FORM 4 ENDTERM 1 EXAMS

ALL SUBJECTS

A standard compilation of ENDTERM 1 test examinations for KCSE candidates.

All subjects tested

(Coverage of form 1,2,3 &part of form 4 curriculum course of study)

CALL/TEXT/WHATSAPP **MWALIMU EPUBLISHERS** FOR MARKING SCHEMES

MR ISABOKE 0705525657

FORM 4 ENDTERM 1 EXAMS
MATHEMATICS

NAME………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

Kenya Certificate of Secondary Education
MATHEMATICS
PAPER 1
TIME: 2½ HRS.

INSTRUCTION TO CANDIDATE'S:
1. *Write your **name**, **admission number**, **class** and **date** in the spaces provided above.*
2. *This paper consists of **two** Sections; Section **I** and Section **II**.*
3. *Answer **ALL** the questions in Section **I** and any **five** questions from Section **II**.*
4. *All answers and working must be written on the question paper in the spaces provided below each question.*
5. *Show all the steps in your calculation, giving your answer at each stage in the spaces provided **below** each question.*
6. *Marks may be given for correct working even if the answer is wrong.*
7. *Non-programmable silent electronic calculators and KNEC Mathematical tables **may be** used, except where stated otherwise.*
8. *Candidates should check the question paper to ascertain that all the pages are printed as indicated and that no questions are missing.*
9. *Candidates should answer the questions in English.*

FOR EXAMINER'S USE ONLY:
SECTION I

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	TOTAL

SECTION II

17	18	19	20	21	22	23	24	TOTAL

GRAND TOTAL

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION I: (50 MARKS)
Answer all the question in this section in the spaces provided.

1. Without using a calculator , evaluate: $\dfrac{\frac{3}{4}+ 1\frac{2}{7} \div \frac{3}{7} \, of \, 2\frac{1}{3}}{\frac{2}{3}\left(1\frac{2}{7} -\frac{3}{8}\right)}$ (3 mks)

2. Simplify completely. $\dfrac{3x^2 -xy -2y^2}{18x^2- 8y^2}$ (3 mks)

3. The price of an article is marked as 12,000/= Mr. Omanga sold the article at a discount of 10% and still made a profit of 8%. Calculate the cost of the article.   (3 mks)

4. Three sirens wail at intervals of thirty minutes, fifty minutes and sixty minutes. If they wail together at 7.18 a.m. on Monday, what time and day will they wail together?   (3 mks)

5. The table shows the frequency distribution of marks scored by students in a test.

Marks	Frequency
21 - 30	2
31 - 40	4
41 - 50	11
51 - 60	5
61 - 70	3

    Determine the median mark correct to one decimal point.   (3 mks)

6. A cylindrical solid whose radius and height are equal, has a total surface area of 154cm². Calculate the diameter.   (3mks).

7. The exterior angle of a regular polygon is $(\chi - 50)°$ and the interior angle is $(2\chi + 20)°$. Find the number of sides of the polygon.   (3 mks)

8. Solve the following inequalities and represent it on the number line.
    $6x + 2 < 3x + 11 \leq 27x - 1$ Write down the integral values that satisfy the inequality.
                                                                               (3mks)

9. Find the equation of a line through the point (2, 1), perpendicular to the line $\frac{1}{2}x + 2y = -3$ (3 mks)

10. Find the value of x given that; $9^x + 2 \times 3^{2x} - 243 = 0$ (3mks).

11. The position vectors of A and B are given as OA = 2**i** – 3**j** + 4**k** and OB= -2**i** – **j** + 2**k** respectively. Find to 2 decimal places, the length of vector **AB**. (4 mks)

12. Use the exchange rates below to answer the question.

	Buying	Selling
1 us Dollar	63.00	63.50
1 Euro	125.30	125.43

A tourist arriving in Kenya from Britain has 9600 Euros. He converts the Euros to Kenya shillings at a commission of 5%, while in Kenya he converts the money to US dollars. If he

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was not charged any commission from the last transaction, calculate to the nearest USA dollar what he received.

(3mks).

13. Given that $\sin(2x - 10)^o = \cos 60^o$ and x is an acute angle, find x. (3 mks)

14. The length of a rectangle is (3x+1)cm. Its width is 3cm shorter than the length. Given that area of the rectangle is 28cm², find its length. (3 mks)

15. The mass of two similar solid are 324g and 768g. Find
    a) height of the smaller solid if the height of the bigger solid is 20cm. (2 mks)

    b) the surface area of the smaller solid if the surface area of the bigger solid is 40cm². (2 mks)

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16. The cost of three pens and five books is sh. 130. Kanyoro bought 2 of the pens and 3 of the books at sh. 80. How much did he pay for each? (3mks)

SECTION II (50mks)
Answer only *five* questions in this section in the spaces provided.

17. A bus left Nairobi at 7a.m and travelled towards Eldoret at an average speed of 80km/h. At 7:45 a.m a car left Eldoret towards Nairobi at an average speed of 120 km/h. Given that the distance between Nairobi and Eldoret is 300km,
Calculate:
(a) The time the bus arrived at Eldoret. (2 mks)

(b) The time of the day, the two met. (3 mks)

(c) The distance from Nairobi to where the two met. (2 mks)

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(d) The distance of the bus from Eldoret when the car arrived in Nairobi.   (3 mks)

18. The following measurements were recorded in a field book using XY as the base line. XY = 400m.

```
                 Y
      C   60    340
                300   120   D
                240   160   E
                220   160   F
      B   100   140
      A   120    80
                 X
```

(a)   Using a scale of 1: 4000, draw an accurate map of the farm.   (4 mks)

(b)   Determine the actual area of the farm in hectares.   (4 mks)

(a)   If the farm is on sale at sh.80,000 per hectare, find how much the farm costs.

(2 mks)

19. Mr. Omwega is employed. His basic salary is Kshs. 21, 750 and is entitled to a house allowance of Kshs 15, 000 and a travelling allowance of Kshs 8, 000 per month. He also claims a personal monthly relief of Kshs 1, 056 per month. Other deductions are; Union dues Kshs 200 and Co-operative shares Kshs 4, 500 per month.

The table below shows the tax rates for the year.

Income (Kshs per annum)	Tax rates
1 – 116, 600	10%
116, 161 – 225, 600	15%
225, 601 – 335, 040	20%
335, 041 – 444, 480	25%
Over 444, 480	30%

Calculate;

a) Mr. Omwega's annual taxable income.   (2 mks)

b) The tax paid by Mr. Omwega in the year.   (6 mks)

c) Mr. Omwega's net income per month. (2 mks)

20. A straight line L_1 has a gradient $-\frac{1}{2}$ and passes through point P (-1, 3). Another line L_2 passes through the points Q (1, -3) and R (4, 5). Find.
(a) The equation of L_1. (2 mks)

(b) The gradient of L_2. (1 mk)

(c) The equation of L_2. (2 mks)

(d) The equation of a line passing through a point S (0, 5) and is perpendicular to L_2
(3 mks)

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(e)   The equation of a line through R parallel to L_1.   (2 mks)

21. A ship leaves port P and sails to port Q which is 80km away on a bearing of 040°. The ship then sails from Q to R on a bearing 160° where R is 150km from Q. From R, the ship returns directly to P at a speed of 25km/h.
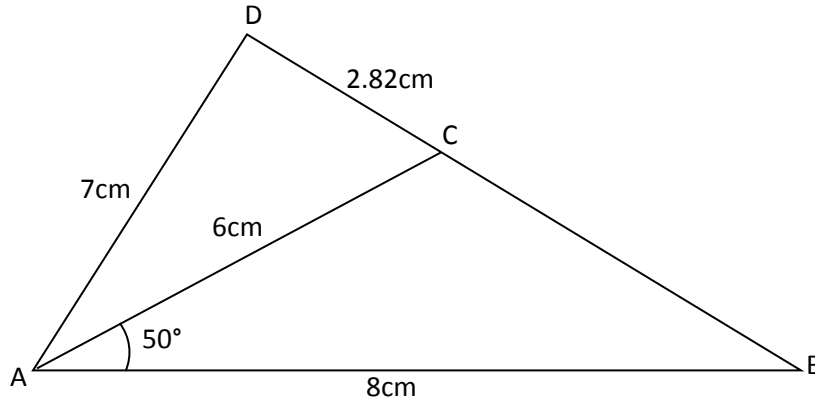   a) Using a suitable scale show the relative positions of P, Q and R.   (3 mks)

    b) Find the bearing of R from P   (2 mks)

    c) Find the distance travelled from R and the time taken to arrive at the destination(3 mks)

    d) An island S is equidistant from P, Q and R. Show its relative position.   (2 mks)

22. In the figure **below** (not drawn to scale) AB = 8cm, AC = 6cm, AD = 7cm, CD = 2.82cm and angle CAB = 50°.

Calculate (to 2d.p.)

a) The length BC. (3 mks)

b) The size of angle ABC. (3 mks)

c) Size of angle CAD. (2 mks)

d) Calculate the area of triangle ACD. (2 mks)

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23. Complete the table for the function $y = 1 - 2x - 3x^2$ in the range $-3 \leq x \leq 3$ (2 mks)

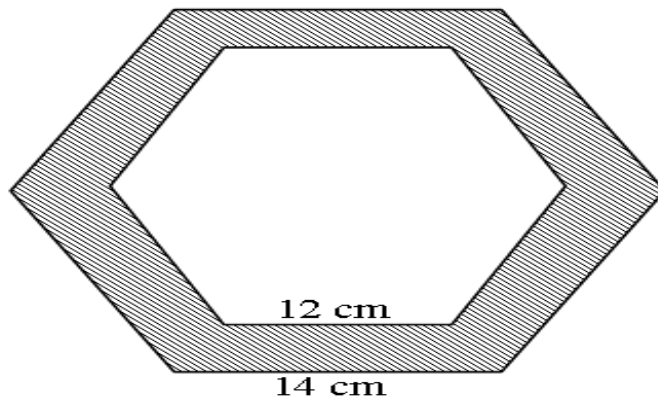| X	-3	-2	-1	0	1	2	3
$-3x^2$	-27		-3	0		-12	
$-2x$		4		0			-6
1	1	1	1	1	1	1	1
Y	-20			1		-15	
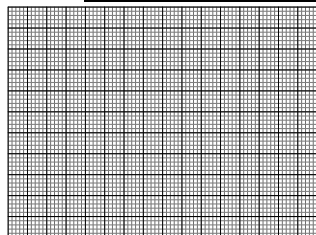
b) Using the table above and the graph paper provided, draw the graph of
$y = 1 - 2x - 3x^2$ (4 mks)

c) Use the graph in (b) above to solve
i) $1 - 2x - 3x^2 = 0$ (2 mks)

ii) $2 - 5x - 3x^2 = 0$ (2 mks)

24. The diagram below (not drawn to scale) shows the cross – section of a hexagonal solid metal prism length 20cm.

12 cm

14 cm

Calculate;
a) The area of the shaded region (Take hexagon to be regular).   (5 mks)

b) The volume of the material used to make the metal in cm³.   (2 mks

c) If the density of the metal prism is 3.5 g/ cm³, find its mass in kg.   (3 mks)

FORM 4 ENDTERM 1 EXAMS
MATHEMATICS

NAME……………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

Kenya Certificate of Secondary Education
MATHEMATICS
PAPER 2
TIME: 2½ HRS.

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9. *Candidates should answer the questions in English*
10.

FOR EXAMINER'S USE ONLY:
SECTION I

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	TOTAL

SECTION II

17	18	19	20	21	22	23	24	TOTAL

GRAND TOTAL

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION I: (50 MARKS)

Answer all the question in this section in the spaces provided.

1. Use logarithm tables only correct 4 d.p to evaluate: (4 mks)

$$\frac{10^{0.8043} \times \log 4.948}{\sqrt{0.004636}}$$

2. Find the centre and radius of a circle with equation:

$\chi^2 + y^2 - 6\chi + 8y - 11 = 0$ (3 mks)

3. If $(M + n) : (M - n) = 8 : 3$. Find the ratio $M : n$. (3 mks)

4. Find the values of x that satisfies the equation

$\log(x + 5) = \log 4 - \log(x + 2)$ (3 mks)

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5. The co-ordinates of the points A, B and C are (0,-4), (2, -1) and (8, 8) respectively. Use vector method to show that the points are collinear. (3 mks).

6. W varies directly as the cube of x and inversely as y. Find W in terms of x and y given that W = 80 when x = 2 and y = 5. (3 mks)

7. Without using mathematical tables, simplify in the form $a\sqrt{b}$ (3 mks)

$$\frac{2}{3-\sqrt{7}} - \frac{2}{3+\sqrt{7}}$$

8. Expand $(2 + x)^5$ in ascending powers of x up to the term in x^3. Hence approximate the value of $(2.03)^5$ to four significant figures. (3 mks)

9. A clothes dealer sold 3 skirts and 2 trousers for sh. 840. He also sold 4 shirts and 5 trousers for Ksh. 1680. Form a matrix to represent the above information ; hence find the cost of
1 shirt and 1 trouser. (3 mks)

10. Mumbua bought two grades of rice, grade A and grade B. She bought grade A at Sh. 42 per kg and grade B at Sh. 21 per kg. If she sold the mixture of the two grades at Sh. 39 per kg making a profit of 30%, at what ratio should she mix the two grades? (3 Marks)

11. In a transformation, an object with an area of 5 cm^2 is mapped onto an image whose area is 30 cm^2. Given that the matrix of the transformation is $\begin{bmatrix} x & x-1 \\ 2 & 4 \end{bmatrix}$ find the value of x.
(3 mks)

12. The first term of an arithmetic sequence is -7 and the common difference is 3.
    a) List the first six terms of the sequence; (1 mk)

    b) Determine the sum of the first 50 terms of the sequence. (2 mks)

13. Pipe A can fill an empty water tank in 3 hours while pipe B can fill the same tank in 5 hours. When the tank it can be emptied by pipe C in 15 hours. Pipe A and B are opened at the same time when the tank is empty. If one hour later pipe C is also opened. Find the total time taken to fill the tank. (4 mks).

14. Make t the subject of the formula (3 Marks)

$$\frac{r}{\sqrt{P^2 - t^2}} = \frac{P}{t}$$

15. The figure below shows a circle centre O. AB and PQ are chords intersecting externally at a point C. AB = 9cm, PQ= 5cm and QC = 4cm. Find the length of BC. (3mks)
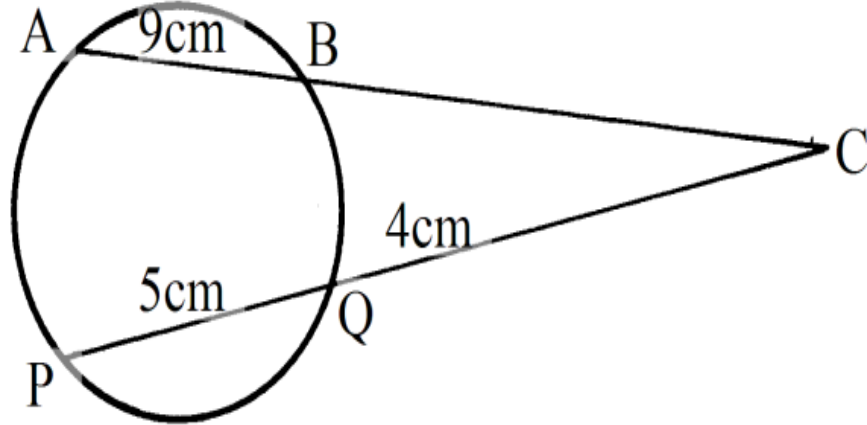
16. Using table of reciprocals of numbers, find the value of x if (3 Marks)

$$X = \frac{1}{25.36} + \frac{3}{1.302}$$

17. OAB is a triangle in which $OA = a$ *and* $OB = b$. M is a point on OA such that
OM: MA = 2: 3 and N is another point on AB such that AN: NB = 1: 2. Lines ON and MB
intercept at X.
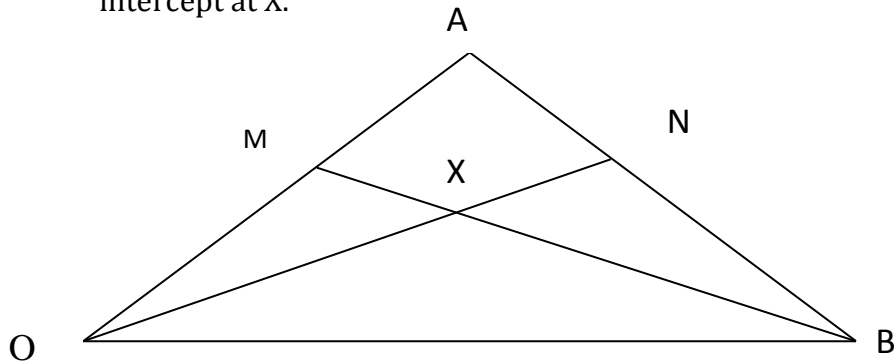
(a)   Express the following vectors in terms of *a and b*.
     (i)   AB   (1 mk)

