HILLSIDE PRIMARY SCHOOL EXAMINATIONS BOARD

PRIMARY SEVEN HOLIDAY PACKAGE FOR TERM ONE

2020

SET TWO

MATHEMATICS

Time Allowed: 2 Hours 30 Minutes

	EMIS No.						Personal No.		
INDEX NUMBER									

Candidate's Name.....Stream.....

Candidate's Signature.....

EMIS No. .....

District Name.....

Read the following instructions carefully

1. This paper has **two** sections: **A** and **B**. Section **A** has **20** questions and Section B has 12 questions.
2. Answer **all** questions. **All** the working for both sections **A** and **B** must be shown in the spaces provided.
3. **All** working must be done using a **blue** or **black** ball-point pen or fountain pen. Any work done in pencil other than graphs and diagrams will not be marked.
4. No calculators are allowed in the examination room.
5. Unnecessary changes in your work may lead to loss of marks.
6. Any 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 inside the question paper

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

1. Work out:
$$\begin{array}{r} 203 \\ +\ 87 \\ \hline \\ \hline \end{array}$$

2. Find the next two numbers in the sequence below:

   4, 7, 11, 14, 18, 21, _____, _____

3. Simplify: $\frac{2}{5} \times \frac{3}{4}$

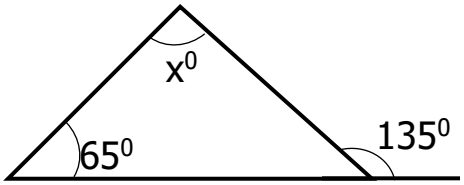
4. Write in figures: Ninety two thousand six.

5. Divide 3636 by 9.

6. Given that m = k = 6 and n = 2. Find the value of $m^2 - kn$.

7. Write 12: 15 pm in a 24 – hour clock system.

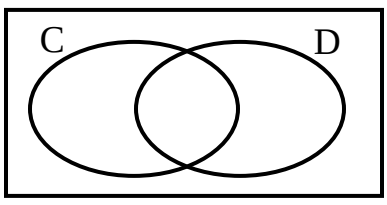
8. In the figure below, find the value of angle x.



9. Work out: $1\ 2\ 3_{five}$
$-\ 1\ 4_{five}$

10. Today Monday, the workers of a certain farm are paid their salary. What day of the week will their next pay be 30 days from today?

11. Shade (C∪D) in the Venn diagram below.



12. Round off 47.56 to the nearest whole number.

13. Simplify: $^{-}4 - {}^{-}6$

14. A bank gives a simple interest rate of 8% per annum. If Mukasa got a loan of sh. 120,000 for a period of $\frac{3}{4}$ years, how much interest did he pay?

15. Find the sum of the values of 3 and 6 in the numeral 6739.

16. A ball contains 15 balls. If 6 of them are blue and the rest are black, what is the probability of picking a black ball at random from the bag?

17. Write 67480 in expanded form.

18. The radius of a circle is 14 cm. Find its circumference. (Take π as $\frac{22}{7}$)

19. Kimuli sold a packet of biscuits at sh. 17,500 and made a loss of sh. 2,500. At what price did he buy a packet of biscuits?

20. Convert 72 km/hr into metres per second.

SECTION B: 60 MARKS

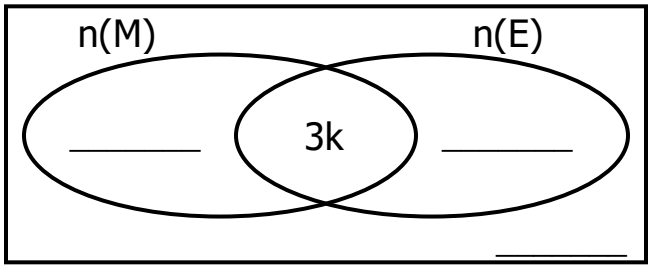
21. The sum of three consecutive even numbers is 72. If the middle is k,
    a) Find the numbers. (4 marks)

    b) Work out the range of the numbers. (1 mark)

