



SMART STAR EXAMINATIONS BOARD

PLE PREPARATION TEST ONE 2025

PRIMARY SEVEN

MATHEMATICS

Time allowed : 2 hours 30 minutes

Random No.						Personal No.		

Candidate's Name

Candidate's signature.....

School 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. 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, pictures and diagrams will **not** be marked.
4. **No calculators** are allowed in the examination room.
5. Unnecessary changes of 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 boxes indicated: **"For Examiners' Use Only"**

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*** the questions in this Section.

Questions **1** to **20** carry two marks each.

1. Workout: $36 \div 9$

2. What numeral has been expanded to give $(4 \times 3^2) + (3 \times 3^1) + (9 \times 3^0)$?

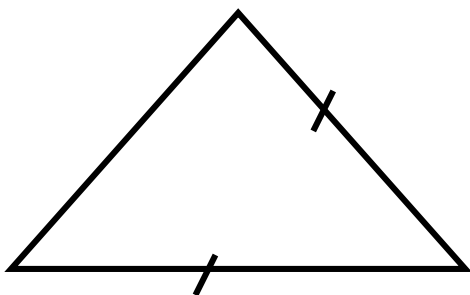
3. Find the sum of a half and a third.

4. In a class of 40 pupils, 60% of them eat posho while the rest enjoy rice.
How many more pupils eat posho than rice?

5. Simplify $+6 - +4$

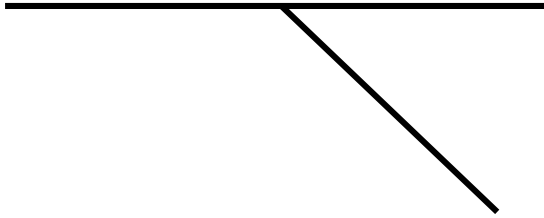
6. Find the total distance around a regular dodecagon of sides 4cm.

7. Write the number whose scientific notation is 7×10^{-2} .
8. Mustafa bought 36 mangoes. If he ate 24 mangoes, Express the number of mangoes he was left with in finite seven system.
9. Solve for r ; $r + 4 + 5r = 22$
10. The cost of five pairs of plastic chairs is sh.50,000. Find the cost of 3 plastic chairs.
11. How many lines of folding symmetry does the figure below have?



12. After selling a motorcycle at sh.3600000, a man made a profit of 20%. At what price did he buy the motorcycle?
13. The Largest Common Factor of 12 and 18 is $2t$. Find the value of t .
14. Find the median of 6, 2, 0, 7, 9, 1 and 5.
15. Given that set $R = \{4x, r, 2\}$. Find the number of elements in set R .
16. The D.J at Papa Mambo club started playing music at 3:20am and stopped at 2:40pm. For how long did he play the music?

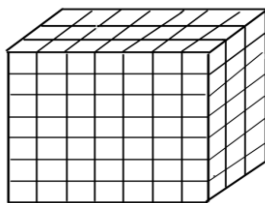
17. With the help of a protractor, measure the obtuse angle below.



18. Write one hundred two thousandths in numeral form.

19. Find the product of the first three natural even numbers.

20. Calculate the volume of the prism below.



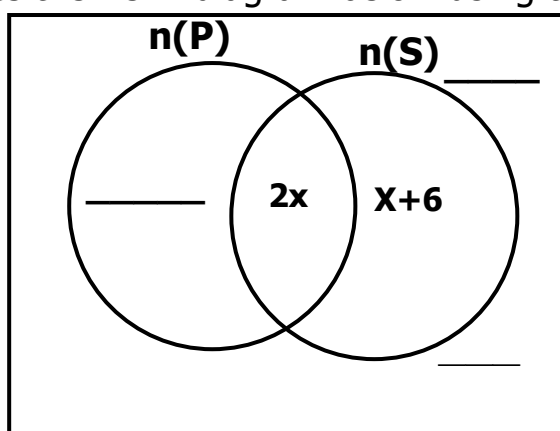
SECTION B: 60MARKS

21. (a) Denis had 3 times as many pineapples as Dorah. If Denis sold 36 of his pineapples, he had 54 pineapples left. How many pineapples did Dorah have?

