



SURE KEY EXAMINATIONS BOARD
PRIMARY SEVEN PLE PREPARATION EXAMINATION SET ONE
2022
MATHEMATICS

Time Allowed: 2 hours 30 minutes

Admission No.						Personal No.		

Candidate's Name:

Candidate's Signature:

School Name:

District Name:.....

Read the following instructions carefully:

1. Do not write your **school** or **district name** anywhere on this paper.
2. This paper has two sections: **A** and **B**.
Section **A** has **20** questions and Section **B** has **12** questions. The paper has **15 printed pages** altogether
3. Answer **all** questions. **All** the working for both sections **A** and **B** must be shown in the spaces provided.
4. **All** working must be done using a **blue** or **black** ball point pen or ink. Any work done in pencil other than graphs and diagrams will **not** be marked.
5. **No calculators** are allowed in the examination room.
6. Unnecessary **changes** in your work and handwriting that cannot easily be read may lead to loss of marks.
7. Do not fill anything in the table indicated:
"For Examiners' Use only" and boxes

FOR EXAMINERS' USE ONLY		
Qn.No.	MARKS	EXR'S NO.
1 - 5		
6 - 10		
11 - 15		
16 - 20		
21 - 22		
23 - 24		
25 - 26		
27 - 28		
29 - 30		
31 - 32		
TOTAL		

SECTION A: 40 MARKS

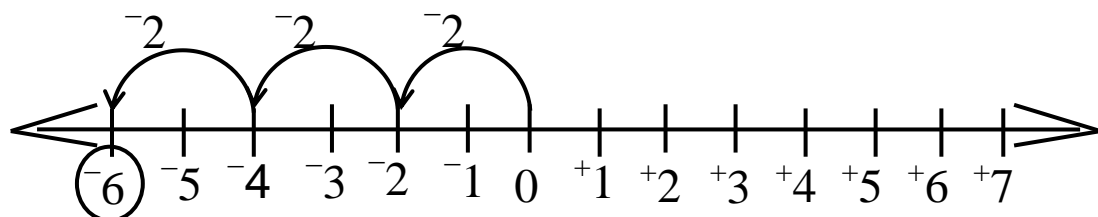
Answer **all** questions in this Section
Questions 1 to **20** carry two marks each

1. Add: 278 to 2022.

2. Write MDLXXXV in Hindu Arabic numerals.

3. Simplify: $1 - \frac{5}{9}$

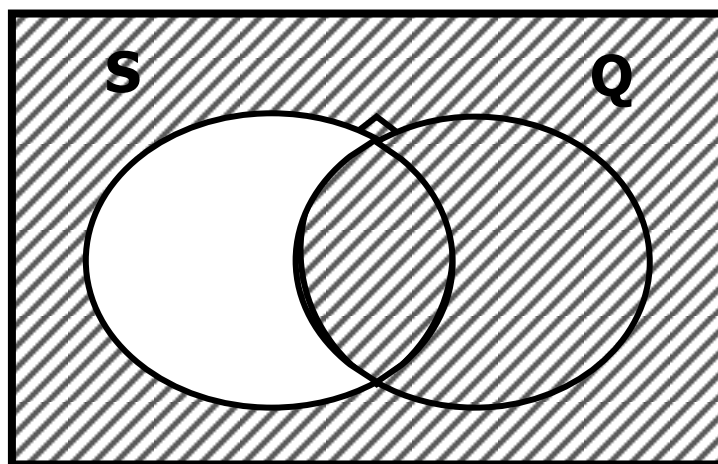
4. Write the multiplication statement represented on the numberline below.



5. In the number 14205, what is the difference between the values of digits 4 and 2?



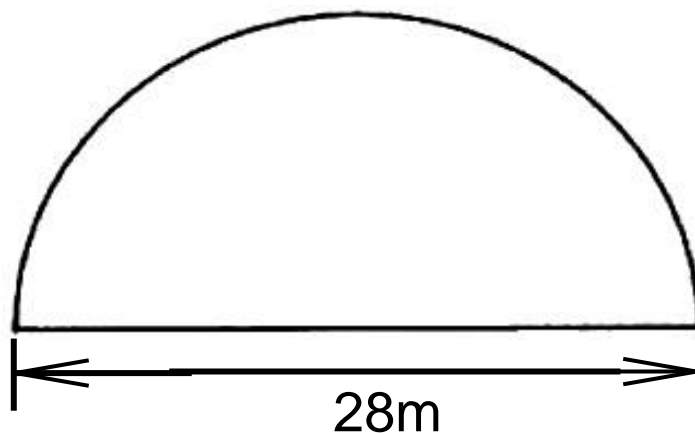
6. Describe the shaded region in the Venn diagram below



7. What is the square root of the number obtained when 196 is multiplied by 4?
8. What is the mean of 7kg, 5.6kg and 4.2kg?

