TRINIDAD AND TOBAGO

SECONDARY ENTRANCE ASSESSMENT

SPECIMEN BOOKLET

FILL IN ALL INFORMATION REQUESTED CLEARLY AND LEGIBLY.

TEST CODE

SUBJECT _____MATHEMATICS_____

Please place your label here.

READ THE FOLLOWING DIRECTIONS CAREFULLY

1. **This test is divided into THREE sections.**
2. **Make sure you read the instructions before you start to work on any section.**
3. **Write all your answers in this test booklet.**
4. **DO NOT OPEN THIS BOOKLET UNTIL YOU ARE TOLD TO DO SO.**

WRITE THE NAME OF YOUR SCHOOL BELOW:

_____

_____

WRITE YOUR FULL NAME BELOW:

DATE OF BIRTH		
Day	*Month*	*Year*

SEX < MALE ☐

FEMALE ☐

DO NOT WRITE IN THIS SPACE

FOLDER NUMBER

Instructions for the Mathematics Test

You are **NOT** allowed to use **calculators**.

This test has **THREE** sections with a total of 40 questions.

SECTION I has 20 questions (Nos. 1-20).

SECTION II has 16 questions (Nos. 21-36).

SECTION III has 4 questions (Nos. 37-40).

You have 75 minutes for this test.

Answer ALL questions.

Read EACH question CAREFULLY before answering it.

Show ALL working.

Marks will be given for correct steps taken.

Work carefully but DO NOT spend too much time on any one question.

DO NOT BEGIN UNTIL YOU ARE TOLD TO DO SO.

Section I

1. Write the numeral to represent three hundred and five thousand and forty-eight.

   Answer: _____

2. State the place value of the digit 3 in the numeral 653 581.

   Answer: _____

3. Round 6 498 to the nearest thousand.

   Answer: _____

4. The scores in a video game are given for four players.

   Players' Scores in a Video Game

Player	Score
Dev	46 978
Liz	49 687
Suri	48 679
Vidal	49 876

   Who scored the highest?

   Answer: _____

5. The items below are on display at Sara's Electronics Store. What fraction of the items are phones?
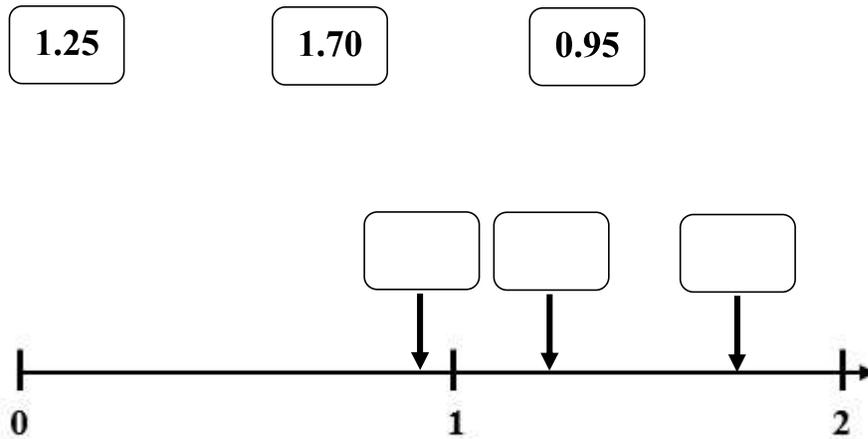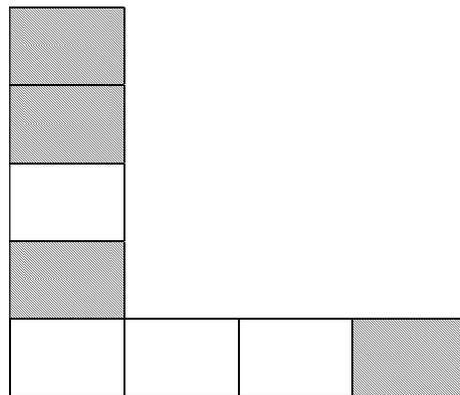