     (ii)   ON   (2 mks)

     (iii)   BM   (1 mk)

(b)   If OX = k**ON** and BX = h**BM** express **OX** in two different ways. Hence or otherwise
         find the values of h and k.   (5 mks)

(c)   Determine the ratio OX: XN.   (1 mk)

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x	-4	-3	-2	-1	0	1	2	3
x^3	-64							27
$2x^2$								
$-5x$								
-8								
y	-20							

18. Draw the graph of $y = x^3 + 2x^2 - 5x - 8$ for values of x in the range $-4 \leq x \leq 3$

(5 mks)
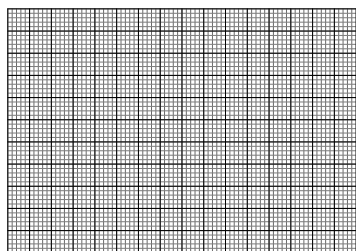
By drawing suitable straight line on the same axis, solve the equations.

i) $x^3 + 2x^2 - 5x - 8 = 0$ (1 mk)

ii) $x^3 + 2x^2 - 5x - 7 = 0$ (2 mks)

iii) $3 + 3x - 2x^2 - x^3 = 0$ (2 mks)

19. A transformation represents by the matrix $\begin{pmatrix} 2 & 0 \\ 0 & 2 \end{pmatrix}$ maps A(1, 3), B(3, 3) and C(2, 1) onto

A^{1}B^{1}and C^1 respectively.
   a) On the grid provided, draw the triangle ABC and its image A^{1}B^{1}C^1 on the same axes.
                                                                              (3 mks)
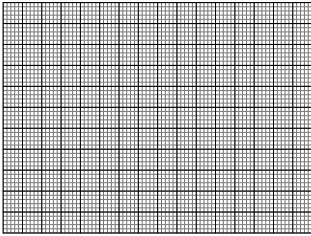
   b) Hence or otherwise determine the area of the triangle A^{1}B^{1}C^1 (2 mks)

c) Another transformation represented by the matrix $\begin{pmatrix} 0 & 1 \\ 1 & 0 \end{pmatrix}$ maps $A^1B^1C^1$ onto

   $A^{11}B^{11}C^{11}$.Plot triangle $A^{11}B^{11}C^{11}$ on the same axes.   (2 mks)

d) Describe the transformation represented by the matrix $\begin{pmatrix} 0 & 1 \\ 1 & 0 \end{pmatrix}$ (1 mk)

e) Determine the matrix of the single transformation which maps $A^{11}B^{11}C^{11}$ onto ABC.
                                                                                   (2 mks)

20. An examination involves a written and a practical test. The probability that a candidate
    passes the written test is $\frac{6}{11}$. If a candidate passes a written test then the probability of
    passing the practical test is $\frac{3}{5}$, other wise it would be $\frac{2}{7}$.

    (a) Illustrate this information on a tree diagram   (2 mks)

    (b) Determine the probability that a candidate

        (i)   Passes both tests   (2 mks)

        (ii)   Passes the written test only   (2 mks)

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(iii)   passes the practical test only   (2 mks)

(iv)   Fails all test   (2 mks)

21. Three partners Mutua, Muthoka and Mwikali contributed Sh. 600,000, Sh. 400,000 and Sh. 800,000 respectively to start a business of a matatu plying Mbumbuni – Machakos route. The matatu carries 14 passengers with each paying Sh. 250. The matatu makes two round trips each day and ever full. Each day Sh. 6000 is used to cover running costs and wages.

a)   Calculate their net profit per day.   (2 mks)

b) The matatu works for 25 days per month and is serviced every month at a cost of KSh.10,000. Calculate their monthly profit in June.   (1 mk)

c) The three partners agreed to share 40% of the profit equally and 60% to be shared in the ratio of their contribution. Calculate Muthoka's share in the month of July   (4 mks)

d) The matatu developed mechanical problems and they decided to sell it through an agent who charged a commission of 5% on selling price. Each partner received Ksh. 475,000 from the agent after he had taken his commission. Determine the price at which the agent sold the matatu. (3 mks)

22. Two circles with centres O_1 and O_2, have radii 7cm and 6cm respectively. The two circles intersect at P and Q and the length of the common chord PQ is 10cm.
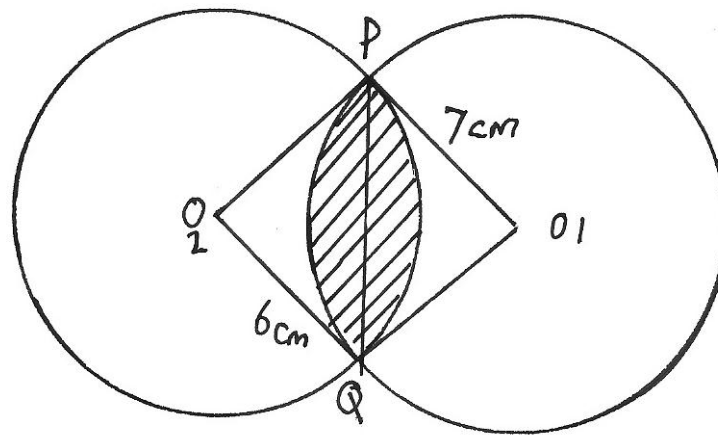
Calculate the area of the shaded region in the above diagram to 4 significant figures.
(10 mks)

23. The figure below is a right rectangular based pyramid VABCD where AB = 5cm, BC = 7cm, VC = 13cm and O is a point on the base of the pyramid vertically below V.
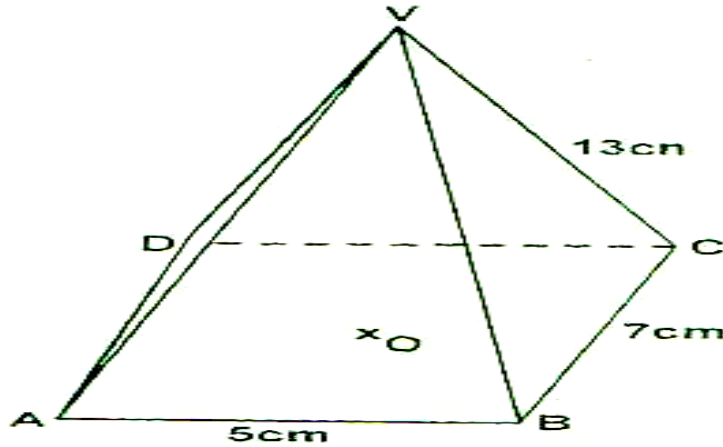
Calculate

(a) AC   (2 Marks)

(b) VO, the height of the pyramid.   (2 Marks)

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(c) the angle between the edge VB and the plane ABCD.   (3 Marks)

(d) the angle between the planes VBC and ABCD.   (3 Marks)

24. In the figure below, AT and AD are tangents to the circle at B and D respectively. DEF is a straight line, $< CBT = 60^0, < FAD = 48^0$ and $< ADF = 42^0$
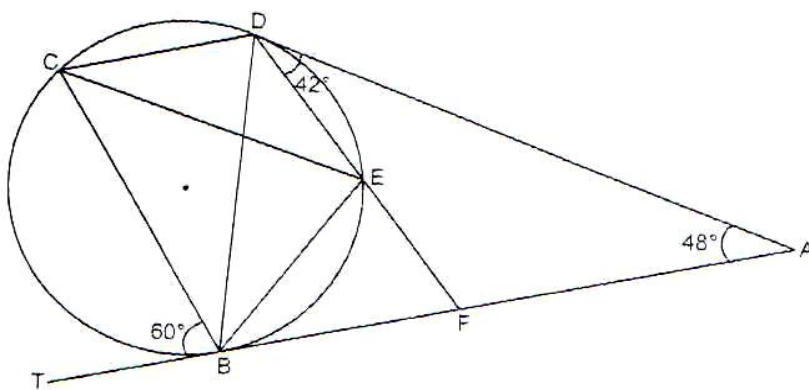
Calculate giving reasons, the value of:

a) $< DCE$ (2 marks)

b) $< BCE$ (2 marks)

c) <DCB   (2 marks)

d) <DEC   (2 marks)

e) <BEF   (2 marks)

FORM 4 ENDTERM 1 EXAMS
BIOLOGY

NAME……………………………………………………ADM………CLASS……………

CLASS : ……………………SIGNATURE…………………DATE: …………………………

FORM 4 BIOLOGY PAPERS 1 (THEORY) 231/1

TIME:2 HOURS

80 MARKS.

ANSWER ALL THE QUESTIONS IN THE SPACES PROVIDED.

1. State the functions of the organelles below
a. Golgi bodies

b. Nucleolus(1mk)

2. State two adaptations of the xylem tissue.(2mks)

3. Below is a dental formula of a certain mammal;
   i $\frac{0}{3}$ $c\,\frac{0}{1}$ pm $\frac{3}{3}$ m $\frac{3}{3}$
a. Work out the total number of teeth from the formula.(1mk)

b. State the likely mode of feeding for the mammal .Give a reason for your answer.(2mks)

4. (a) Name the gaseous exchange structures in insects.(1mk)
(b) State how the surface named in (4)(a) above is suited to is function.(2mks)

5. (a) Name the causative agent for each of the following diseases;
i.   Tuberculosis

ii.   Syphilis

6. State two reasons why accumulation of lactic in the tissues causes increased heart beat.(2mks)

7. Of late, Karimi has noted that he has been passing out large volumes of dilute urine frequently.
a. Name the likely disease he may be suffering from.(1mk)

b. State the hormone that is deficient.(1mk)

8. In a microscopy experiment, a light microscope was used to view epidermal cells of an onion. Students counted 40 cells across the field to view whose diameter was 4800 um.Work out the average length of each cell. Show your working.(2mks)

9. A person whose blood was B+ was transfused into one whose blood group was B-.The recipient died soon afterwards. Explain the cause of his death.(2mks)

10. State two differences between open and closed circulatory systems.(2mks)

11. (a) Explain why a goat requires less heat energy per day than a mouse.(2mks)

(b) Name the end product of respiration in animals when there is insufficient oxygen supply.(1mk)

12. The diagram below illustrations the structures of bread mould.

a. Name the part labeled J.(1mk)

b. State the functions of the structure labeled k.(2mks)

c. Name the kingdom to which bread mould belongs.(1mk)

13. In an ecological study in a school pond, students laid traps at random to catch frogs. The students caught 500 frogs, marked them and then released them back into pond. After ten days, they laid traps and caught frogs. Out of the 380 frogs, 95 frogs were found to be marked.

a. Using this data, calculate the population size of the frogs in the pond.(2mks)

b. State two assumptions made in the study.(2mks)

14. State three characteristics that helps to promote cross-pollination in flowering plants.(3mks)

15. State two advantages of metamorphosis in the life of an insect.(2mks)

16. (a)Explain the meaning of the following terms ;
i.   Hybrid vigour

ii.   Polyploidy

(b) State two causes of chromosomal mutations.(2mks)

17. (a)State two advantages of natural selection to organisms.(2mks)

(b) Give a reason why organisms become resistant to chemicals.(1mk)

18. (a)Name the external feature which is common in birds ,fish and reptiles.(1mk)

(b) State two characteristics of fungi.(2mks)

19. List three symptoms of diabetes mellitus.(3mks)

20. (a) State two adaptations of mitochondria to their functions.(2mks

(b) Name the chemical substance that is oxidized to lactic acid in muscles in insufficient oxygen.(1mk)

21. (a) State what is tissue fluid.(1mk)

(b) What is the importance of the tissue fluids?(2mks)

22. Name three factors that may affect transpiration and absorption at any given time.(2mks)

23. (a) State two roles of mucus in the stomach (2mks)

(b) Give a reason why digestion of starch stops in the stomach.(1mk)

24. Below is a diagram of germinating seed.

a.   Name the type of germination.(1mk)

b.   State the functions of the part labeled x during germination.(2mks)

25. (a)Explain the meaning of the term non-disjunction.(1mk)

(b)Name two examples of continuous variations.(2mks)

26. (a) Name two ovarian hormones (2mks)

(b) What is the name given to male hormones that generally regulate reproduction?(1mk)

27. Name three characteristics of a population.(3mks)

28. Explain how the following factors determine the daily energy requirements in humans:
   a) Age(1mk)

   b) Occupation (1mk)

   c) Sex (1mk)

29. Explain how an increase in temperature affects the rate of active transport.(2mks)

30. (a) State the adaptation that enables red blood cells to move in blood capillaries.(1mk)

   (b)How are red blood cells adapted to their function?(2mks)

FORM 4 ENDTERM 1 EXAMS

BIOLOGY

NAME…………………………………………………………**ADM**……….**CLASS**……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

Name ……………………………………candidate's signature…………………
Date ………………………
231/2
Biology
Time: 2hrs.

Instructions to candidates

.Write your name, index number in the spaces provided above.
.Sign and write the date of examination in the spaces provided above.
.This paper consists of two sections. A and B.
.Anwer all the questions in section a in the spaces provided.
.In section B answer question 7(compulsory) and either question 8 or 9 in the spaces provided after question 9.
.Check to ascertain that all pages are printed and that no questions are missing.

FOR EXAMINER'S USE ONLY

SECTION	QUESTIONS	MAXIMUM SCORE	CANDIDATES SCORE
	1	7	
	2	6	
	3	7	
	4	7	
	5	6	
	6	7	
	7	20	
	8	20	
	9	20	
Total score		80	

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION A 40MKS

Answer all questions in this section in the spaces provided.

Q1. In an ecosystem energy flows from the sun and is transferred in a series of organisms. The diagram represents different levels of energy levels of energy transfer.

Level D

Level C
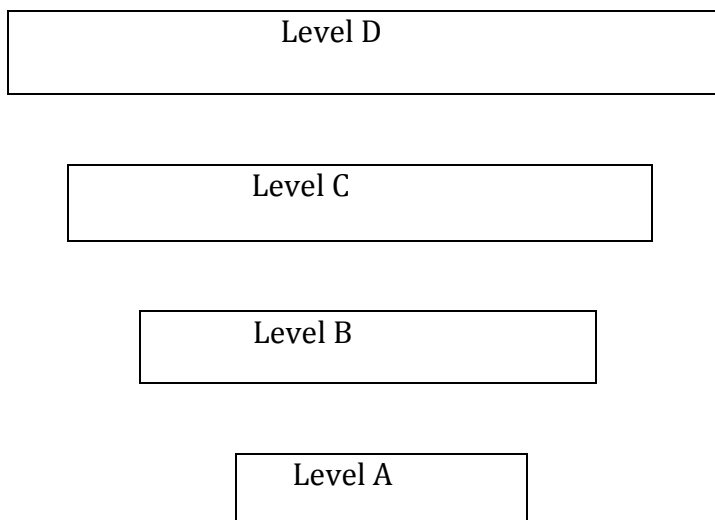
Level B

Level A

(a) Insert the sun in the diagram and using arrows show the direction of energy transfer. (1mk)

(b) Name the trophic levels represented by D and B (2mks)

(c) Identify the general trend in the amount of energy along the path illustrated in (a) give reasons for the trend. (2mks)

(d)Explain short term effect of decreasing the number of individuals in the level C. (2mks)

Q2. In maize, yellow colour W is dominant over white colour. Describe how one would establish whether a given sample of yellow maize is pure or hybrid. Show your working. (4mks)