9. Safi packed 15 cartons each containing 20 bottles of juice. The amount of juice in each bottle was 500ml. what was the total amount of juice, in litres, packed by Safi?

10. A plot of land is in a shape of a semi-circle of diameter 28 metres as shown below.



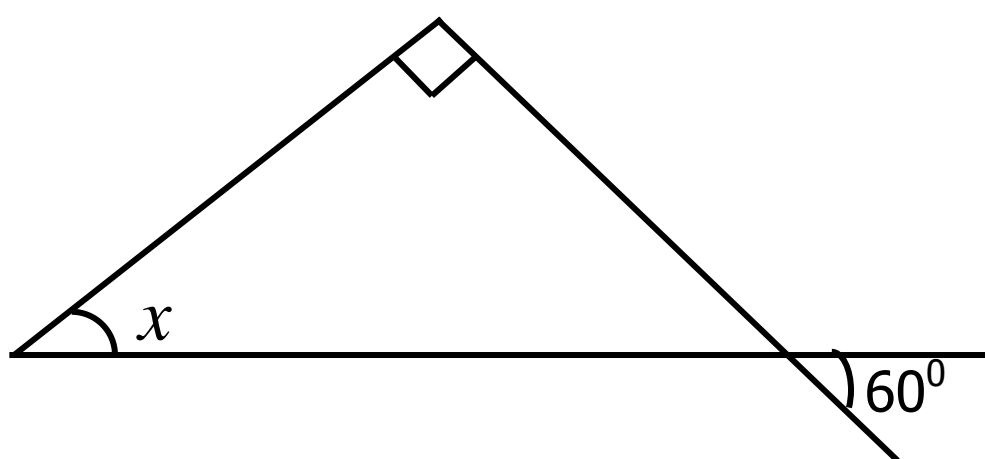
The plot was fenced with erecting posts 4 metres apart. How many posts were used? (Use $\pi = \frac{22}{7}$)



11. Express 20m/s in km/hr.

12. Given that, $a = b = 3$ and $c = 2$. Find the value of $2b(a+c) + ac$.

13. In the figure below, calculate the value of x



14. 2 tailors can make 8 shirts in 4 days. How many more days are needed by the two tailors to make 128 shirts?

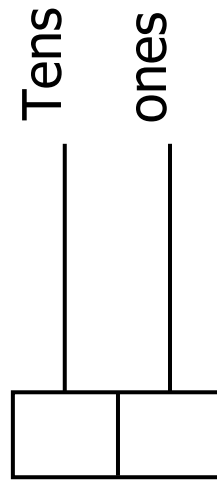
15. Find the next number in the sequence below;

9, 18, 27, 36, 45,

16. A trader borrowed sh.150,000 from a micro finance group that offers an interest rate of 5% per month for 4 months. How much did he pay back at the end of the period?

17. Today is Monday, what day of the week will it be after 11 days

18. Show 120_{three} on the abacus below.



19. A baby woke up at 5:30a.m.after sleeping for 7 hours and 45 minutes.
At what time did the baby sleep?
20. The length of a wire is 2cm. If it is increased in the ratio of 4:3.
What is the new length of the wire?

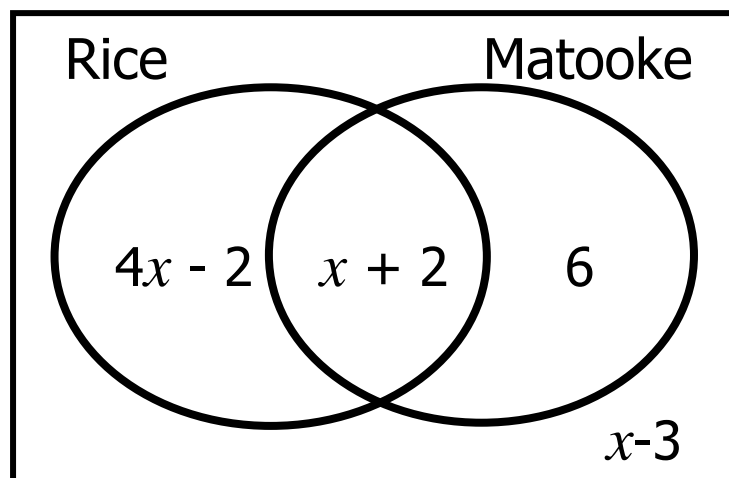


SECTION B: 60 MARKS

Answer **all** questions in this section

Marks for each question are indicated in brackets

21. The Venn diagram below shows the number of pupils who ate different meals at a certain party.



- (a) If 35 pupils dislike Matooke, find the value of x . (02 Marks)
- (b) Find the probability that a pupil picked at random likes only one type of meal. (02 Marks)

22. Juma sat for week 4 tests and scored as follows,

English 9 out of 10.

