



# RAPHA EXAMINATIONS BOARD

e-mail: [raphaexaminationsboard@gmail.com](mailto:raphaexaminationsboard@gmail.com)

contacts: 0778710993/0740540111

**PRIMARY SEVEN EXAMINATIONS 2024 (SET 12)**

## MATHEMATICS

**Time allowed: 2 hours 30 minutes**

**INDEX  
NO.**

--	--	--	--	--	--	--	--	--

CANDIDATE'S NAME: .....

CANDIDATE'S SIGNATURE: .....DATE.....

SCHOOL'S EMIS NO: .....

DISTRICT NAME: .....

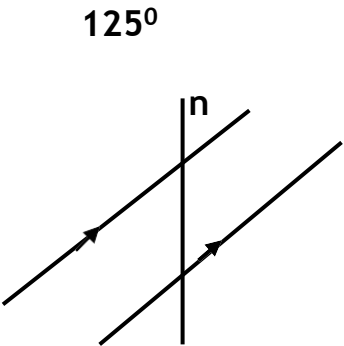
### READ THE FOLLOWING INSTRUCTIONS CAREFULLY:

1. This paper has two sections **A** and **B**
2. All the working in both sections **A** and **B** should be shown in the spaces provided
3. All working must be done using a blue or black ball point pen or fountain pen. Diagrams **MUST** be drawn in pencil
4. Unnecessary changes of work may lead to loss of marks
5. Any handwriting that cannot be easily read may lead to loss of marks
6. Do not fill in anything in area indicated for *examiners use only* and those inside the paper

#### For examiner's use only

SECTION	MARKS
SECTION A	
SECTION B	
TOTAL	

**SECTION A (40 Marks)**

1	Divide <b>36</b> by 2. (02 marks)	2	Given that (02 marks) $H = \{2, 3, 5, 7, 8, 9, 10, 11, 12\}$ and $G = \{2, 3, 5, 7, 11\}$ . Find $n(H-G)$
3	Write in figures <i>two hundred thirty thousand four hundred eight</i> . (02 marks)	4	Achudi is <b>XXIV</b> years old. Express Achudi's age in Hindu Arabic numerals. (02 marks)
5	Find the size of angle marked with letter <i>n</i> in the diagram below. (02 marks)  	6	Find the <b>Greatest Common Factor</b> of <b>18</b> and <b>30</b> . (02 marks)

7	Solve for w: $3 - w = 7$ (02 marks)	8	Simplify: $\frac{8}{9} - \frac{2}{3}$ (02 marks)
9	A worker's salary of sh <b>150,000</b> was increased by <b>20%</b> this year. Find the worker's new salary. (02 marks)	10	Write <b>249.7</b> in expanded form using powers of ten. (02 marks)
11	<b>Seven basins</b> cost <b>sh 28000</b> . Find the number of such basins a trader can buy with <b>sh 52000</b> . (02 marks)	12	Round off <b>69.83</b> to the nearest whole number. (02 marks)
13	Workout: $3 - 5$ _____ ( <b>finite 7</b> ) (02 marks)	14	Ian finished his weekend homework on Sunday at <b>4:05pm</b> . Express this time in <b>24</b> hour-clock. (02 marks)
15	In a certain village, the ratio of males to female is <b>3:5</b> respectively. Find the number of males if there	16	What is the difference between the value of <b>7</b> in the number <b>6704</b> and the value of <b>5</b> in the number <b>163.56</b> ?

	are <b>70</b> females. (02 marks)		(02 marks)
17	In a certain factory, there are <b>135</b> workers altogether. If there are 60 female workers, find the probability of picking a male worker. (02 marks)	18	Workout using distributive property. $(\frac{1}{4} \times 64) - (\frac{1}{4} \times 28)$ . (02 marks) P.T.O
19	Kiprop covered a journey at a speed of <b>18 km/hr</b> in <b>45</b> minutes. How long was the journey? (02 marks)		
20	Using a ruler, a sharp pencil and a protractor, draw an angle of <b>45°</b> . (02 marks)		

**Section B (60 Marks)**

21 A pupil obtained the following marks from the end of term one exams;  
**48%    55%    60%    37%    52%    60%.**

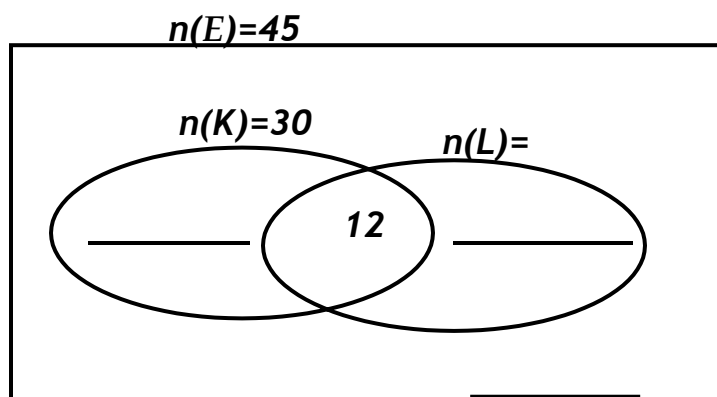
(a) Find the median mark **(02 marks)**

(b) Workout the mean mark. **(03 marks)**

(c) Find the difference between the highest and the lowest marks. **(01 mark)**

22 In a group of **45** pupils, **30** speak **Kiswahili (K)**, **x-12**, speak **Luganda (L)** only, **12** speak both languages while **2** speak other languages.