Q3. The sketch graph shows how the metabolic rate in man and lizard is affected by environmental temperature.
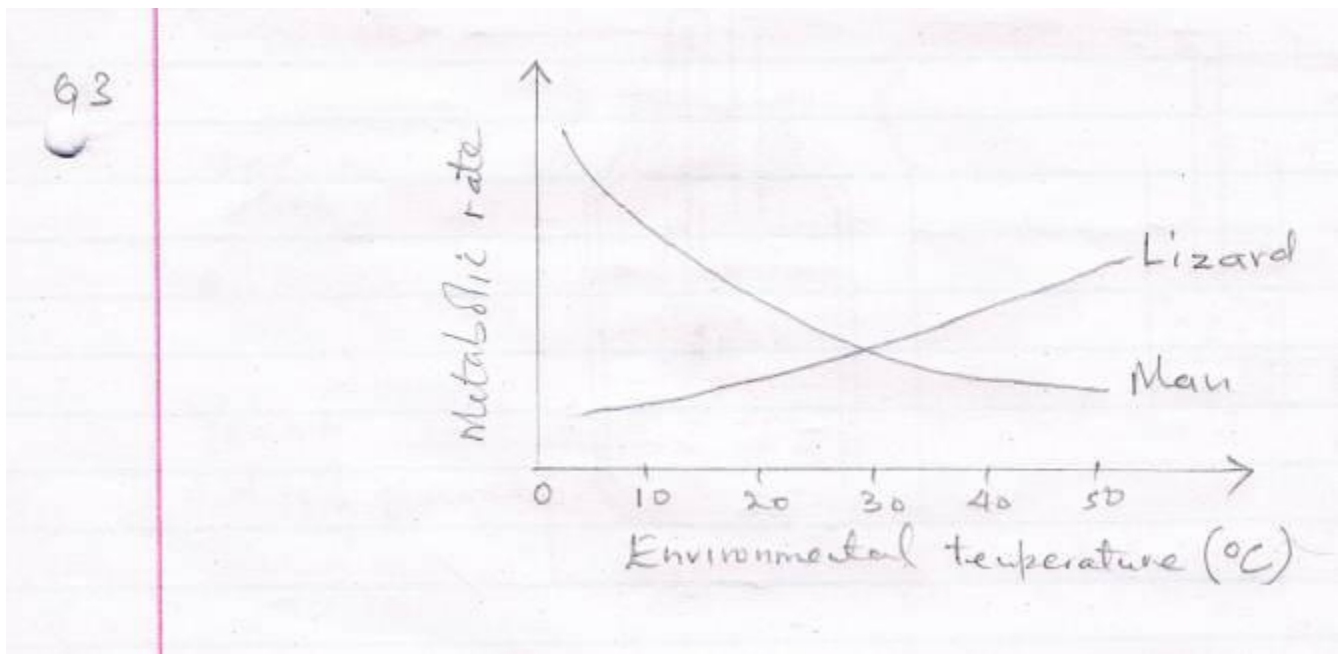
a) Suggest why the metabolic rate was high in man between 5°c and 20°c. (2mks)

b) Account for increase in metabolic rate in lizard as environmental temperature was increasing. (2mks)

c) (i) state **two** physiological processes that occur in man when environmental temperature rises above 35°c. (2mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

(ii) How would the lizard respond to similar temperature changes in (c) (1mk)

Q4. The apparatus shown was set up by a group of students.
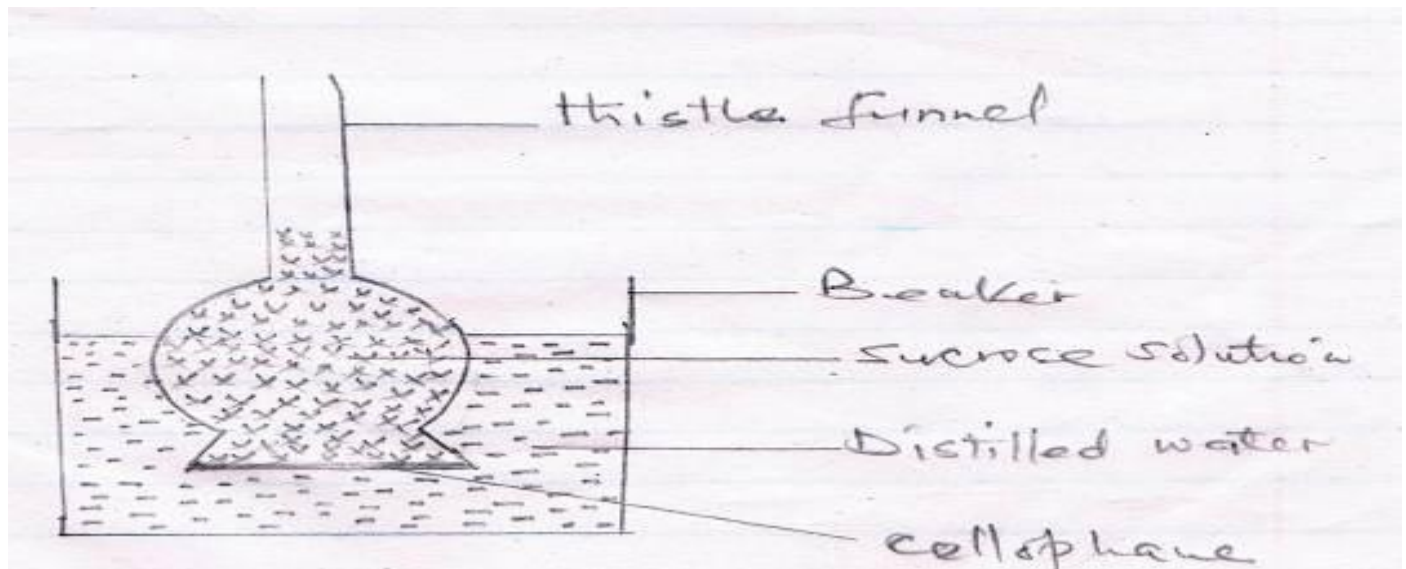
a) What was the aim of the experiment? (1mk)

b) Explain the results obtained in the set up at the end of the experiment. (2mks)

c) State the expected results if the cellophane was replaced with a thin section of

(i) Raw arrowroot (1mk)

(ii) Boiled arrowroot (1mk)

(d) (i) Account for the results obtained in (c) (ii). (1mk)

(ii) What is the equivalent of sucrose solution in plant tissue? (3mks)

Q5. The diagram represents a plant cell
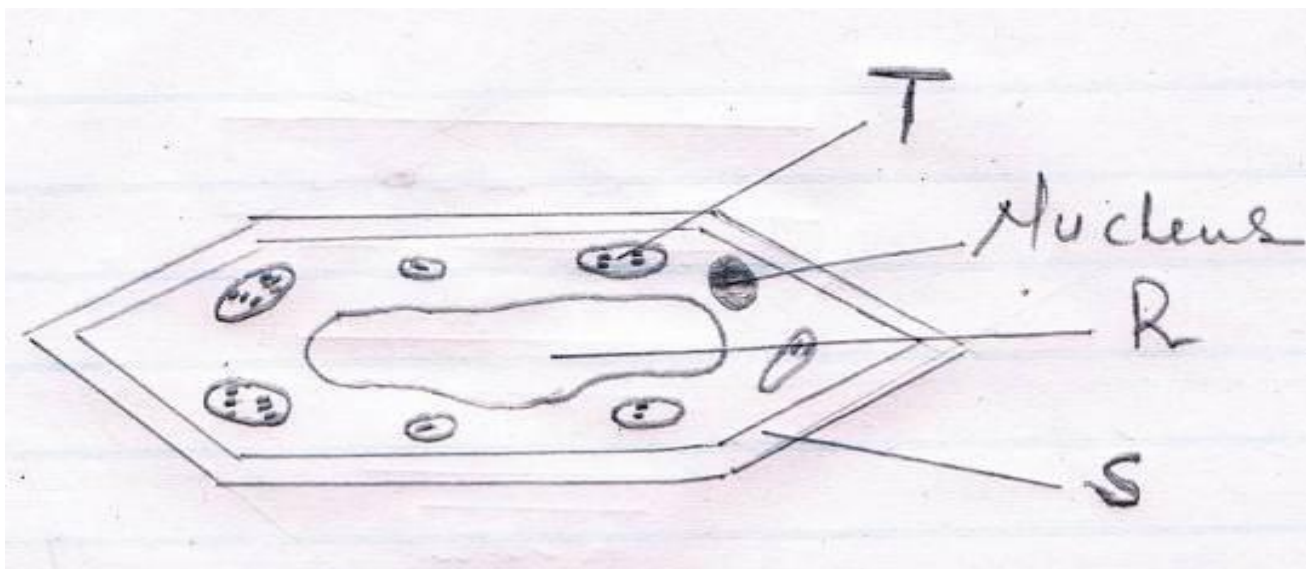
a) Name a carbohydrate which forms the structure label S. (1mk)

b) (i) state the function of the part labeled R (2mks)

(ii) Suggest what would happen in the plant if the number of organelle labeled T is

reduced..(1mk)

(c) Name **two** cell organelles present in the diagram but absent in animal cells

(2mks)

Q6. The set of apparatus was assembled by a group of students to investigate some physiological process.
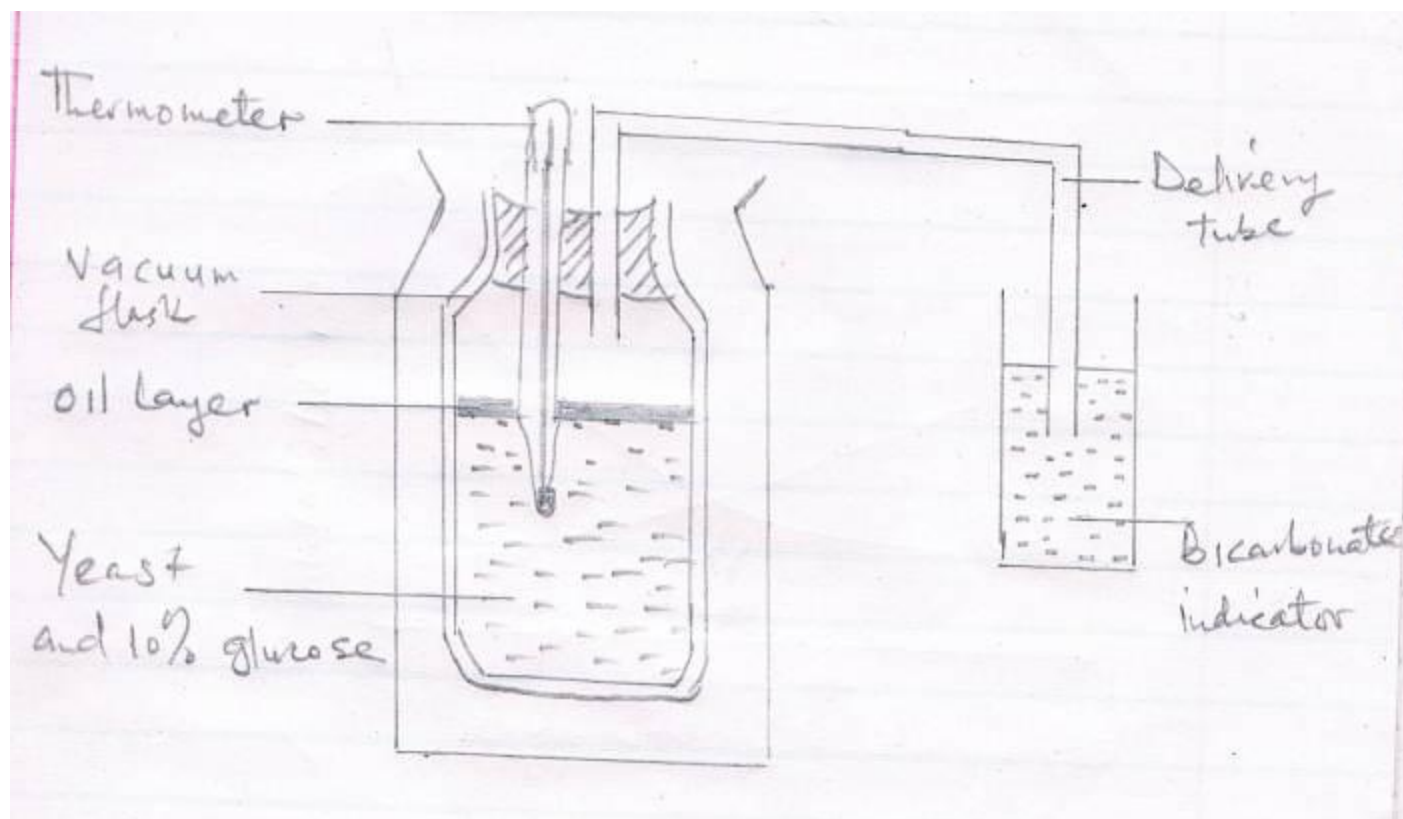
a) (i) give **two** aims of the experiment. (2mks)

(ii) Explain the observation expected after 24 hours. (2mks)

b) Before experiment, the glucose solution was boiled then cooled.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

(i) Why was it necessary to boil the solution? (1mk)

(ii) What was the importance of oil layer in the experiment?(1mk)

c) Describe a control experiment for the set up. (1mk)

d) Suggest two industrial application of the process being investigated. (1mk)

SECTION B (40mks)

Answer question 7 (compulsory) and EITHER question 8 or 9 in the spaces provided after question 9

Q7 The table below represents body weight, metabolic rate and eaten per day by different mammals. (Compulsory)

Animal	Body weight	Metabolic rate (cm³) Oxygen/ghr	Food eaten per day (kg)
Rat	0.10	800	0.098
Hare	2.00	480	1.2
Dog	8.00	300	3.0
Man	60.00	150	4.0
Horse	200.0	100	15.0
Elephant	800.0	86	40.0

a) (i) Draw a graph of metabolic rate against body weight of the animals (6mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657
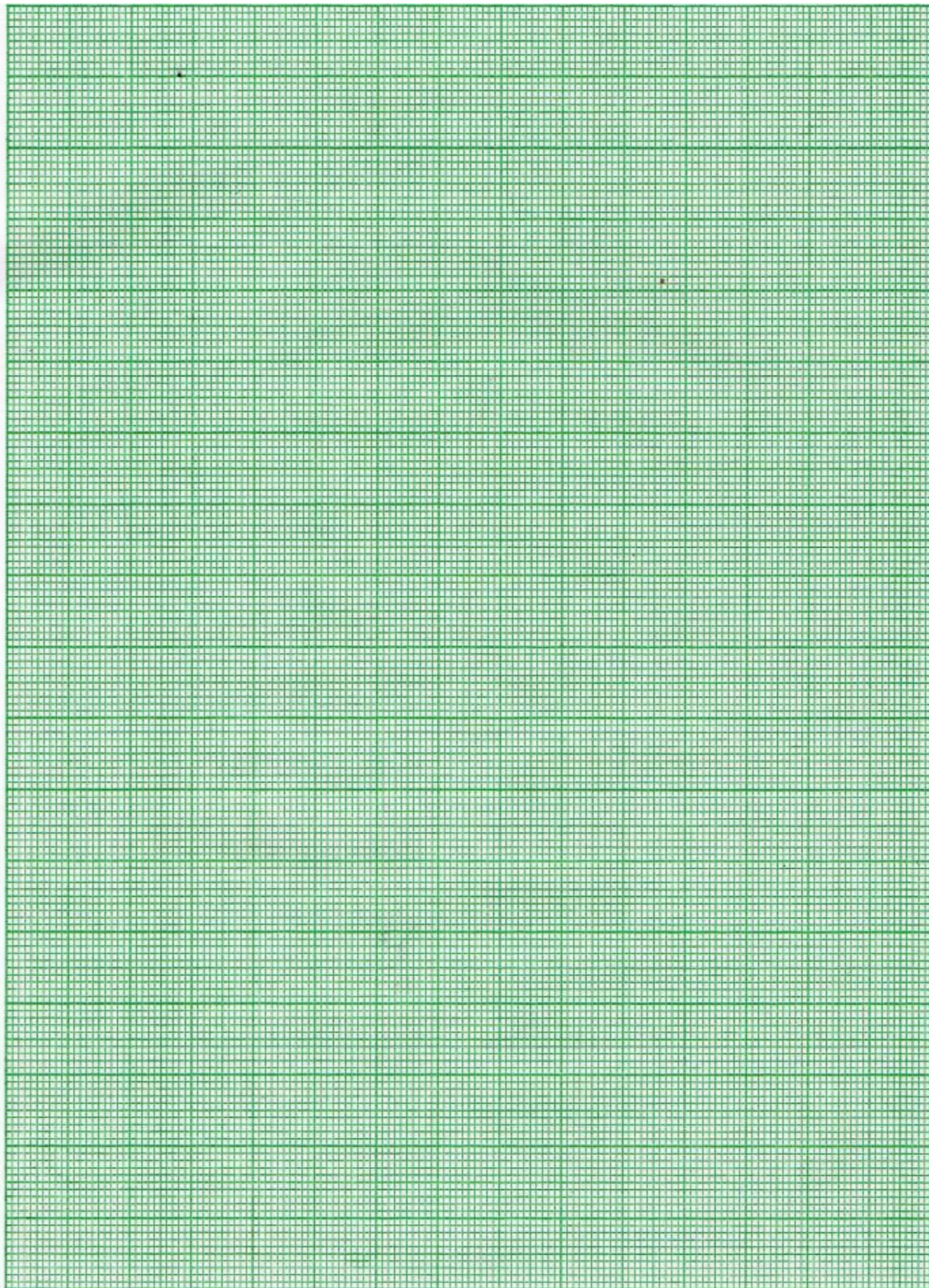
(ii) From the graph estimate the metabolic rate of an animal whose body weight is 35 kg (2mks)

b) Express the food eaten per day of the following mammals as a percentage of their body weight.