(2marks)

(b) Suleiman read all mathematics application questions in a textbook from page 46 to 137. If each page had 13 questions, how many questions did he read? (3marks)

22. In a certain class, 43 students like Politics (P), $(x+6)$ like sports (S) only, $2x$ students like both politics and sports while 2 students like none of the two.
 (a) Complete the Venn diagram below using the above information. (3marks)



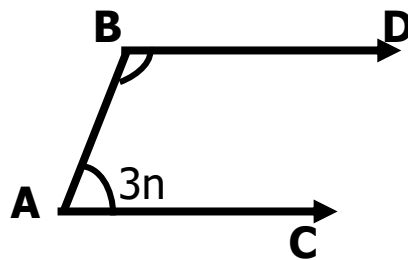
- (b) How many students like sports only if the number of students who like politics only is thrice that of students who like sports only. (2marks)

23. The mean of 3, $m+5$, 1, $m+3$ and 5 is 5. Find the value of m . (2marks)

b) The average age of 5 women is 48 years. If a man joins them, the average age becomes 3 years less than the average of the five women. How old is the man? (3marks)

24. (a) The complement of $x - 40^\circ$ is 70° . Find the value of x . (2marks)

(b) Find the value of n in the figure below if angle DBA is thrice angle CAB. (3marks)



25. With the help of a ruler, protractor and a pair of compasses, construct a regular pentagon SMART such that $MA = 5\text{cm}$. (6marks)

26. A herdsman sprays his animals at intervals, he sprays goats after every 8 days, sheep after every 12 days and cattle after every 15 days. If he last sprayed on Tuesday, on which day will the herdsman spray all the three animals at once? (4marks)

27. (a) Workout $-3 - -7$ using a number line. (3marks)

(b) In a test, 2 marks are deducted for every wrong answers given and 3 marks awarded for every correct answers given. If a candidate got 13 questions correct out of 20, find the score mark for the candidate. (2marks)

28. The schedule below is for a bus that travels from Kampala to Gulu through Nakasongola at a speed of 60km/h. Use it to answer questions.

- ✓ **09:00pm – the bus leaves Kampala park.**
- ✓ **01:00am – the bus arrives at Nakasongola.**
- ✓ **03:00am – the bus leaves Nakasongola.**
- ✓ **05:00am – the bus reaches Gulu.**

(a) How long does the bus spend resting? (1mark)

(b) Find the distance between Gulu and Kampala.

(4marks)

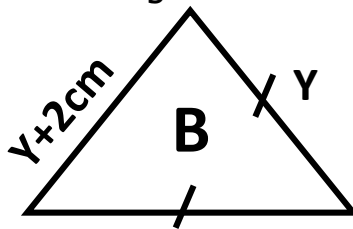
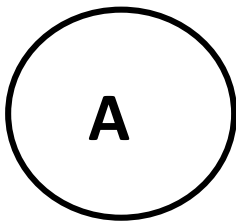
29. A P.7 class teacher went to a stationary with sh.53,000 and bought the following items in preparation for the PLE exams.

- 4 mathematical sets each at sh.4000.
- $2\frac{1}{2}$ dozens of pencils at sh.400 per pencil
- Long rulers at sh.1500 each
- 8 handkerchiefs at sh.6000 for every three.

How many rulers did he buy?

(5marks)

30. Given that the radius of the circle below whose area is 616cm^2 is the same as the total distance around figure B. find the value of y . (4marks)



31. The fraction of girls is $\frac{5}{9}$ more than the fraction of boys. $\frac{1}{4}$ of the boys like science and the rest like mathematics and $\frac{5}{6}$ of the girls like mathematics. If there are 60 more girls than boys in the class, find the total number of pupils who like mathematics. (4marks)

32. (a) Find the numeral got when the value of 6 is divided by the value of 5 in 2653. (2marks)

(b). Cylinders packed in a big box can weigh 5.4kg. If each cylinder weighs 900g, find the number of cylinders packed in the box. (3marks)

END