = 51° – 26° = 25° (c) XYT is not isosceles because it does not have 2 equal angles.
Q11	Let the original number per student be x. 39(x + p) = 42x 39p = 3x (a) x = 13p (b) When p = 5, x = 65 42 × 65 = 2730 Ans: 2730 boxes	Q12	Let 1 unit = common capacity unit. Large : small = 6 : 5 12 × 5 + 9 × 6 = 114 units 798 ÷ 114 = 7 (a) Large box = 6 × 7 = 42 Ans: 42 marbles (b) Small boxes left = 20 – 12 = 8 Large boxes left = 24 – 9 = 15 8 × 35 + 15 × 42 = 910 Ans: 910 marbles
Q13	Let each boy have n coins left. $1n + $0.50n = $81 $1.50n = $81 (a) n = 54 Ans: 54 coins each (b) $\frac{2}{5}$ of Jun Wei's original coins = 54 Original coins = 54 × 5 ÷ 2 = 135 135 × $0.50 = $67.50 Ans: $67.50	Q14	(a) Difference in base areas = (100 × 30) – (40 × 30) = 1800 cm^2 30.6 ℓ = 30 600 cm^3 Height = 30 600 ÷ 1800 = 17 cm (b) Y after 2 min = 20.4 ℓ + 7.2 ℓ = 27.6 ℓ Y height = 27 600 ÷ (40 × 30) = 23 cm Target X height = 2 × 23 = 46 cm Rise in tower = 46 – 17 = 29 cm Volume added = 25 × 30 × 29 = 21 750 cm^3 21 750 cm^3 = 21.75 ℓ 21.75 ÷ 4.35 = 5 Ans: (a) 17 cm (b) 5 min

Q15	(a) Side = $\sqrt{289} = 17$ Ans: 17 cm (b) Two quarter-circle arcs $= 2 \times \frac{1}{4} \times 2 \times 3.14 \times 17$ Ans: 53.38 cm (c) One quarter-circle area $= \frac{1}{4} \times 3.14 \times 17 \times 17 = 226.865\ cm^2$ Shaded area = 2 × (289 – 226.865) Ans: 124.27 cm^2

END