Science 64 out of 80.

Mathematics 35 out of 50.

SST 25 out of 30.

(a) Change all the marks for each subject to a percentage.

(04 Marks)

(b) Work out the range of the percentage shared.

(01 Mark)



23. Ben is 11 years older than Kyagulanyi. In 4 years' time, Ben will be twice as old as Kyagulanyi.

(a). How old is Kyagulanyi?

(03 Marks)

(b). Find the difference in their age in 4 years' time.

(02 Marks)

24. A businessman has 200bags of maize flour each weighing 50,000gramms.

(a) Find the total weight of the bags in Kilograms. (02 Marks)

(b) If a pick-up carries 2 tonnes per trip, workout the number of bags the pick-up will carry in one trip. (03 Marks)

(c) Find the number of trips the pick-up will make to transport the whole flour from the milling machine to his shop. (01 Mark)



25. (a) Write 402_{five} in words (01 Mark)

(b) Find the product of 101_{two} and 11_{two}

(02 Marks)

26. After spending $\frac{1}{5}$ of her allowances on fees, Julian remained with sh.60,000.

(a) How much does Julian earn as allowances altogether?

(03 Marks)

(b) What is $\frac{1}{2}$ of her allowances?

(01 Mark)



27. (a) Express 0.0259 in standard form.

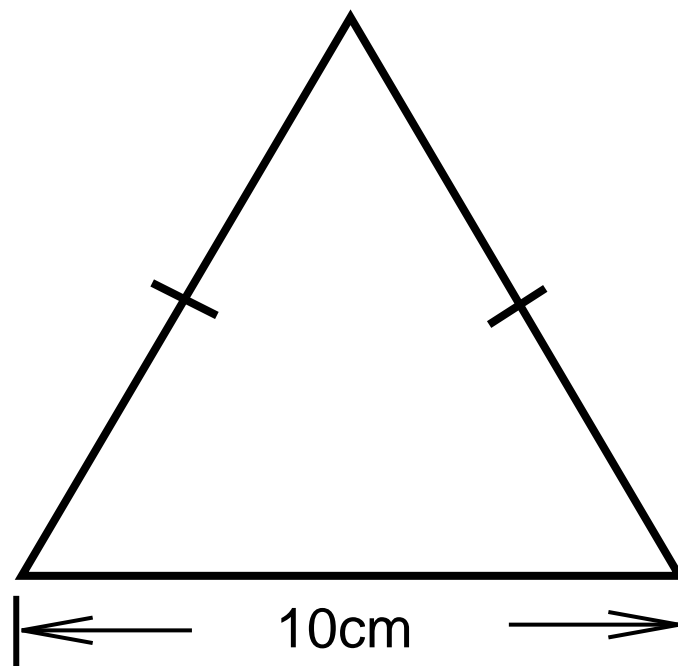
(02 Marks)

(b) What number has been expanded to give, (02 Marks)

$$(9 \times 10^2) + (8 \times 10^0) + (2 \times 10^{-1}) + (3 \times 10^{-2})?$$

(c) Round off 26.95 to the nearest whole number. (02 Marks)

28. The perimeter of an isosceles triangle below is 36cm. If its height is half the 13th even number.



(a) Find the value of each of its missing sides (04 Marks)

(b) Calculate its area.

(02 Marks)



29. Using a ruler and a pair of compasses only,

- (a) Construct triangle ABC where $AB = 7\text{cm}$, angle $BAC = 90^\circ$
and angle $CBA = 45^\circ$. (04 Marks)

(b) Measure the length CB. _____ cm

(01 mark)

30. In a football league, a win (W) earns 3 points, a draw (D) only 1 point and a loss (L) 0 point, All teams played equal games (P). The results for four football clubs in the Champions League are given in the table below.