Answer: _____

6. One-fifth of Gail's allowance is $30. Calculate Gail's allowance.

Answer: **$** _____

---

7. Place the numbers below in the correct positions on the number line.

1.25   1.70   0.95
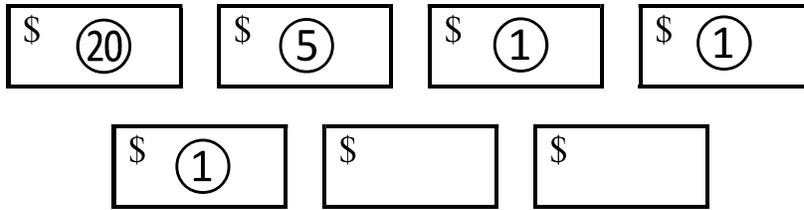
0   1   2

8. Express the shaded area as a decimal which represents part of the whole.

Answer: _____

9. Natalie has 7 bills in her pocket with a total value of $48.

$ ⑳ $ ⑤ $ ① $ ①

$ ① $ $

Write the missing values in the 2 bills above.

10. Ms. Tang bought 4 sets of doughnuts. She created a package of treats using $\frac{2}{3}$ of a set. How many packages did she create using all 4 sets?
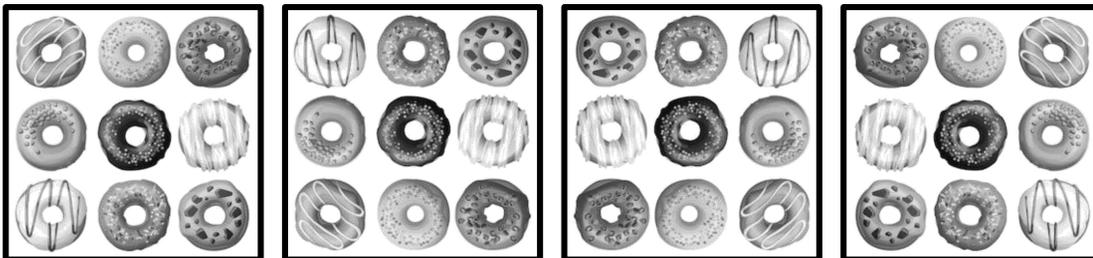
Answer: _____ **packages**

11. Betty's weight is 46 000 grams. What is her weight in kilograms?

Answer: _____ **kilograms**

12. Ethan started an online Mathematics class at the time shown on the clock.
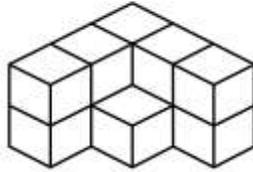The class lasted 45 minutes.

What time did the Mathematics class end?

Answer: _____

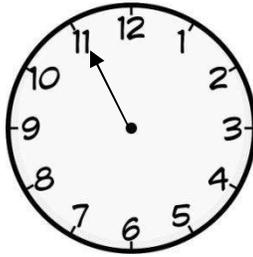**13.** Convert $2\frac{1}{5}$ hours to minutes.

Answer: _____ **minutes**

14. The model below is formed by stacking 1 cm cubes. Calculate the volume of the model.
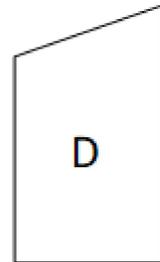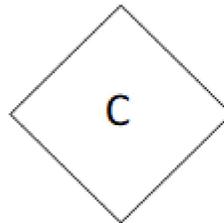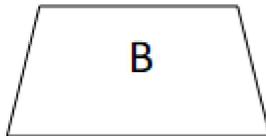

Answer: _____ **cm³**

15. The second hand shown on the clock turned two right angles.
What number did the second hand point to after the turn?

Answer: _____

16. Which quadrilateral below has **no** right angles?
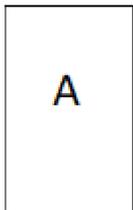
Answer: _____

17. Name a solid that has five faces, one of which is a square.

Answer: _____

18. The table below shows the number of books read by five students in a reading competition. Complete the table to show how many books Varsha read if 73 books were read altogether.