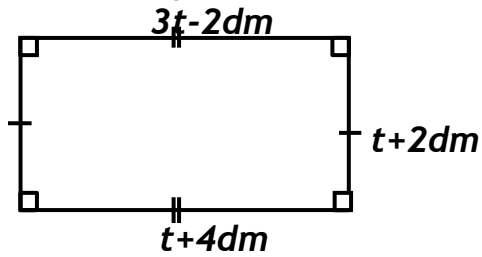
(a) Complete the Venn diagram below. **(03 marks)**



(b) How many pupils speak Luganda? **(02 marks)**

23	<p>(a) Workout: <math>\frac{4.2+0.6}{0.4 \times 1.2}</math></p> <p>(b) Change <math>\frac{3}{5}</math> to percentage.</p>	<p><b>(03 marks)</b></p> <p>PTO</p> <p><b>(02 marks)</b></p>
24	<p>With the help of a <u>ruler</u>, a <u>sharp</u> pencil and a pair of compasses only, construct a triangle RST where RS =7cm, <math>ST=5.2cm</math> and angle <math>RST = 90^\circ</math>.</p> <p>Measure angle SRT.</p>	<p><b>(04 marks)</b></p> <p><b>(01 mark)</b></p>

- 25 Study the rectangle below and use it to answer the questions that follow.



(a) Find the value of  $t$ . (03 marks)

(b) Calculate the area of rectangle. (02 marks)

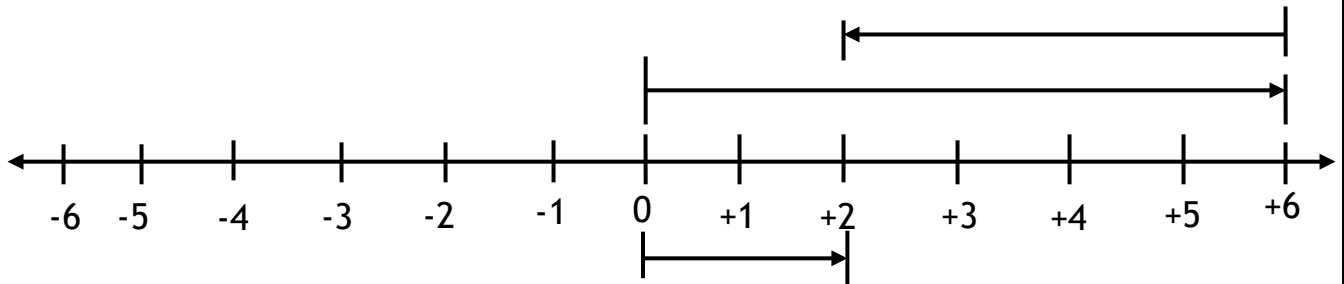
- 26 Below is a shopping table for Nakandi. Study it carefully and answer the questions that follow.

(a) Complete the table correctly. (04 marks)

<i>Item</i>	<i>Quantity</i>	<i>Unit cost</i>	<i>Amount</i>
Sandals	2pairs	5000/= a pair	sh _____
Sugar	$1\frac{1}{2}$ kg	sh _____ per kg	sh 6000
Cooking oil	500g	sh 6000 a litre	sh _____
<b>Total</b>			sh _____

(b) If Nakandi was allowed a discount of **sh 1900**, how much money did she pay them? (01 mark)

- 27 Study the number line below and write down the mathematical statement shown. (02 marks)



- (b) A clock loses 2 seconds every after an hour. How many minutes does it lose after five days? (03 marks)

- 28 A parent divided **sh 135000** among her four children, **Dada**, **Dudu**, **Dwong** and **Digi** in the ratio **1:2:3:4** respectively. How much share did each get? (05 marks)

- 29 (a) Solve:  $42_t = 211_{three}$ . (03 marks)



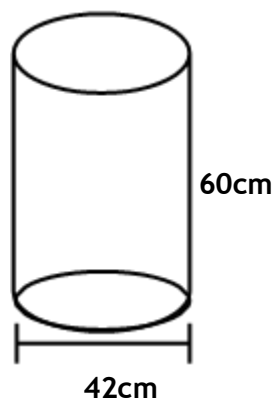
(b) Express  $33_{\text{five}}$  in *binary* system.

(02 marks)

- 30 (a) A drum had **18** litres of water. Water was then poured into small tins of **300millilitres** each. Find the number of this tins got from the drum. (03 marks)

(b) Calculate the volume of the cylinder below ( $\pi = \frac{22}{7}$ ).

(02 marks)



- 31 A bus left Kampala at a speed of **80km/hr** and reached Masaka after **90 minutes**. Find the distance between Kampala and Masaka. (02 marks)



(b) Express **72km/hr** in **m/sec**.

**(02 marks)**

32

(a) Simplify:  **$2(2f-4) - (f-3)$**

**(02 marks)**

(b) A table costs **sh 38,000** more than a chair. The total cost of both the chair and the table is **sh 108000**. Find the cost of the chair. **(03 marks)**