22. In a class of 45 pupils, 25 like Mathematics (M), 30 like English (E), 5 pupils do not like any of the subjects while k pupils like both subjects.

a) Use the information given to complete the Venn diagram below. (3 marks)

$n(\varepsilon) = 45$



b) Find the value of k. (2 marks)

c) How many pupils like one subject only? (1 mark)

23. a) Work out: $\frac{2.8 + 1.7}{0.3 \text{ x } 0.5}$ (3 marks)

b). Simplify: $\frac{1}{2}$ x $\frac{3}{5}$ ÷ $\frac{3}{4}$ (2 marks)

24. Gladys bought the following items from Ken Joy supermarket.

2 kg of rice at sh. 3,200 a kg.

$1\frac{1}{2}$ kg of meat at sh. 8,000 per kg.

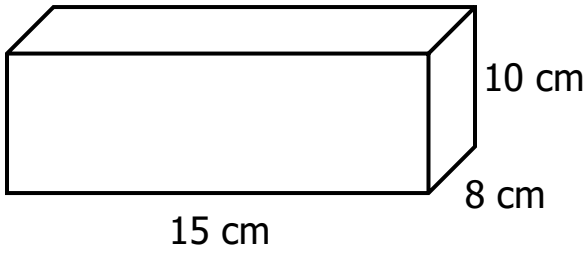
250g of salt at sh. 1,200 each kg.

2 Sackets of cooking oil at sh. 1,900.

a) How much did she spend altogether? (4 marks)

b) If she had sh. 25,000, how much money did she take back home as balance? (1 mark)

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



a) Find the volume of the figure. (3 marks)

b) Work out the total surface are of the figure. (2 marks)

26. A business man sells mangoes in heaps of five and eight. Each heap of five mangoes is sold at sh. 1,500 and each heap of eight mangoes is sold at sh. 2,000. He had 12 heaps of five mangoes each and 15 heaps of eight mangoes each.

a) How many mangoes did he have altogether? (2 marks)

b) How much money did he get after selling all the mangoes? (2 marks)

27. A teacher recorded marks of P.7 pupils in February test as shown in the table below.

Marks	70	80	90	60
Number of pupils	8	4	2	p

a) How many pupils did the test? (2 mark)

b) If the mean mark is 71, find the value of p. (3 marks)

28. a) Using a ruler, a pencil and a pair of compasses only, construct a triangle PQR in which PQ = 6 cm, angle RPQ = 120^0 and angle PQR = 30^0. (5 marks)

b). Measure line PR……. (1 mark)

29. a) Change 15_{ten} into a binary base. (2 marks)

b). Find the number that has been expanded below. (3 marks)
$(6 \times 10^4) + (4 \times 10^{-2}) + (8 \times 10^0)$

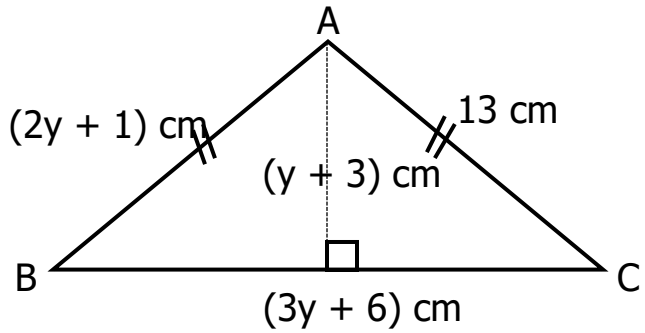
30. Andy, Ben and Collin shared a certain amount of money in the ratio of 2: 4: 5 respectively. If Andy got sh. 30,000.
    a) Work out their total share. (3 marks)

    b) How much did Ben get? (2 marks)

31. a) Solve: $12p - 2 = 4$ (2 marks)

    b). Write the solution set for: $3x + 12 > 3$ (2 marks)

32. The diagram below is an isosceles triangle. Use it to answer the questions that follow.



a) Find the value of y. (2 marks)

b) Calculate the area of the triangle above. (3 marks)

END