STANDARD FIVE READ-A-THON

Student	Number of books read
Jesse	15
Akeel	17
Varsha	
Mala	13
Amy	12

19. What is the mode for the following set of test scores?

35	46	41	39	37
47	43	42	38	41
39	41	43	43	39
43	36	38	41	45

Answer: _____

20. The bar graph shows the school items used by students.

School Items used by Students
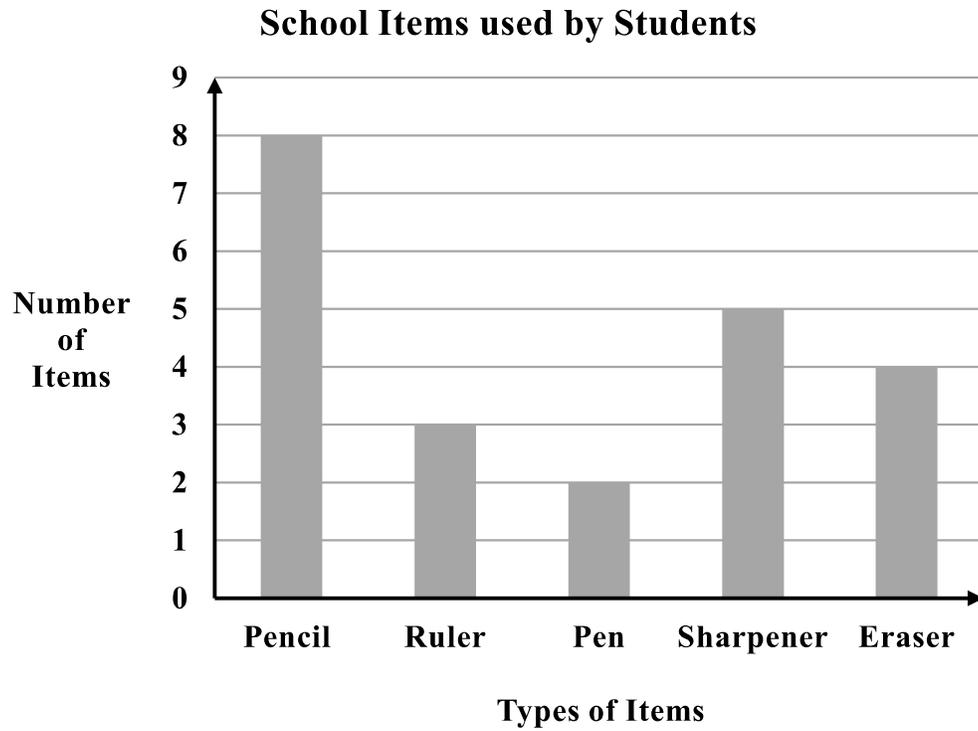
How many more pencils than pens are used?

Answer: _____ **pencils**

Section II

21. Alan puts three numbers in ascending order. A common fraction belonging to the eighths family is missing. Write the missing fraction.

(2 marks)

0.65 ☐ 80%

22. Mr. Sam uses 12 cups of flour to bake one batch of bread rolls. Each roll can be made from $\frac{1}{4}$ cup of flour. How many bread rolls can be made in five batches?

(2 marks)

Answer: _____ **bread rolls**

23. When 4 times a number is added to 25, the answer is the difference between 50 and 675. What is the number?

(2 marks)

Answer: _____

24. Which two square numbers sum to 100?

(2 marks)

Answer: _____

25. Shane's Computer Store had a sale on mobile devices. What was the total discount given if a customer purchased both items shown below?

(3 marks)

Sale on Laptops
33⅓ %
Discount

Original Price $ 3 675.00

Sale on Tablets
20 %
Discount

Original Price $ 1 575.00

Answer: **$** _____

26. On Monday 400 students were present at Mountain View Primary school. By lunchtime, 40% of the students fell ill and returned home. The number of girls who remained was four times the number of boys. How many boys remained after lunch?

(3 marks)

Answer: _____ **boys**

27. Andrew was asked to solve the problem below.

$$
\begin{array}{r}
5\ 0\ 2\ 1 \\
-\ 3\ 9\ 8\ 6 \\
\hline
 \\
\end{array}
$$

He estimated a difference of 2 000 in working out the problem.
Explain why Andrew's estimate may not be reasonable and clearly show your estimate.