Team	P	W	D	L	Pts
Man. City	6	.....	0	2	12
PSG	6	3	.....	1	.....
Arsenal	6	2	1	3	.....
Man.United	6	.....	.....	4	4

If a total of 34 points was accumulated by all the four teams at the end of the League, complete the table above. (06 Marks)



31. Jane bought the following items from the market.

3kg of sugar at sh.3500@kg

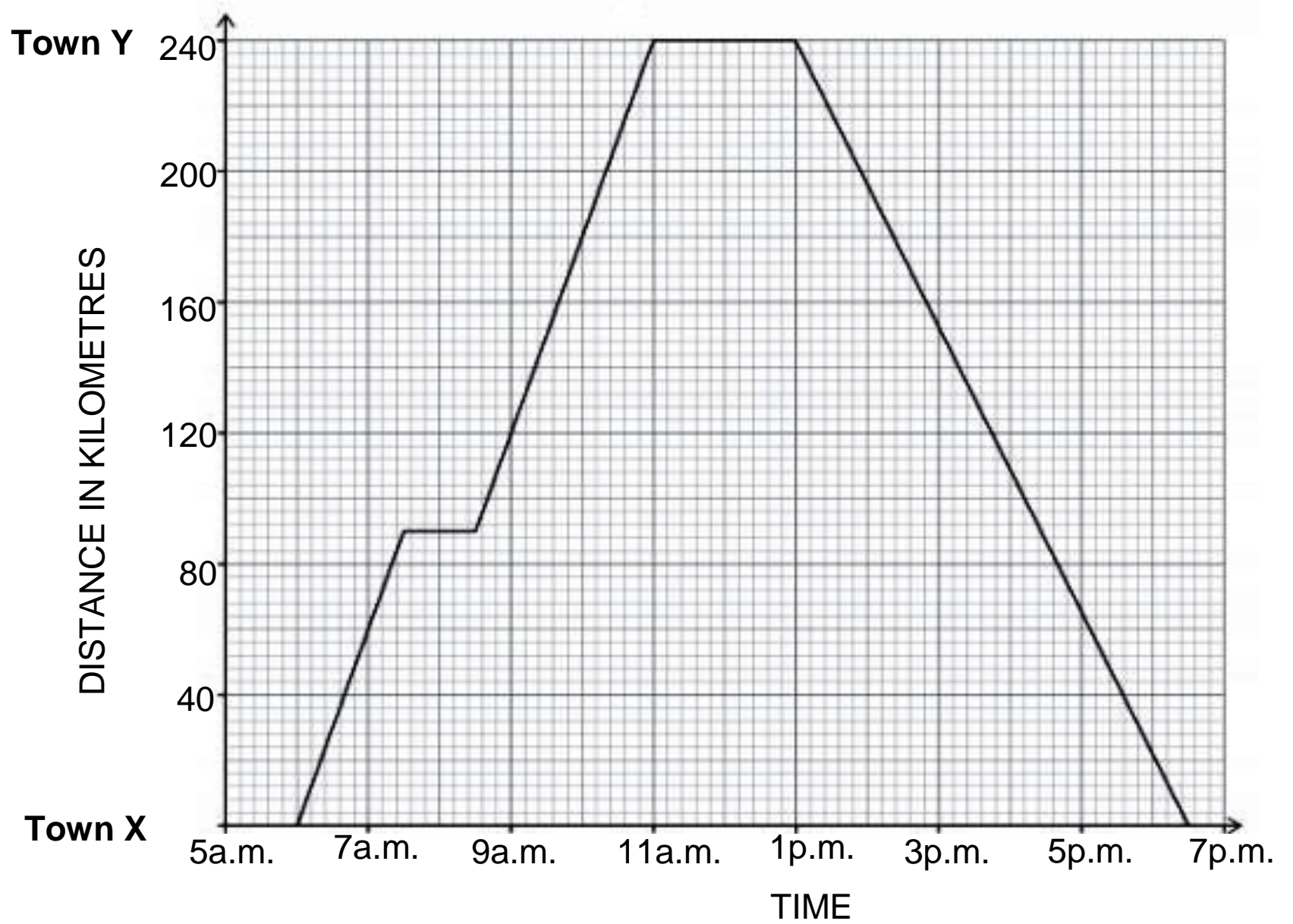
1½kg of rice at sh. 3800 per kg

1½ litres of paraffin at sh.2400 per litre.

8 oranges at sh.250 per orange.

If Jane remained with sh.3,200, find the total amount of money she had at first. (05 Marks)

32. The graph below shows a journey by a bus from Town X to Town Y and back.



What was the average speed of the bus for the whole journey?
(05 Marks)