(i) Rat (2mks)

(ii) Elephant (2mks)

c) Account for the difference in percentage obtained in (b) (4mks)

d) Which of the six mammals would least suffer dehydration during a sunny day? Give reasons for your answers. (2mks)

e) A reptile would require less food than a mammal of the same weight. Explain. (2mks)

Q8. (a)Define the terms

(i)Transpiration (2mks)

(ii)Translocation (2mks)

(b)Explain **five** factors that affect the rate of transpiration in plants.(16mks)

Q9.   (a) Define

(i) Chemical evolution (2mks)

(ii) Organic evolution (2mks)

(b) Describe the evidence of organic evolution (16mks)

FORM 4 ENDTERM 1 EXAMS

CHEMISTRY

NAME……………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

233/1

CHEMISTRY

(THEORY)

2 ¼ HRS

INSTRUCTIONS TO CANDIDATES

(a) Answer your name and index number in the spaces provided above.

(b) Answer all the questions in the spaces provided in the question paper.

(c) Mathematical tables and silent electronic calculators may be used.

(d) All working must be clearly shown where necessary.

1. (A) Distinguish between allotropy and isomerism   (2mks)

(b) Draw and name an isomer of butane   (1mks)

2. (A) State grahams law of diffusion   (1mks)

(b) 60cm^3 of oxygen gas diffused through a porous portion in 50 seconds. How long would it take of sulphur (IV) oxide gas to diffuse through the same portion under same conditions?(S=32.0, O=16.0)
              (3mks)

3. (A) Both iodine and astatine belong to the same group in the periodic table.name the group

                    (1mks)

(b) Astatine is below iodine in the group how does their boiling points compare Explains?(2mks)

4. A mixture contains iron (ii) chloride, zinc (ii) oxide and potassium chloride. Describe how each of the substances can be obtained from the mixture   (3mks)

5. (A) what is a fuel   (1mks)

(b) Other than heat content what other two factors should be considered when choosing a fuel
                                                                                                             (1mks)

6. The following is a flow chart representing the manufacture of fertilizer
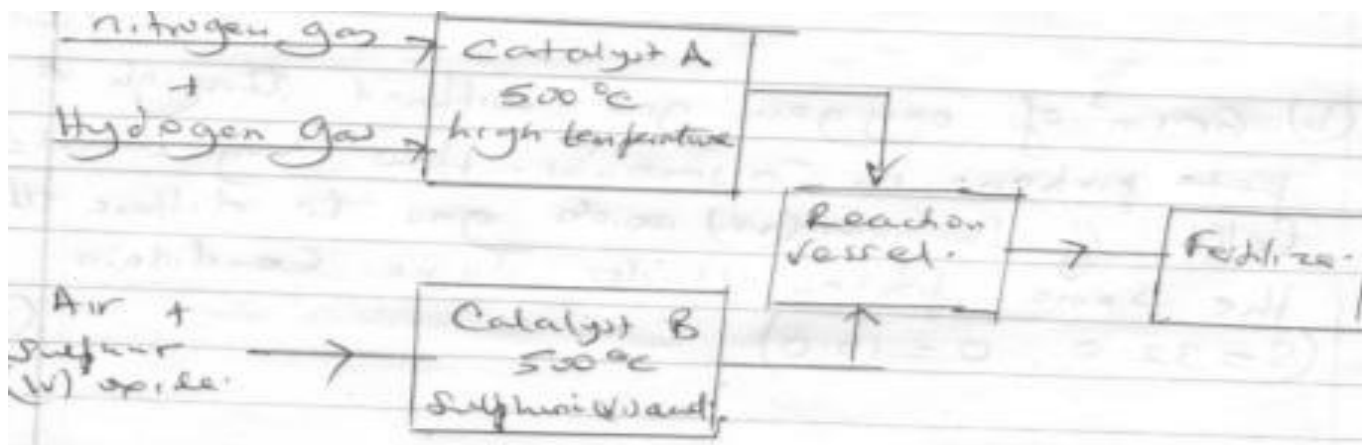
(a) Identify   (2mks)

(i) Catalyst A

(ii) Catalyst B

(b) Give one source of hydrogen gas   (1mks)

(c) Write down the formula of fertilizers formed   (1mks)

Water from kerugoya is suspected to contain sulphate ions. Describe how the presence of sulphate ions in the water   can be shown   (2mks)

(b) State one advantage of drinking hard water rather than soft water
        (1mks)

8. The diagram   below represents neutralization process carried out by a student

| 50cm³of 2M NaoH | 50cm³of 2M | 100cm³of solution |
| At 21°c | Hcl at 21⁰c | of 2M Naoh and 2M HCL at 27⁰C |
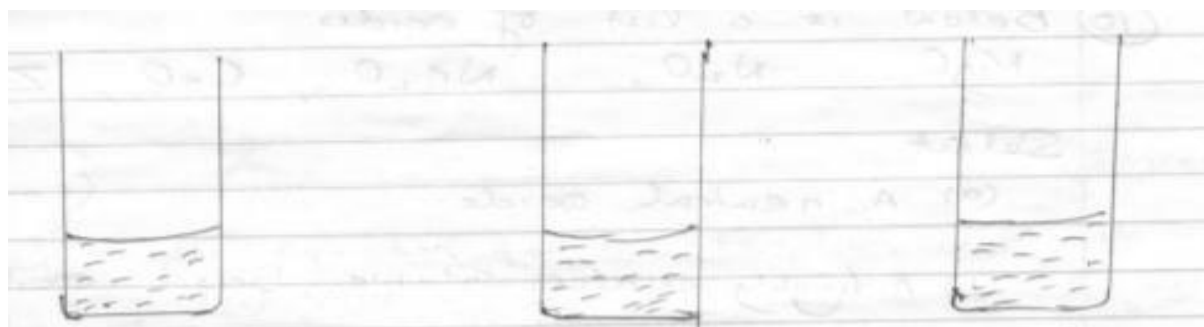
50cm³of 2M NaoH
At 21°c

50cm³of 2M
Hcl at 21⁰c

100cm³of solution
of 2M Naoh and 2M HCL at 27⁰C

Calculate the molar heat of neutralization for the reaction that takes place (take specific heat capacity =4.2kg⁻¹k⁻¹ and density of solution =1g/cm³)   (3mks)

9. The table below shows relative atomic masses and percentage abundance of the isotopes L1, L2 of element L

	Relative atomic masses	%of abundance
L1	62.93	69.09
L2	64.93	30.91

Calculate the relative atomic mass of L   (3mks)

10. Below is a list of oxides

MgO, N_2O, Na_2O, CaO, .

Select

(a)Neutral oxide   (1mks)

(b)Highly water soluble basic   oxide
(1mks)

(C) An amphoteric oxide   (1mks)

11. (A) state Charles law   (1mks)

(b) A certain gas occupied $4.2dm^3$ at 27^oC and 2 atmosphere pressure. At what pressure will it be halved if the temperature then was 127^0C (3mks)

12.study the chart below for manufacture of nitric(v)acid and answer the questions that follows
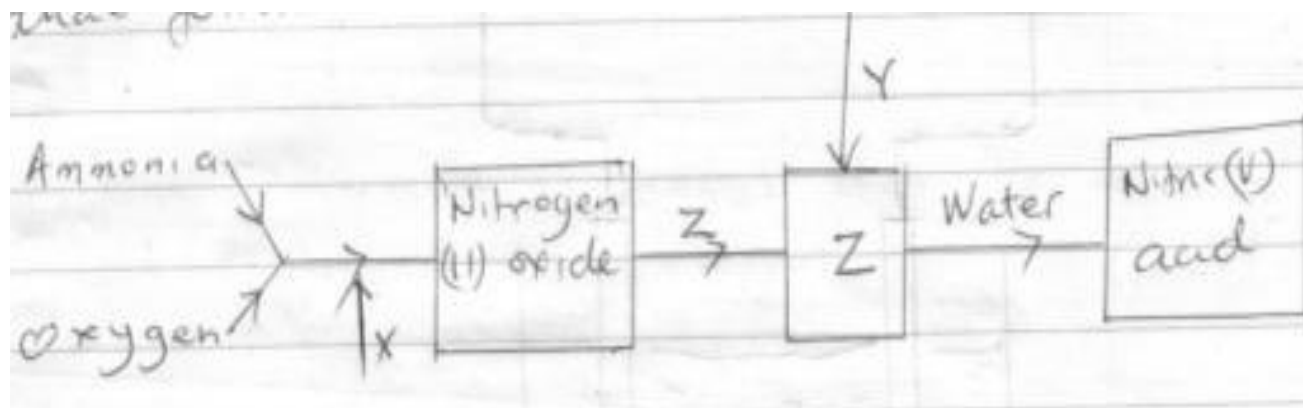
(A) Name:

X_____

Y_____

Z_____   (3mks)

(b)Give the equation for the reaction in which nitrogen (ii) oxide is formed
   (1mks)

(c) State one use of nitric (v) acid   (1mks)

13.Starting with calcium oxide describe how a solid sample of calcium carbonate can be prepared   (3mks)

14.The diagram below shows set up which was used by a student to investigate the effect of electricity on molten lead(ii) iodide
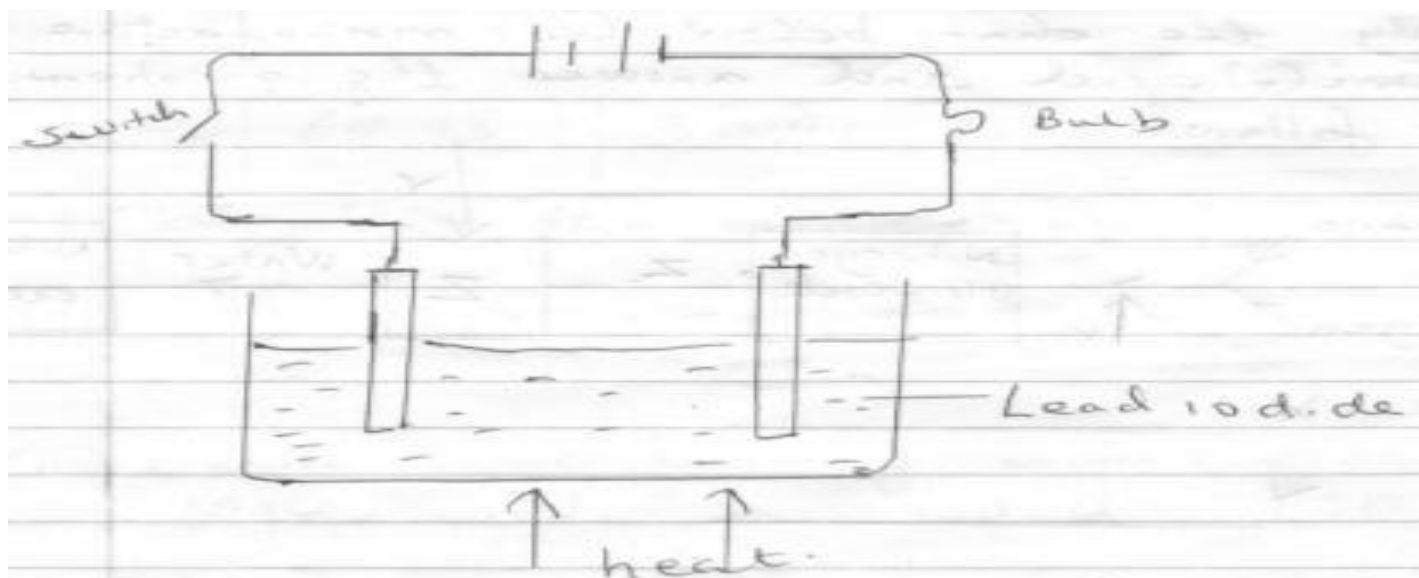
(a) Identify cathode and anode   (1mks)

(b) Why does solid lead (ii) iodide not allow the passage of electricity
        (1mks)

(c) Write equations to show reaction taking place

                (i) At cathode

                (ii) At anode   (2mks)

15. The diagram below shows a set up used by a student to prepare and collect chlorine gas
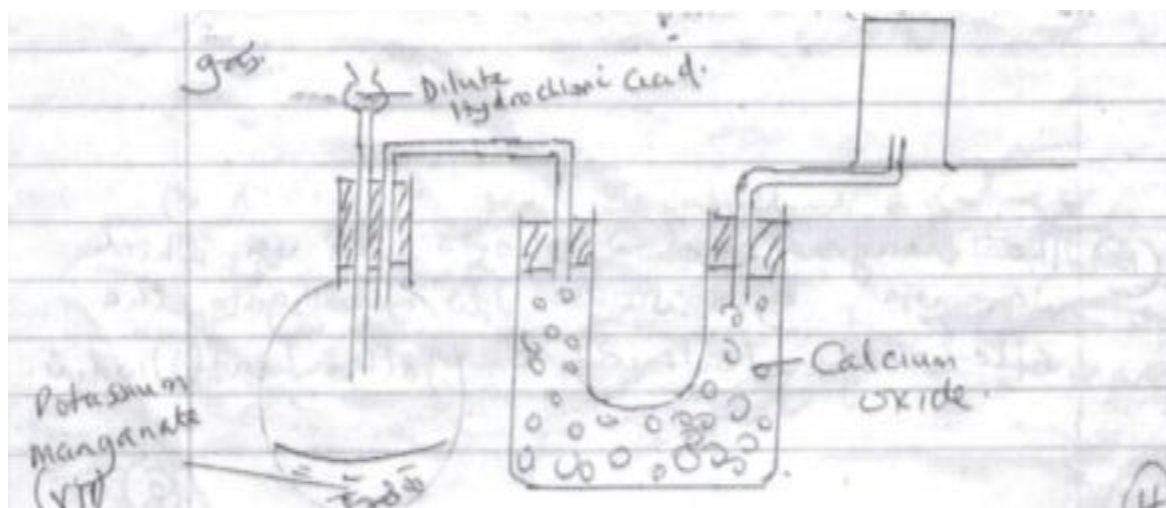
        (a) Identify with reasons two mistakes in the set up
        (3mks)

        (b) Give another set of reagents that can be used to prepare chlorine gas   (1mks)

16. Given below are pH. values of different solutions P, Q, and S. study it and answer the questions that follows

---

Solution	Ph.
P	1
Q	7
S	14

(A) Which two solution would react together to give a pH. of 7.0 (1mks)

(b) Which solution is likely to be sodium chloride solution (1mks)

(c) What is the color of phenolphthalein when added to solution S (1mks)

17. The table below gives properties of four substances

Substances	Melting points	Boiling point	Electrical conductivity	
			solid	liquid
A	1083	2567	Good	Good
B	-182	-164	Poor	Poor
C	1723	2230	Poor	Good
D	993	1695	poor	poor

State with reasons which of the above is

(i) An ionic compound (1mks)

(ii)Metallic structure (1mks)

(iii) A giant atomic structure (1mks)

18.Metal X displaced Z from its salt solution and metal Y displaced metal W from its salt solution . It was also observed that W and Y reacted with steam but X and Z did not. The reactivity of the metals starting with the most reactive is (2mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

19. Two detergents And B represented as

$$CH_3(CH_2)_{11}COONa. \quad \text{and} \quad CH_3(CH_2)-\langle o \rangle-OSO_3Na.$$
$$A \qquad\qquad\qquad\qquad\qquad B$$
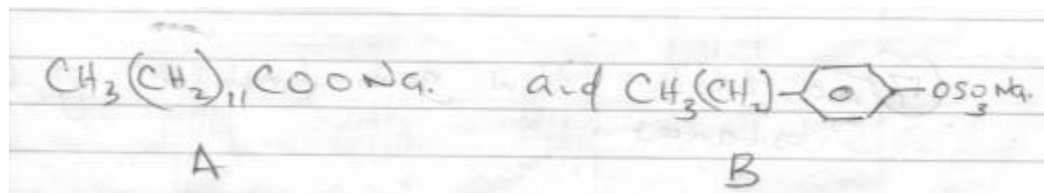
(a) Which of the detergent is suitable for washing using water containing magnesium sulphate
(2mks)

(b)Give one disadvantages of continuous use of the detergent you have choose in (a) above
(1mks)

20. A compound was found to contain 48.7% carbon 8.1% hydrogen while the rest was oxygen by mass. If the relative molecular mass of the compound is 148 determine its molecular formula(C=12, H=1, O=16) (3mks)

21. (a) What is a saturated solution (1mks)

(b) 28gms of a saturated solution of the salt at 25^0c yielded 7gms of solid when evaporated to dryness. Find the solubility of the salt at 25^0C . (3mks)

22. (a) The lattice energy for sodium chloride is 781kj/moa while the hydration energy is 774kjmol-1 calculate the enthalpy of solution of sodium chloride
(2mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

b) Draw an energy level diagram when 1 mole of sodium chloride dissolves in water. (2mks)

23. A form two student during an experiment left a container containing concentrated sulphiric (vi) acid exposed in air for two days. After two days he observed the level of acid had risen

(i) Why did the level of acid in the container rise   (2mks?)