(3 marks)

Answer:

_____

_____

_____

_____

_____

28. Marlon sells a set of 3 mangoes for $5.00. He wants to buy a television which costs $3 725.00 but only has $775.00 in his savings. How many mangoes must he sell to earn the rest of the money he needs?

(3 marks)

Answer: _____ **mangoes**

29. A football game started at 4:10 p.m. and ended at 6:00 p.m. There was a 15 minute break after the first half of the game. How much time was spent on actual play?

(2 marks)

Answer: _____ **hours** _____ **minutes**

30. Josh parked 147 centimetres away from the fire hydrant. How much further should Josh move if he must park 2 metres away from the fire hydrant?
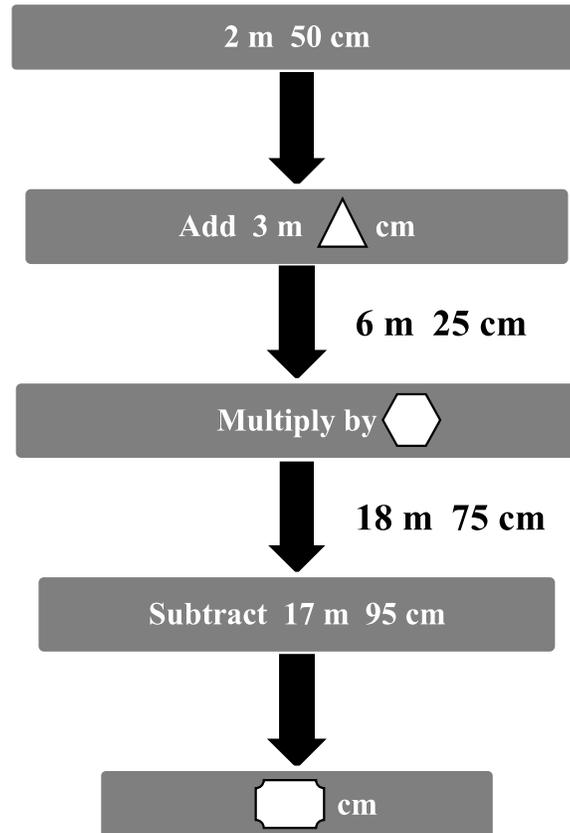
(2 marks)

Answer: _____ **metres**

31. The measure 2 m 50 cm is put into the number machine below.

Three numbers △, ⬡ and ⬭ are missing.

Write the missing numbers.

```
        ┌─────────────────────────┐
        │        2 m  50 cm        │
        └─────────────────────────┘
                    ↓
        ┌─────────────────────────┐
        │      Add  3 m  △  cm     │
        └─────────────────────────┘
                    ↓
                6 m  25 cm
        ┌─────────────────────────┐
        │    Multiply by  ⬡        │
        └─────────────────────────┘
                    ↓
               18 m  75 cm
        ┌─────────────────────────┐
        │   Subtract  17 m  95 cm  │
        └─────────────────────────┘
                    ↓
        ┌─────────────────────────┐
        │        ⬭   cm            │
        └─────────────────────────┘
```

(3 marks)
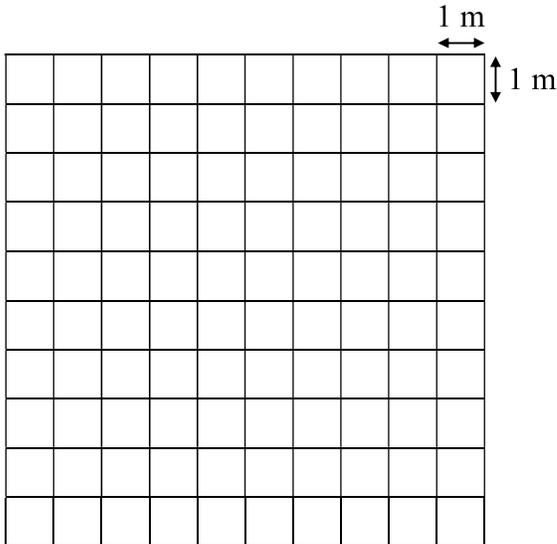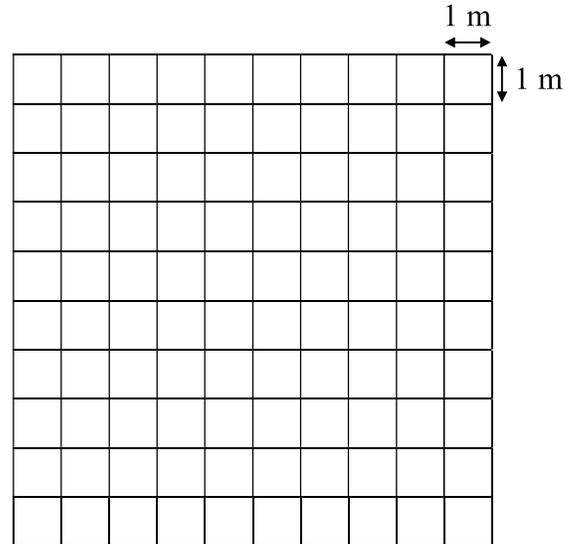
Answer: △   = _____

