P456/2

Mathematics

 paper 2

2 hours

THE MATHEMATICS DEPARTMENT 2024

Uganda certificate of lower secondary education

Mid term one assessment

S.3 Mathematics test

2 hours

NAME;……………………………………………………...……SIGNATURE……………………

INSTRUCTIONS.

- Attempt only four questions
- Use blue or black ink when answering
- Show all your workings and explanations for each of the questions attempted
- Neat work is a must

FOR EXAMINER'S USE ONLY

Do not write anything in this table. The examiner will use it to keep a record of your marks

QUESTIONS	MARKS	COMMENT
1		
2		
3		
4		
5		
Total		

(Functional mathematics)

1. After a successful season, Mr. Okello a farmer at kasenge village realized that his food store was not enough to keep all that he had harvested. As a result, he decided to build another bigger food store that would keep all his harvest safely. The new food store is 8meters long, 5metres wide and 2.4 meters high. In an attempt to improve it's quality, he decided to paint both the inside and outside walls. From the nearby hardware, the cost of one tin of paint is shs.55000 and it can paint a maximum of 8 square meters of the wall. In search for a painter, he found out that each painter demands shs.800 for each square meter painted.

   Task; Give an accountability of the amount of money that Mr.Okello must have to successfully paint his new store.

2. Century property consultants is a company that deals in sales of land and houses. At the beginning of the year 2023, they had land of total area P^2 square meters. However, during the year three clients; Emeka, Echaka and Obina bought land of area 75P, 55P and **20P** square meters respectively leaving land of total area 10000 square meters. During the end of year meeting with the administrators of the company, the general manager was tasked to reward each of these clients with another land that is ⅒ of the land that each of them had bought.

   Task; As the general manager of the company, reward each of these clients accordingly hence state the size of the land that the company will remain with.

3. Mr. Charles has a farm in Nyembo village. Due to the big size of his farm, he decided to divide it into sections A, B, C, D, E and F with each section handling a specific activity. Each of these sections was to be 6km from his house and they were to surround his house as follows.
   - ✓ A in the east
   - ✓ B in the south east
   - ✓ C in the south
   - ✓ D in the south west
   - ✓ E in the west
   - ✓ F in the northwestern direction.

   Due to increased responsibilities on the farm, he employed a manager who was to manage all the sections and told him to stay in section E.

   Task; As the duly employed manager, draft a plan that will help you to locate all these sections for easy management. Show the angles and directions that can be taken to locate all the sections

4. In an attempt to prevent the spread of diseases among new born babies of kawete village in Iganga district, the government decided to carryout an immunization exercise. However, before the exercise a survey was carried out where 54 newborn babies were registered for the acquisition of vaccines for polio, tuberculosis and measles though some were registered for whooping cough . Among these, some were to acquire vaccines for all the three diseases and these were of the same number like those registered for whooping cough; 3 more than those for tuberculosis and measles only as well as half of those for polio only. Those registered for only tuberculosis were half of those for only measles; twice those for only tuberculosis and polio as well as 3 more than those for both measles and polio only. After the survey, the head of the immunization committee had recorded a total of 60 new born babies ready for immunization.

   Task; As the head of the immunization committee of the village, write a letter to the head of doctors at Mulago hospital advocating for the required number of vaccines for each of the diseases.

5. Enyimba is one of the football clubs in the Nigerian football association. All players in this club are given specific allowances on a match day depending on the performance displayed. However, there's always a fixed allowance each of these players gets after the match and it is this that is multiplied by every players specific allowances to obtain their total post match allowances . Due to chaos after a certain match, the person in charge of paying these allowances was brutally killed and some of his records burnt. As a result a new person was employed to continue with this job. On checking records, he found out that only 5 players had been paid total allowances of 75, 147, 48, 243 and 300 Naira and the rest had not received their allowances. Records further show the list of specific allowances for each of the players that did not receive their allowances.

   Task; As the new in charge, how would you determine the allowances of these players

   <center>"Never avoid any challenge , always fight till when you solve it"</center>

   <center>******* SUCCESS***********</center>