(ii) How is this useful in the laboratory   (1mks)

24. A clean knife is left in the open overnight and found to be coated with a reddish brown substances

(I) Write down the chemical formula of reddish-brown substances
(1mks)

(ii) Give one condition necessary for the brown substance to be formed
(1mks)

(iii) Suggest two methods that can be used to prevent formation of the reddish brown substances on the knife   (2mks)

FORM 4 ENDTERM 1 EXAMS

CHEMISTRY

NAME…………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

232/2

PAPER 2

THEORY

2 HOURS

Instructions to candidates.

a) Write your name and index number in the spaces provided above.

b) Sign and write the date of examination in the spaces provided above.

c) Answer all the questions in the spaces provide.

d) KNEC mathematics tables and silent electronic calculators may be used.

e) All working must be clearly shown where necessary.

FOR EXAMINERS USE ONLY

QUESTIONS	MAXIMUM SOCRE	CANDIDATES SCORE
1	13	
2	13	
3	12	
4	10	
5	11	
6	12	
7		
TOTAL SCORE	80	

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

1. (a) Name the method that can be used to obtain pure iron(III) chloride from a mixture of iron(III) chloride and sodium chloride.(1mk)

(b) A student was provided with a mixture of sunflower flour, common salt and a red dye. The characteristics of three substances in the mixture are given in the table below.

substance	Solubility in water	Solubility in ethanol
Sunflower flour	Insoluble	Insoluble
Common salt	Soluble	Insoluble
Solid red dye	soluble	soluble

The student was provided with ethanol and any other materials needed.

Describe how the student can separate the mixture into its three components.(3mks)

(c) The diagram below shows a part of a periodic table .The letters do not represent the actual symbols of elements .Use the diagram to answer the question that follow.

									Q
R				T					
		N		V		W			
Y						X			

i. Explain why the oxidizing power of W is more than that of x.(2mks)

ii. How do the melting points of R and T compare? Explain.(2mks)

iii. Select an element that could be used
   (I) In weather balloons(1mk)

   (II) For making a cooking pot.(1mk)

(d) (i) Classify the substances water, iodine ,diamond and candle wax into elements and compound.(2mks)

Element	Compound

(ii) Give one use of diamond.

2. The flow chart below shows some of the processes involved in larger scale production of sulphuric (vi) acid. Use it to answer the questions that follow.
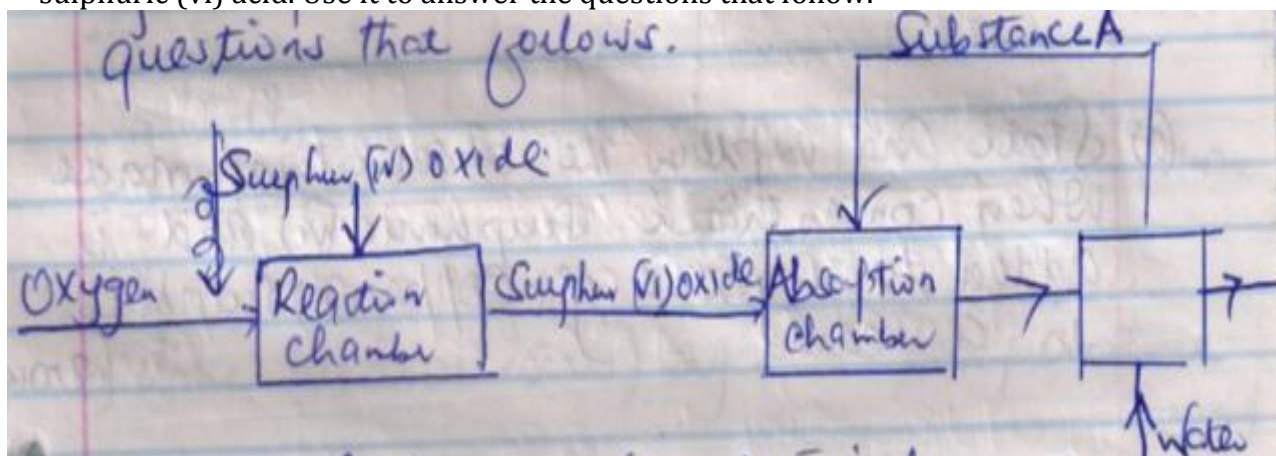
a. Describe how oxygen is obtained from air in large scale.(3mks)

b. (i) Name substance A.(1mk)

(ii)Write an equation for the process that takes place in the absorption camber.(1mk)

c. Vanadium (V) oxide is commonly used catalyst in the contact process.
   (i) Name another catalysts which can be used for this process.(1mk)

   (ii) Give two reasons why vanadium (v) oxide is the commonly used catalyst.(2mks)

d. State and explain the observation made when concentrated sulphur(vi) acid is added to crystals of copper (II) sulphate in a beaker.(2mks)

e. The reaction of concentrated sulphuric (VI) acid with sodium chloride produces hydrogen chloride gas. State the property of concentrated sulphuric (VI) acid illustrated in this reaction.(1mk)

f. Name two types of sulphuric (vi) acid.(2mks)

3. At 25° C 50g of potassium nitrate were added to 100g of water to make a saturated solution.
   a. What is meant by saturated solution.(1mk)

   b. The table below gives the solubility of potassium nitrate at different temperatures.

Temp°c	12	20	28	36	44	52
Solubility g/100g of water	22	31	42	55	70	90

(i)   Plot a graph of the solubility of potassium nitrate (vertical axis) against temperature.(3mks)

(ii)   Use the graph.
    i.   Determine the solubility of potassium nitrate at 15° c.(1mk)

    ii.   Determine the mass of potassium nitrate that remained un dissolved given that 80g of potassium nitrate were added to $100cm^3$ of water and warmed to 40°C.(2mks)

c. Determine the molar concentration of potassium nitrate at 15° C.(Assume there is no change in density of water at this temperature).
    (K=39.0 N=14.0 O = 16.0)3mks)

4. (i) Study the chart below and answer the questions that follow.
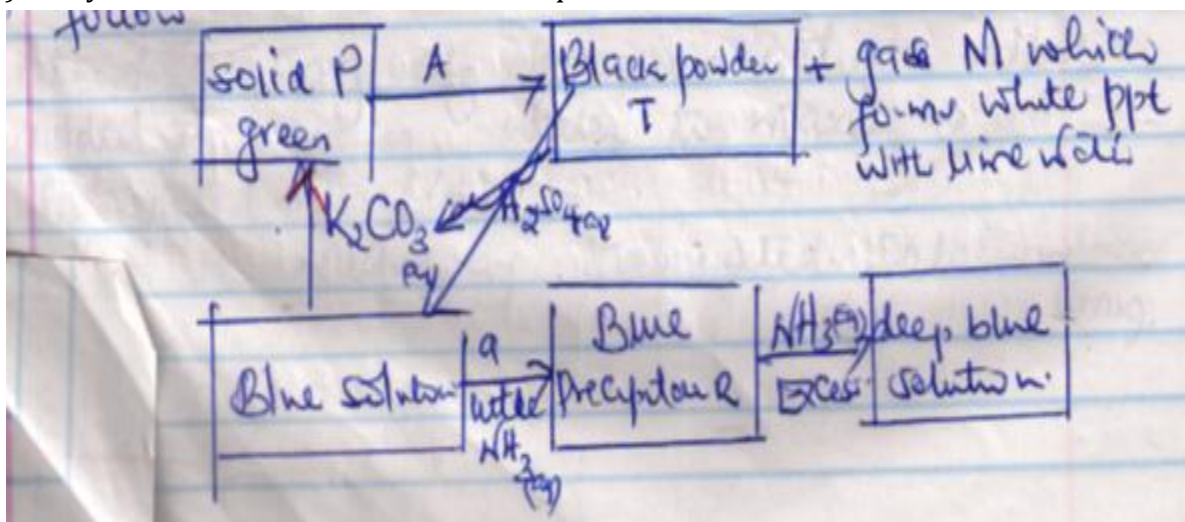
(a) Name substance

    (i)   P (1mk)

    (ii)   Colourless gas M (1mk)

(b) Write an ionic equation for the reaction producing solid p..(1mk)

(c) (i) Write the chemical formula of the complex ion in solutions.(1mk)

(Ii) In the preparation of carbon (iv) oxide in the laboratory dilute hydrochloric acid was added to marble chips ($CaCO_3$) as shown in the diagram below.
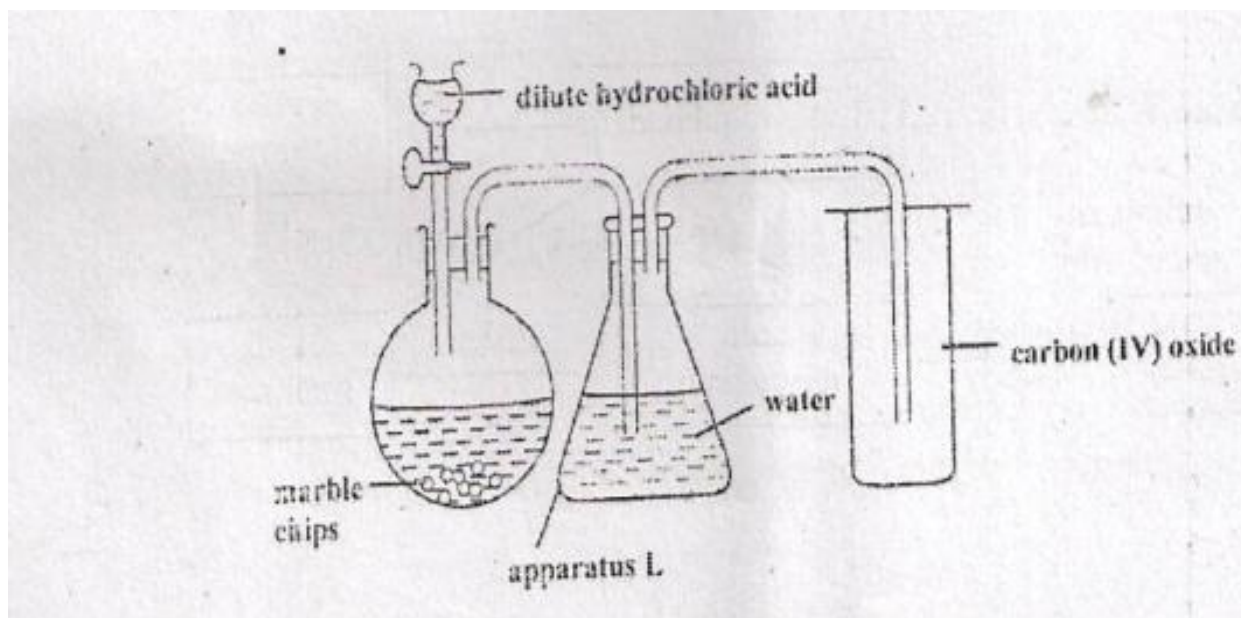
(a) What observation is made when the acid is added to the marble chips.(1mk)

(b) Why is dilute hydrochloric acid preferred to dilute sulphuric (vi) acid in the above reaction.(2mks)

(c) Explain why the gas was passed through water in apparatus L.(1mk)

(d) Calcium hydroxide is used to test carbon(iv) oxide but not sodium hydroxide .Explain(2mks)

5. (a)The combustion of propane can be represented by the following equation.

$$C_3H_{8(g)} + 5O_{2(g)} \longrightarrow 3CO_{2(g)} + 4H_2O_{(L)}$$
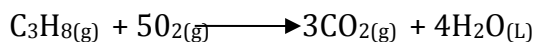
i.   Define the molar enthalpy of combustion of a compound.(1mk)

ii.   Use the thermo chemical equations below to answer the following question.
   1. $C_{(graphite)} + O_{2(g)} \longrightarrow CO_2$ $\Delta H_1 = -393.5$ Kj Mol^{-1}
   2. $H_{2(g)} + \frac{1}{2} O_{2(g)} \longrightarrow H_2O_{(L)}$ $\Delta H_2 = -285.8$ Kj mol^{-1}
   3. $3C + 4H_2 \longrightarrow C_3H_8$ $\Delta H = 103.7$ kg mol^{-1}
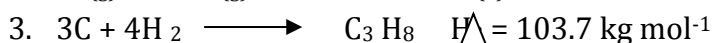
   (b) (i) Name the type of enthalpy change represented by ΔH_2.(1mk)

   (iii)   Draw an energy level diagram for the reaction represented by equation 1.(3mks)

   (iv)   Calculate the molar enthalpy of combustion of propane.(3mks)

(d) The enthalpy information of ethanol ($CH_3 CH_2 OH$) is 3239 KjMol^{-1}.Use the bond energies given below to calculate the bond energy of formation of O-H.

C-C = -346 KJ mol^{-1}

C-H=-414 kJ mol^{-1}

C-O = -360 KJ mol^{-1} (3mks)

6. (a)The diagram below shows a set up in a experiment to prepare chlorine gas and react it with aluminum foil. Study it and answer questions that follow.
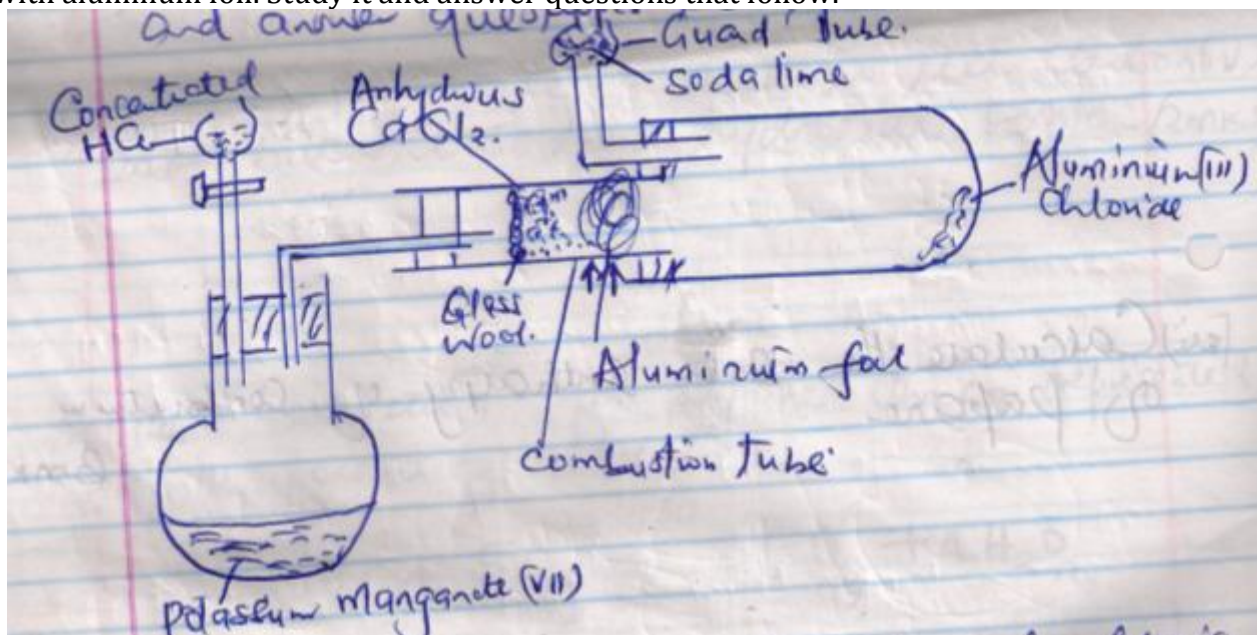
i.   In the experiment, concentrated hydrochloric acid and potassium manganate (VII) were used to prepare chlorine gas. State two precautions that should betaken in carrying out this experiment.(2mks)

ii.   Write a balanced equation for the reaction that took place in the round bottom flask.(1mk)

iii.   Write the formula of another compound that could be used instead of potassium manganate(VII).(1mk)

iv.   Explain why it is necessary to allow the acid to drip slowly onto potassium manganate (VII) before the aluminium foil is heated.(1mk)

v.   Write a balanced chemical equation for reaction taking place in combustion tube.(1mk)

vi.   State the property of the formed in the combustion tube that makes it possible for it to be collected in the receiver.(1mk)