Answer: ⬡   = _____

Answer: ⬭   = _____

32. Kareem has 48 m of wire to construct fences around two square plots of land. The area of the first square plot is four times the area of the second square plot.
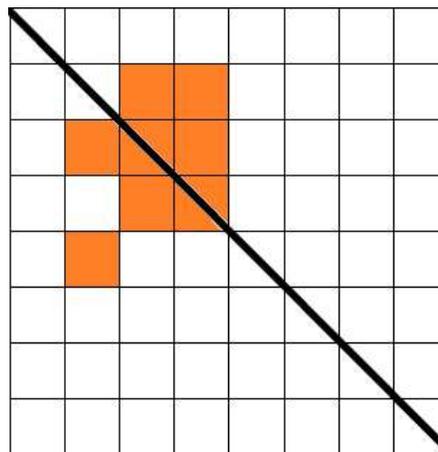
1ˢᵗ Plot

2ⁿᵈ Plot

Shade the areas on the grids above to represent Kareem's two square plots.
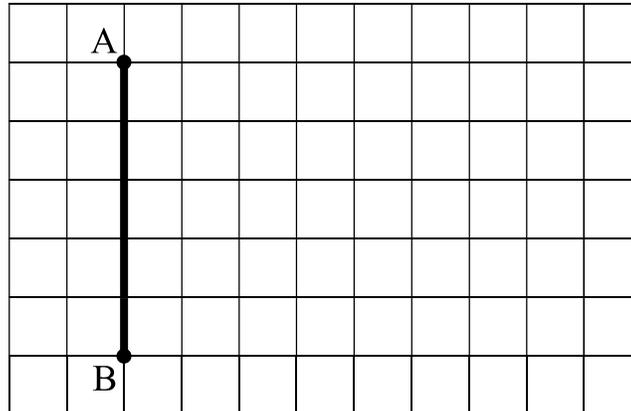
(3 marks)

33. Complete the symmetrical shape on the grid below using the line of symmetry shown.
.

(2 marks)

34. Triangle ABC is a right angled isosceles triangle whose angle B is equal to its angle C. Complete the drawing on the grid below to represent triangle ABC.

(2 marks)

35. The pictograph uses a scale factor to represent the number of cans collected by 5 teams. Altogether, the teams collected 120 cans.

Number of cans collected

How many more cans did **Team 1** collect than **Team 4**?

(2 marks)

Answer: _____ **cans**

36. J's Auto sold 5 different types of vehicles. The table below shows the number of vehicles sold by J's Auto during May.

Vehicles Sold in May

Type of Vehicle	Number Sold
Sedan	30
SUV	20
Truck	10
Wagon	25
Sports Car	5

The owner of J's Auto wanted the mean number of vehicles sold in May to be greater. How may Sports Cars should he have sold in May to increase the mean number of vehicles sold to 20?

(3 marks)

Answer: _____ **Sports Cars**

Section III

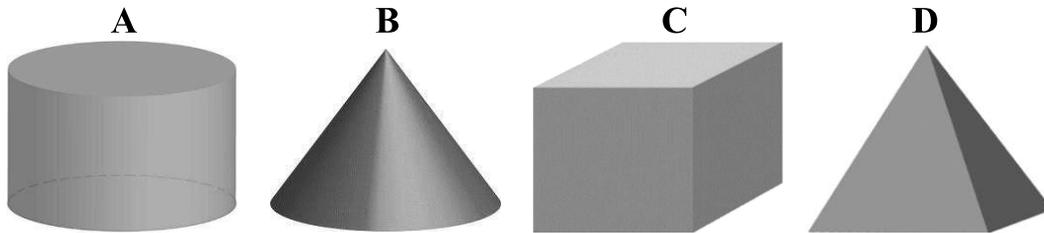**37.** The sum of every five numbers in the number pattern below forms a new number pattern.

$$3, \ 9, \ 15, \ 21, \ 27, \ \ldots$$

Write the first three numbers in the new pattern and describe the pattern.

(4 marks)

Answer:

_____

_____

_____

_____

_____

_____

38. The average mass of the four solids A, B, C, and D shown below is 1.5 kilograms.
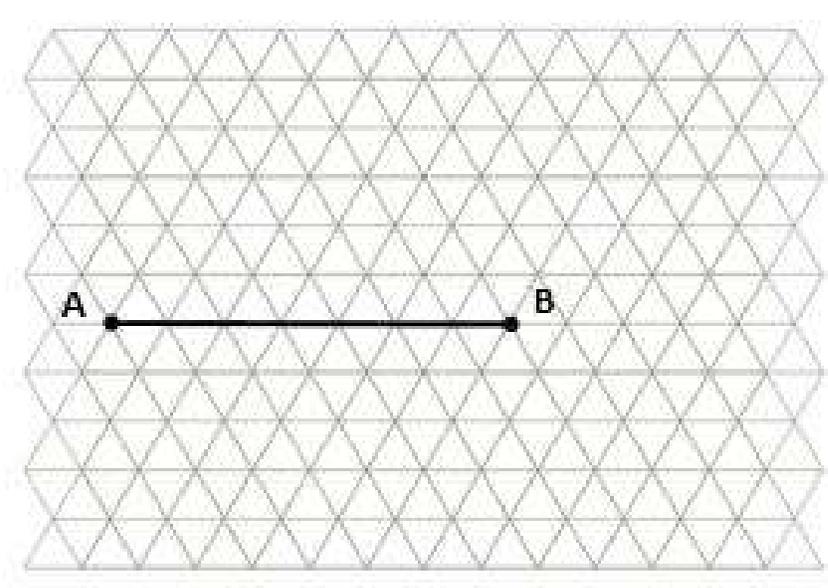
A	B	C	D

The average mass of solids A and B is 1.6 kilograms. The mass of solid C is three times the mass of solid D. What is the mass of solid C and solid D, in terms of grams?

(4 marks)

Answer:

_____

_____

39. On the grid paper below draw the quadrilateral with one pair of parallel sides, one line of symmetry and the straight line that joins the points A and B as its base.

Complete the drawing using the straight line that joins the points A and B as a line of symmetry and describe the completed plane shape in terms of its angles, sides and lines of symmetry.

(4 marks)

Answer:

_____

_____

_____

_____

_____

_____

40. Five students ran 60 m sprint races at Sea View Primary School. The times students took to complete the sprint races are shown in the table below.

Times taken to complete 60 metres Sprint Races

Student	Time in Seconds					
	1st Sprint	2nd Sprint	3rd Sprint	4th Sprint	5th Sprint	Average
Troy	10.4	10.3	10.2	10.1	10.0	**10.2**
Andy	15.0	12.9	12.5	10.5	9.1	**12.0**
Jessie	9.4	9.6	9.8	10.0	10.2	**9.8**
Stacy	9.6	11.2	9.4	11.0	9.3	**10.1**
Chris	9.5	10.1	10.3	10.5	10.6	**10.2**

Based on the information given in the table above, **state three reasons** why an average is not a good measure to select a student to represent the school in a 60 m sprint race **and select** a student to represent the school giving your reason.

(4 marks)

Answer:

_____

_____

_____

_____

_____

_____

END OF TEST

IF YOU FINISH BEFORE TIME IS CALLED, YOU MAY CHECK YOUR WORK BEFORE HANDING IN YOUR PAPER