(b) A student set-up apparatus as shown to prepare and collect dry ammonia gas
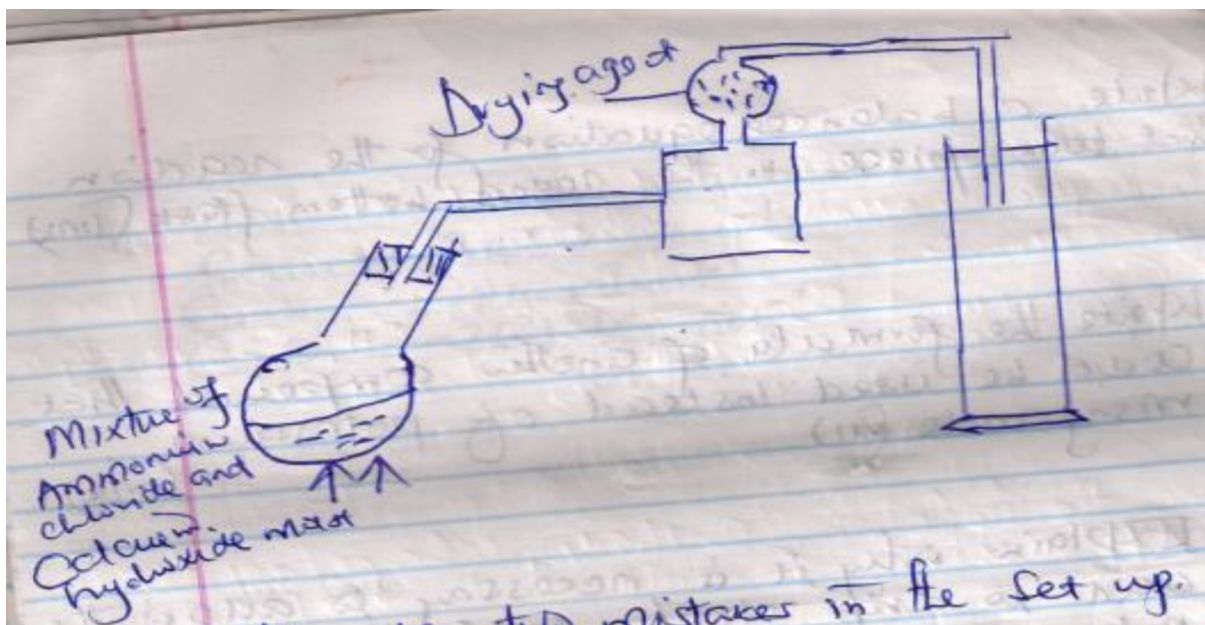
i.   Identify two mistakes in the set-up.
       (I)Mistake

       Reason

       (II)Mistake

Reason

ii.   Name a suitable drying agent of Ammonia(1mk)

iii.   Write a balanced chemical equation for the formation of ammonia gas.(1mk)

iv.   Describe a chemical test for ammonia gas.(1mk)

7. Study the flow chart below and answer the questions that follow.
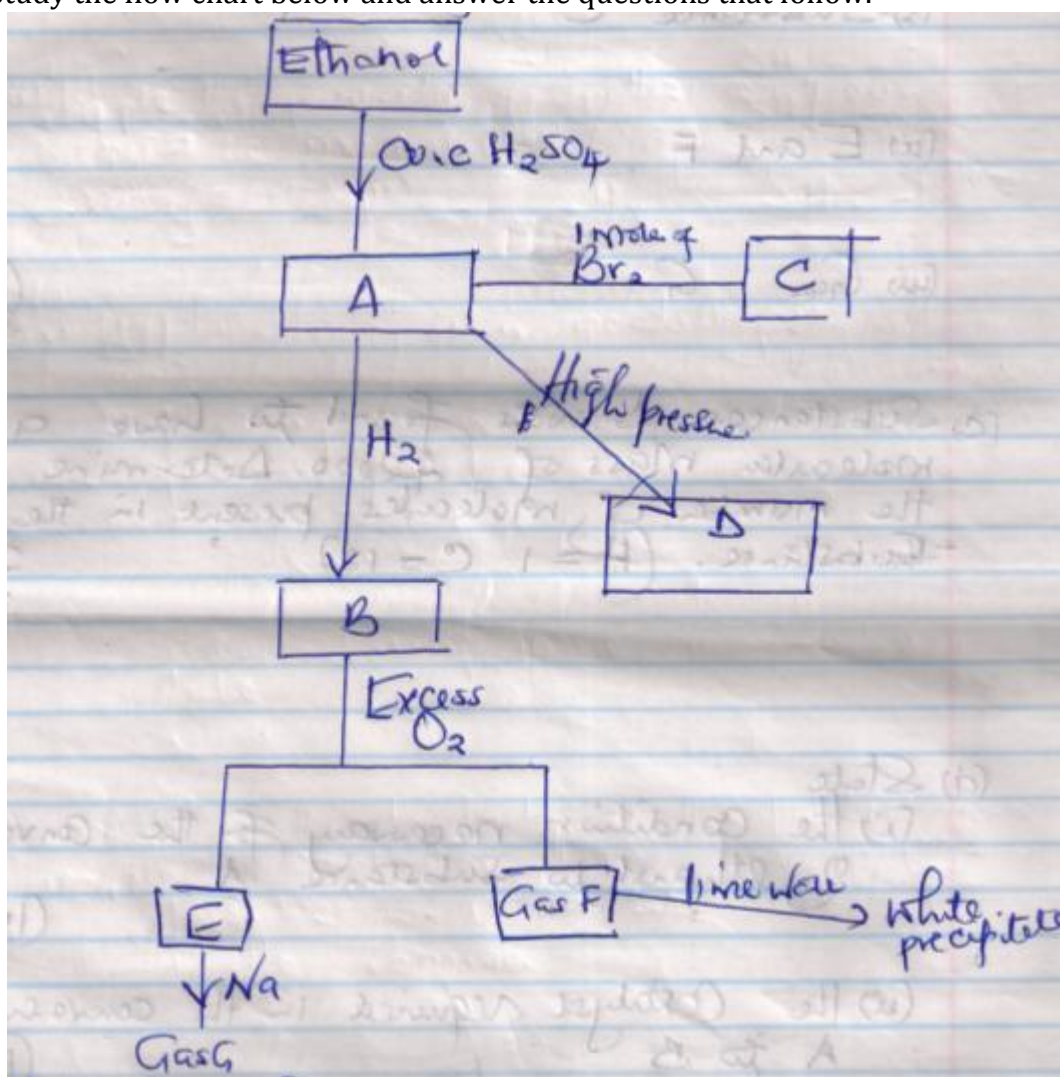
a. Identify substances

    A

    B

    F

    G   4mks

b. Write down the equation for the formation

i. Substance C

ii. E and F

iii. Gas G   3mks

c. Substance D was found to have a molecular mass of 42000. Determine the number of molecules present in the substance (H=1=12)   2mks

d. State ;
    i.   The condition necessary for the conversion of ethanol to substance A.(1mk)

    ii.   The catalyst required in the conversion A and B.(1mk)

FORM 4 ENDTERM 1 EXAMS

PHYSICS

NAME……………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

232/1

PHYSICS PAPER 1

TIME: 2 HOURS

<u>INSTRUCTIONS TO CANDIDATES</u>
   a) Write your name and admission number and class in the spaces provided above
   b) This paper consists of two sections A and B
   c) Answer all the questions in sections A and B in the spaces provided
   d) All working must be clearly shown
   e) Candidates should answer the questions in English.

SECTION A (25 marks)

Answer all the questions in this section in the spaces provided

1. Figure 1 below shows a part of Vernier calipers used to determine the length of a metallic cube. If the cube has a mass of 1533g.
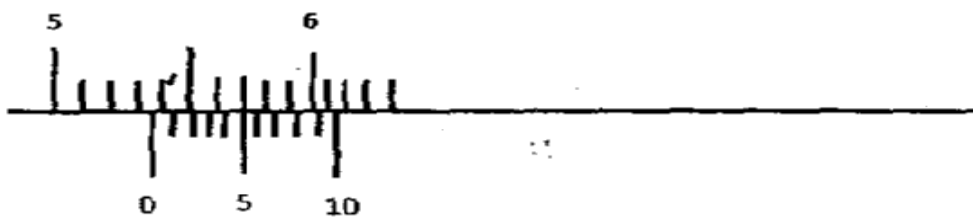
   Determine the density of the cubein g/cm³ (3marks)

2. Figure 2 below shows a mercury manometer. Some dry gas is trapped in one of the limbs.
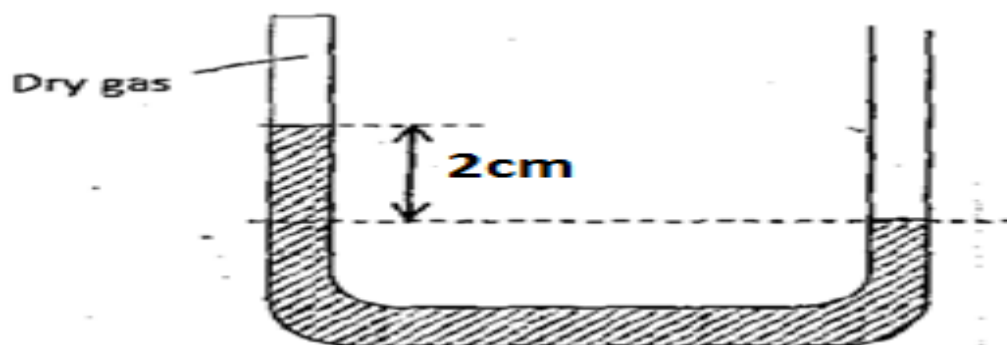
   Given that the atmospheric pressure is 76cm of mercury. Determine the pressure of the gas in mmHg   (3 marks)

3. When it is raining, it is advisable not to touch a canvas tent from inside. Explain. (1 mark)

4. State the reason why it is easier to separate water into drop than to separate a piece of solid into smaller pieces. (1 mark)

5. Figure 3 below shows a simple fire alarm.
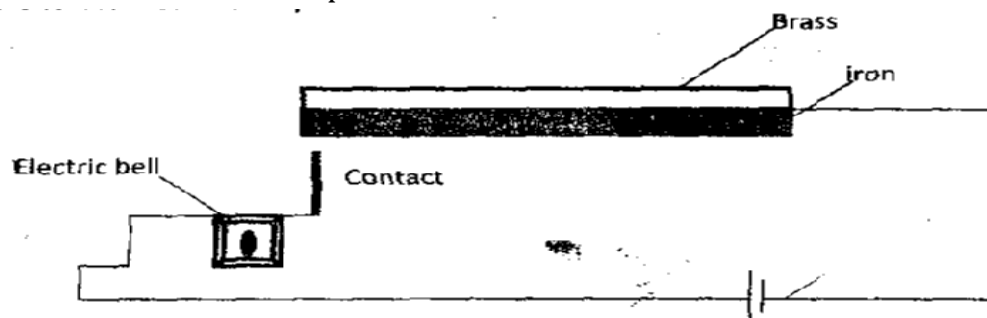
Explain how it works (2marks)

6. It feels hotter to sit on a metallic chair that has been left in the sun for a long time than wooden bench at the same temperature. Explain(2 marks)

7. State the principle of moments. (1 Mark)

8. A uniform meter rule of mass 10g is balanced by masses 24 g and 16g suspended at 0 cm mark and 100cm mark respectively. Determine the position of the pivot. (2 marks)

9. The figure below shows a compression spring, before and after a mass of 5kg was placed on it. Use it to answer questions 9, 10, and 11.
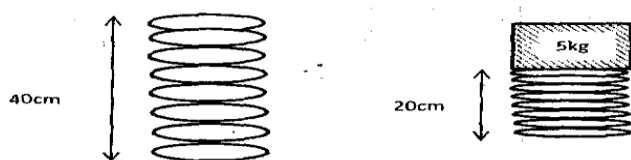
Find the spring constant of the spring. (3marks)

10. Sketch a graph of force against length if different masses were used in the above set up. (1 mark)
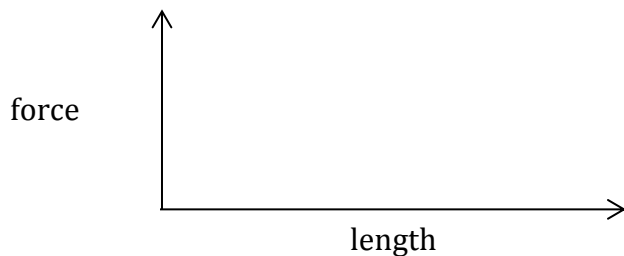
11. Explain the shape of the graph above (1 mark)

12. State Bernoulli's effect (1 mark)

13. a) Water flows through a pipe of different cross-section areas as shown in the diagram below. Indicate in the diagram the levels of water in tubes A, B and C. (1 mark)
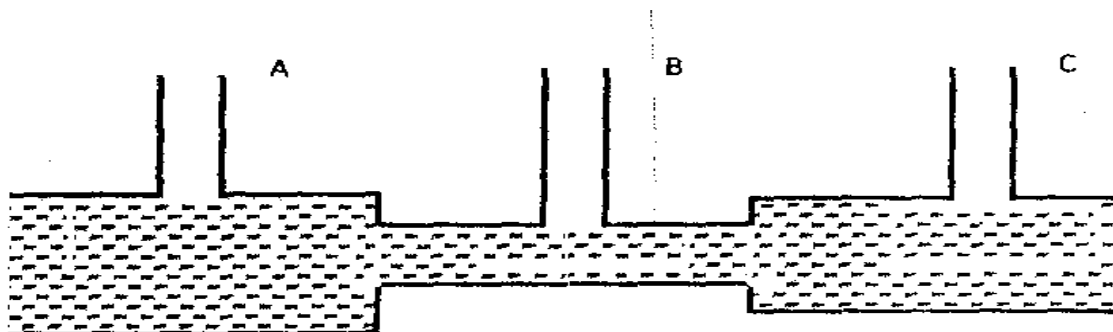
   b) Give a reason for your answer in 13(a) above. (1 mark)

14. i) An electric heater is placed at equal distances from two similar metal cans A and B filled with water at room temperature. The outer surface of can A is shiny while that of can B is dull black. State with reasons which can will be at a higher temperature after the heater is switched on for some time. (2marks)

ii) Sketch a graph of temperature against time for can A and B after the heater is switched off. (1 mark)

Temperature (°C) vs Time (s) graph with axes only.
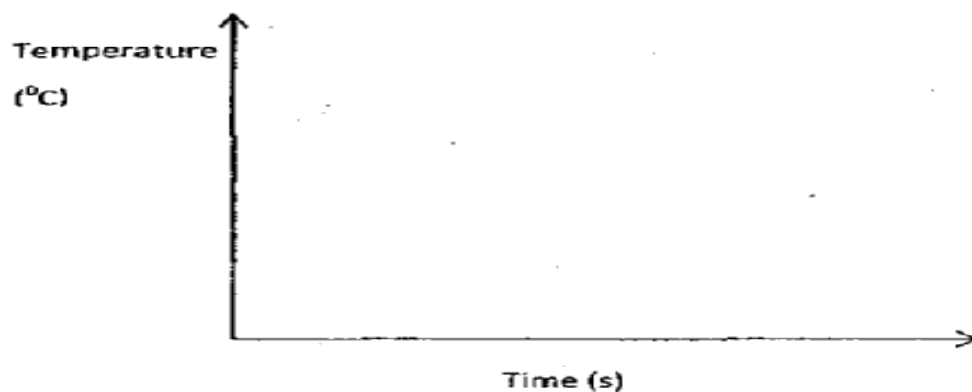
SECTION B: (55 marks)

15. a) State Charles' law. (1 mark)

b) The Set up below was used to verify Charles' law. Use it to answer the following questions.

Diagram labels: Stirrer, Capillary tube, Beaker, Rubber band, Water, Thermometer, HEAT
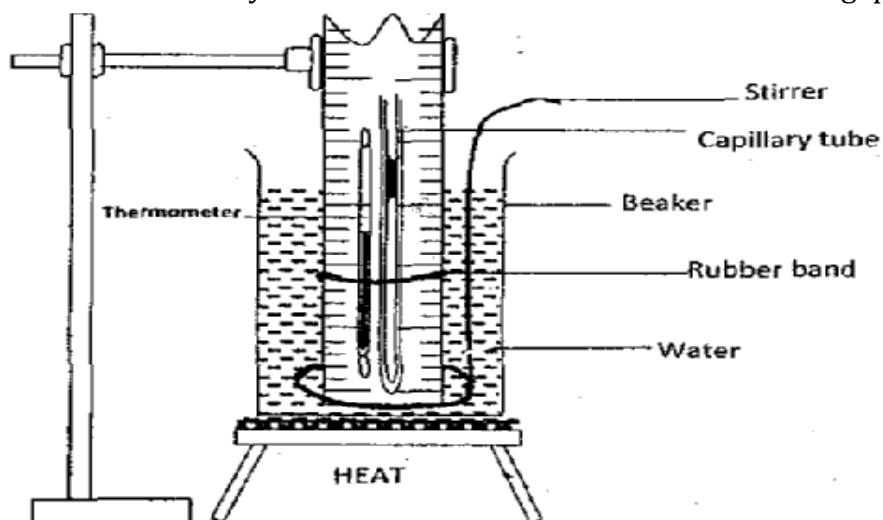
   i.   State two measurements taken from the above set up. (2marks)

   ii. Describe briefly how the set up above can be used to verify Charles's law. (3marks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

iii. State the function of sulphuric acid index. (1 mark)

iv. Pressure of the trapped air remains unchanged throughout the experiment. Explain how this is possible. (2marks)

v. A mass of 1200 cm³ of oxygen at 27^0 C and a pressure 1.2 atmosphere is compressed until its volume is 600 cm³ and its pressure is 3.0 atmospheres. Find the temperature of the gas after compression (2 marks)

16. (a) Define the term heat capacity. (1 mark).

(b) In experiment to determine the specific latent heat of vaporization Lv of water, steam was passed into cold water in a copper calorimeter. The following data was obtained:
Mass of calorimeter 105.2g
Mass of calorimeter + water =228.8 g
Mass of calorimeter + water + steam= 231.2g
Temperature of the cold water = 18^0C
Final temperature of the water=29^0 C

i) Determine the amount of steam that condensed. (1 mark)

ii) Calculate the amount of heat lost by the condensed steam. (specific heat capacity of water=4200J/Kg/K) (3 marks)

iii) Calculate the amount of heat absorbed by water and the calorimeter (specific heat capacity of copper = 390J/kg/K) (3marks)

iv) Calculate the specific latent heat of vaporization Lv of water.   (2 marks)

v) Explain why cooling the water used in the calorimeter to below room temperature could have led to more accurate result. (1 mark)

17.   a) Distinguish between elastic collision and inelastic collision. (1 mark)

        b) A van of mass 1500 kg travelling at a constant velocity of 72 km/h collides with a stationary   car of mass 900kg. The impact takes 2 seconds before they move together at a constant   velocity for 20 seconds. Calculate:
    i)   Their common velocity (3marks)

ii)   The distance moved after the impact.(2marks)

iii)   The impulsive force (3marks)

iv)   The change in kinetic energy (3marks)

v)   Why is the kinetic energy not conserved in this collision (1 mark)

18. a) Define angular velocity. (1 mark).

b) Figure 4 below shows a mass 500g moving in vertical circle having a radius of 35cm at a constant velocity. It makes 2 revolutions in one second.
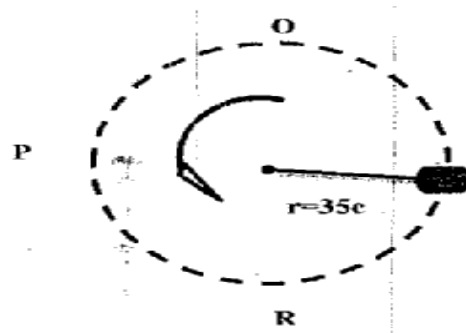
i) Indicate on the diagram the direction of centripetal force. (1 mark)

ii) Calculate the linear velocity of the mass. (3marks)

iii) Calculate the centripetal acceleration of the object. (2marks)

iv) Determine the centripetal force. (3marks)

v) Giving a reason, state the point at which the string is likely to snap. (2mark)

19.   a) State the law of conservation of energy. (1 mark)

b) Figures4 below shows a ball of mass of 5kg rolling along a frictionless path as shown.
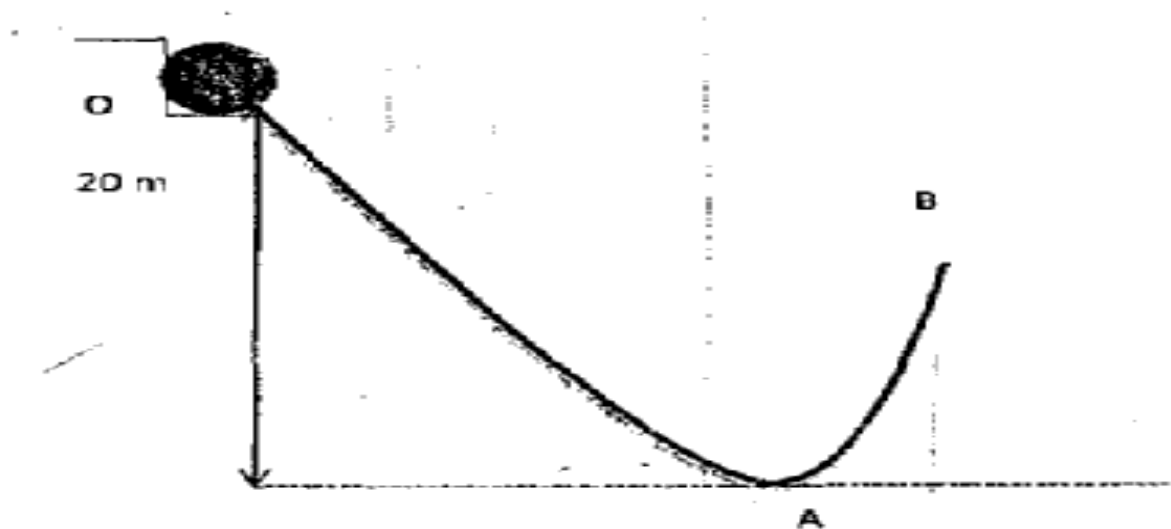
i.   Calculate the potential energy of the ball at point O. (2 marks)

ii.   Determine the velocity of the ball at point A (2 marks)

iii. If the ball rolls back when it reaches point B, state the energy changes that takes place O to B. (1 mark)

iv. It is observed that the efficiency of the machine increases when it is used to lift large loads. Give a reason for this (1 mark)

FORM 4 ENDTERM 1 EXAMS

PHYSICS

NAME…………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

232/2

PHYSICS

PAPER 2

(THEORY)

TIME:2 HOURS

Instructions to candidates.

a. Write your name and index number in the spaces provide above.
b. This paper consists of two sections A and B.
c. Answer all questions in section A and Bin the spaces provided.
d. All working must be clearly shown in the spaces provided.
e. Non-programmable silent calculators and KNEC mathematics tables may be used.
   FOR EXAMINERS USE ONLY.

SECTION	question	Maximum score	Candidates score
A	1-12	25	
B		10	
	13-17	10	
		12	
		15	
Total		80	

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION A(25MKS)

ANSWER ALL QUESTIONS IN THIS SECTION IN THE SPACES PROVIDED.

1. Figure 1 shows a point object O in front of a plane mirror M.

Figure 1
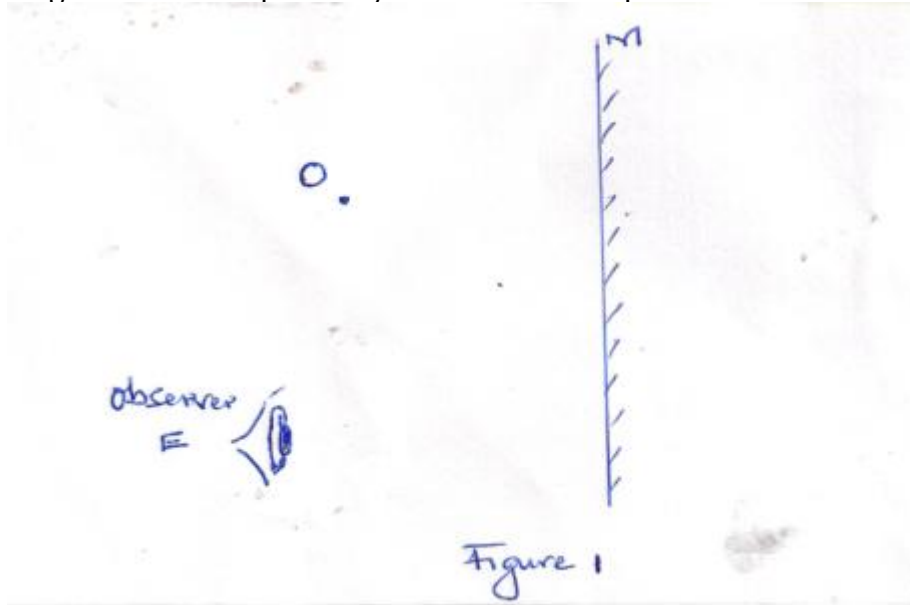
On the same diagram locate the position of the image as observed by the observer E. 3mks

2. A positively charged sphere is suspended by an insulating thread .A negatively charged conductor is suspended near it. The conductor is first attracted ,after touching the sphere it is repelled .Explain this observation.(2mks)

3. A current of 0.5 A flows through an electric circuit. Determine the quantity of change that passes a point in the circuit in 6 minutes.(2mks)

Figure 2 shows a wire wound on a magnetic material, and then connected to direct current source. Use to answer question 4 and 5.
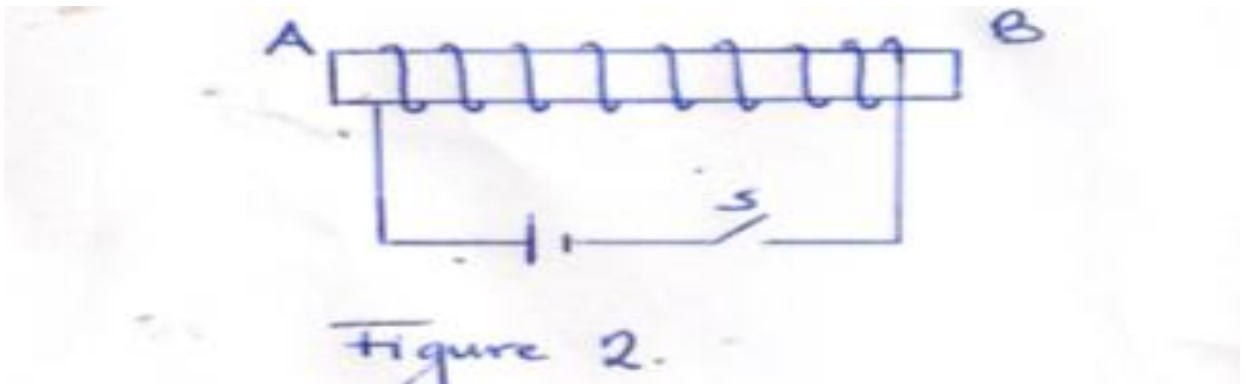
Figure 2.

4. Determine the polarity of A and B when the switch is closed.(1mk)

5. State two ways of increasing the strength of the magnet formed through the method in number 4.(2mks)

6. An object is placed in front of a concave mirror as shown in figure 3.
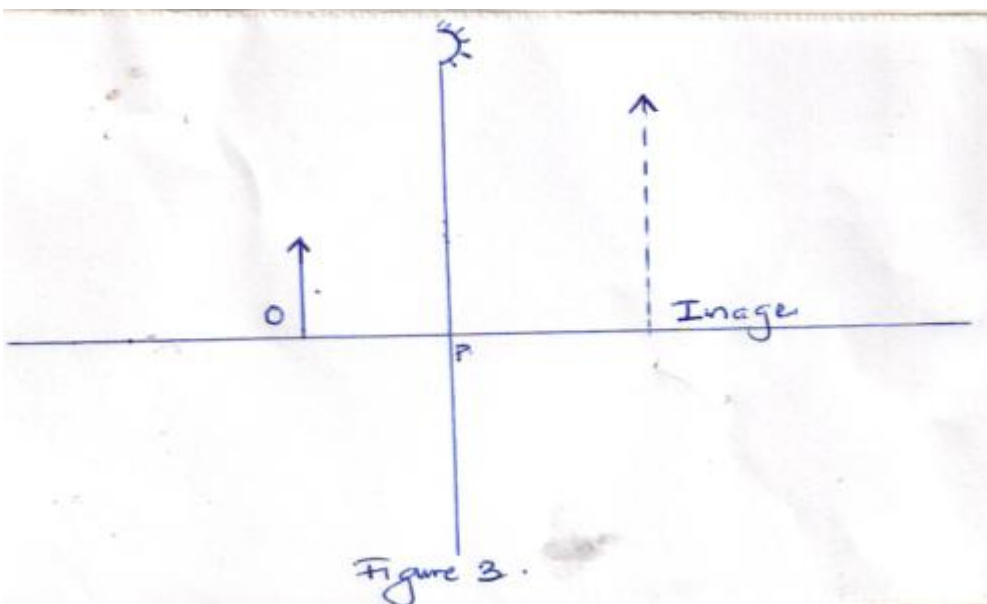
Figure 3.

The image of the object is formed as shown above. Locate the principal focus of the mirror and determine its focal length.(3mks)

7. Figure 4 shows a displacement time graph of a wave travelling at 200 cm/s.

Figure 4e.
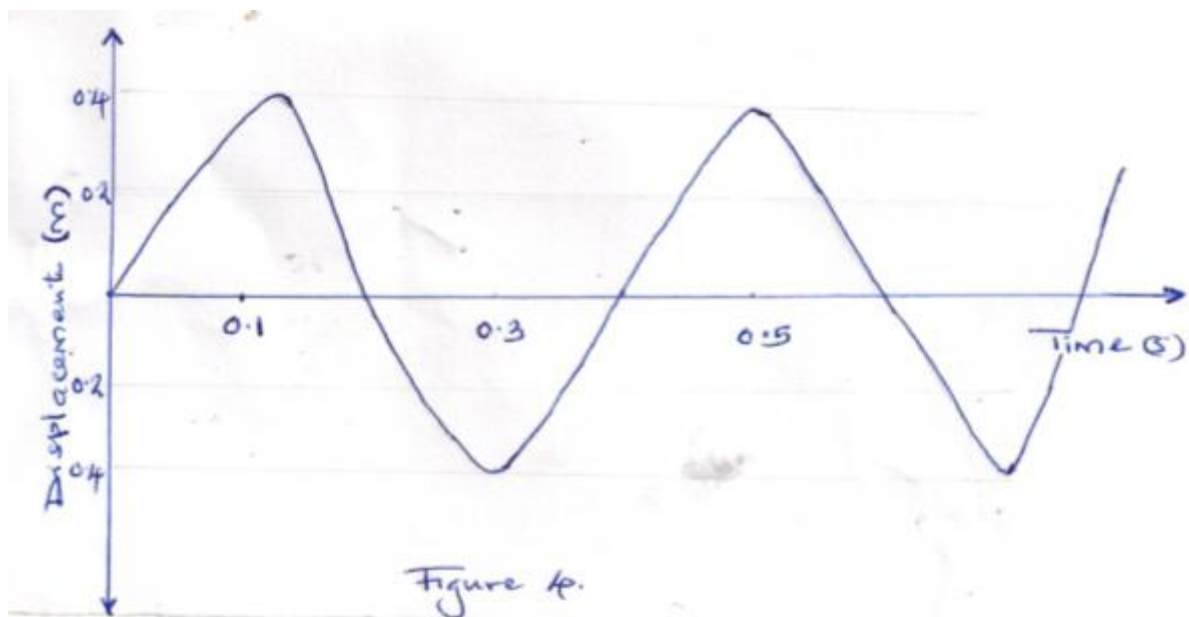
Determine the wavelength of the wave.(3mks)

8. A solder standing between two cliffs fires a gun. He heard the first echo after 2.0 seconds and the next 5.0 seconds later. Determine the distance between the two cliffs.(Speed of sound in air is 320 m/s.(3mks)

9. An electric heater rated 1.5 kw, 240 v is used to heat water for 6 minutes. Determine the energy consumed by the heater in this time.(2mks)

10. State two conditions necessary for two progressive waves moving in opposite direction to produce a stationary wave.(2mks)

11. Arrange the following radiations in order of decreasing wavelength.
    Gamma rays, visible light, Radio waves, ultraviolet radiation.(1mk)

12. State one detector of Gamma rays.(1mk)

(SECTION B:55 MARKS)

Answer all questions in this section in the spaces provided.

13. (a) Sate what is meant by the term " electromagnet"(1mk)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

(b) Figure 5 shows a simple electric motor.
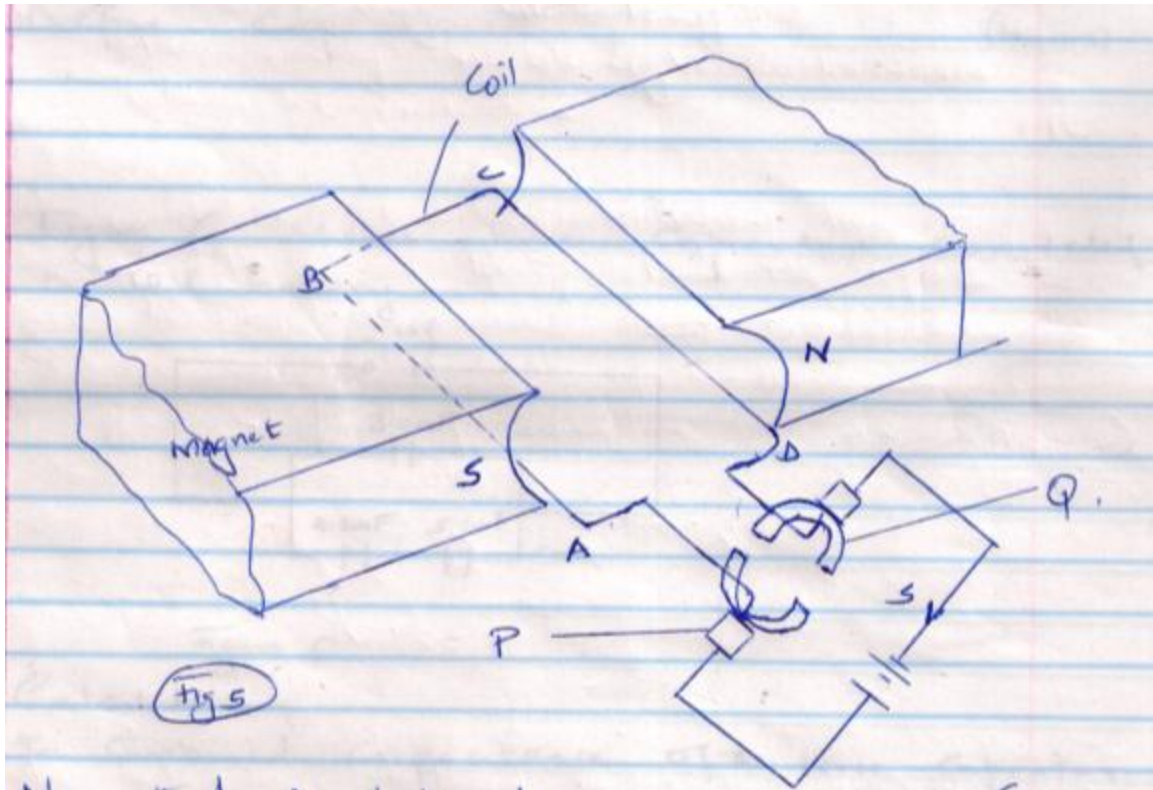
ii.   Name the parts labeled
        P-
        Q-
iii.   The switch s is closed ,indicate the direction of current in the coil and how the motor works.(4mks)

iv.   State three ways in which the speed of the motor can be increased.(3mks)

14. (a) Define capacitance.(1mk)

(b) Figure 6 shows three capacitors connected to 10V battery .

Figure 6.
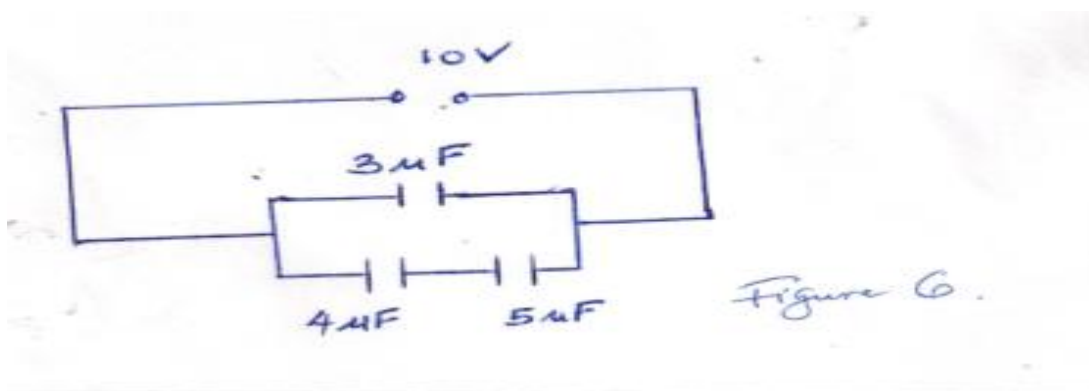
Calculate

i.   The combined capacitance of the three capacitors.(3mks)

ii.   The change on the 5.0 μF capacitor.(3mks)

15. (a) State what is meant by " refractive index".(1mk)

(b) In an experiment to determine the refractive index of a liquid, a student measured the real and apparent depths of a coin in a beaker.
The results were as shown.

Real depth(cm)	5	10	15	20	25
Apparent depth (cm)	3.3	6.7	10	13.3	16.7

i.   **Plot the graph of real depth against apparent depth.(5mks)**

ii.   From the graph ,determine the refractive index of the liquid.(3mks)

(c)Figure 7 shows a ray of light incident on glass air interface.
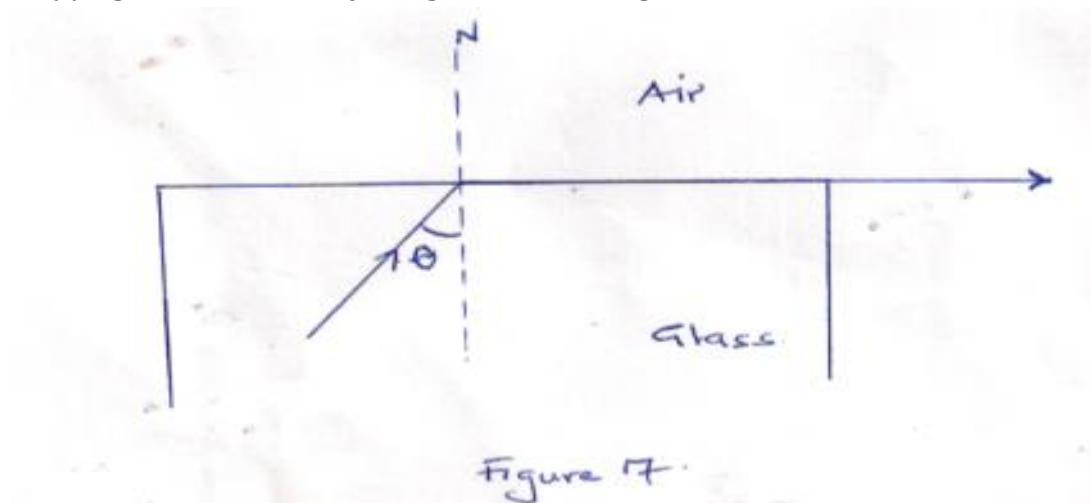
Figure 7

Given that the refractive index of glass is 1.6, determine angle O.(3mks)

16. (a) Figure 8 shows an object in front of a convex lens of focal length 10cm.
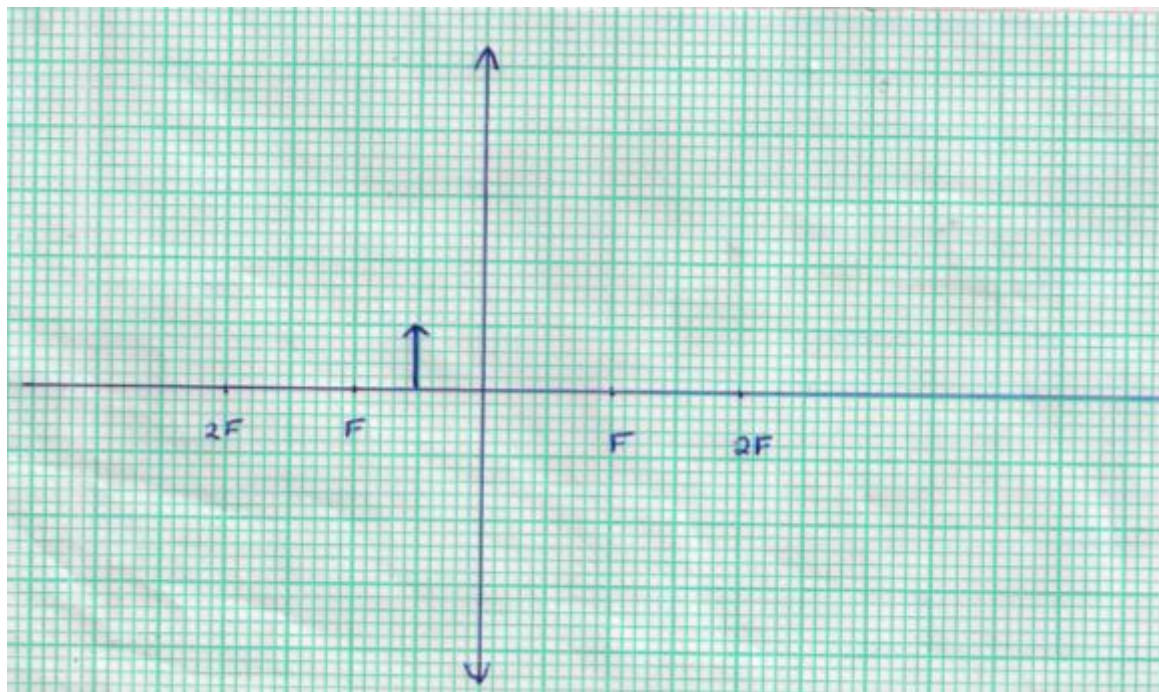
i.   On the same figure draw a ray diagram showing the location of image .(4mks)
        Use the ray diagram drawn in (i) above to determine the

ii.   Image distance   (2mks)

iii.   The magnification(2mks)

(b) A vertical object is placed 20cm in front of a convex lens of focal length 5cm.

i. Determine

I the image distance   (3mks)

II the magnification   (2mks)

ii.State two characteristics of the image (2mks)

17. (a) Figure 9 shows a cell in series with a 3 resistor and a switch .A high resistance voltmeter is connected across the cell.

Figure 9.
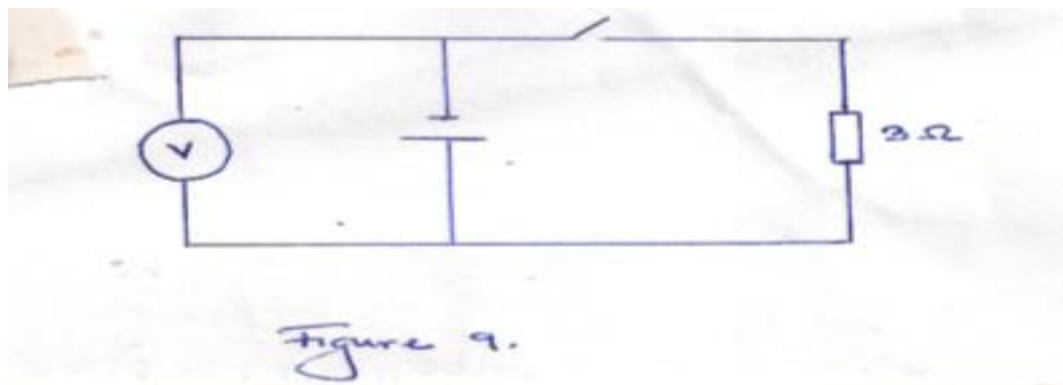
The voltmeter reads 1.5v with switch open and 1.2 v with the switch closed.(1mk)

i. State the e.m.f of the cell.(1mk)

ii. Determine the current through the 3 resistance of the cell.(2mks)

(b) Another resistor R is connected in series with the 3 resistor so that a current of 0.15 A flows when the switch is closed. Determine the resistance R.(3mks)

FORM 4 ENDTERM 1 EXAMS
CHRISTIAN RELIGIOUS EDUCATION

NAME…………………………………………………ADM……….CLASS……………

CLASS : …………………SIGNATURE…………………DATE: …………………………

CRE PAPER 1
TIME: 21/2HOURS
ANSWER ANY FIVE QUESTIONS

1. (a) Identify seven teachings on the relation between human beings and the environment from Genesis stories of creation.
   (7mks)
   (b) With reference to the story of the fall of human in Genesis 3, state the effects of sin on Adam and Eve.
   (8mks)
   (c) State five consequences of breaking taboos in traditional Africa communities.
   (5mks)

2. (a) Describe the covenant ceremony between God and Abraham. (Genesis 15:1-9)
   (8mks)
   (b) State the characteristics of the covenant between God and Abraham.
   (7mks)
   (c) Identify five lessons that Christians learn about God from the call of Abraham.
   (5mks)

3. (a) Describe the contest between prophet Elijah and prophet of Baal at Mount Carmel (1st Kings 18:17-40)
   (   )
   (b) State seven problems faced by Prophet Elijah in Israel.
   (7mks)
   (c) Identify qualities of Prophet Elijah that a Christian leader should posses.(

4. (a) State five ways in which prophetic messages were compiled.
   (5mks)
   (b) Outline the message of hope that prophet Amos gave to Israel if they turned to God.
   (7mks)
   (c) Give reasons why Christians repent their sins.
   (8mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

5. (a) Outline six response that Jeremiah made to God during his call Jere 1:4-19
   (6mks)
   (b) Show how the letter Jeremiah wrote to the exiles gave them hope for restoration. Jere. 29;4-15

   (7mks)
   (c) Suggest seven reasons why Christians should accept pain and suffering in their daily lives.
   (7mks)

6. (a) Name the specialists in traditional African Communities.
   (5mks)
   (b) Explain reasons why cleansing rituals were performed in Traditional African Communities.

   (8mks)
   (c) Outline seven reasons why the church is opposed to female genital mutilation. (F.G.M.)
   (7mks)

FORM 4 ENDTERM 1 EXAMS

CHRISTIAN RELIGIOUS EDUCATION

NAME...ADM..........CLASS..............

CLASS : ....SIGNATURE......................DATE: ....

313/2
CHRISTIAN RELIGIOUS EDUCATION
PAPER 2
TIME: 2 ½ HOURS

Answer any five questions from this paper.

1. (a) Outline Isaiah's prophecy on the suffering servant. (Isaiah 53)   (7 mks)

   (b) Describe the annunciation of the birth of John the Baptist (Luke 1:5-25)   (8 mks)

   (c) State five ways in which a Christian couple should respond to childlessness.   (5 mks)

2. (a) Describe the commissioning of the Twelve Disciples of Jesus according to Luke 9:1-9
                                                                                    (8 mks)
   (b) Give six reasons why Jesus faced opposition from the Pharisees and the scribes during his
        Galilean ministry.   (6 mks)

   (c) State six ways in which Christians are taking care of the needy.   (6 mks)

3. (a) Outline the preparations made towards the celebration of the last supper.   (7 mks)

   (b) Relate the parable of the prodigal son Luke 15:11-32.   (7 mks)

   (c) State the lessons learnt about God from the parable of the prodigal son.   (6 mks)

4. (a) Outline Paul's instructions on the use of spiritual gifts for the purpose of order in the
church.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

(b) In what ways was unity demonstrated by Christians in the early church? (7 mks)

(c) State six factors that threaten unity in the church today. (6 mks)

5. (a) Describe the call of the first disciples of Jesus. (7 mks)

(b) Give reasons why Christians should observe Jesus teaching on the cost of discipleship. (5 mks)

(c) With reference to the sermon on the plain describe four teachings of Jesus from the beatitudes. (8 mks)

6. (a) Describe the body of Christ(Corinthians 12:12-27) (8 mks)

(b) What lessons can Christians learn from the events of the day of Pentecost? (5 mks)

(c) Outline seven ways in which the gift of prophecy is used in the church today. (7 mks)

FORM 4 ENDTERM 1 EXAMS
GEOGRAPHY

NAME…………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

312/1

GEOGRAPHY

PAPER 1

Term 1

INSTRUCTIONS TO CANDIDATES

This paper has two sections A and B

Answer all the questions in Section A

Answer question 6 and any other two questions from Section B

All answers must be written in the answer booklet provided

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION A: (25 MARKS)

Answer all the questions in this section.

1. a) When the local time is 2.00pm at longitude 450E, what is the longitude of a place whose local time is 8.00pm? (2mks)

b) Name three forces responsible for the spheroid shape of the earth. (3mks)

2. a) Name the two scales used to measures the intensity of an earthquake. (2mks)

b) State any two human causes of earthquake. (2mks)

3. a) A part from the core name two other layers that make up the internal structure of the earth. (2mks)

b) Give three characteristics of the core. (3mks)

4 a) Name two features formed due to faulting. (2mks)

b) State two effects of faulting on drainage. (2mks)

5. a) Differentiate between weathering and mass wasting. (2mks)

b) State two negative effects of mass wasting. (2mks)

c) What factors determine the speed of mass wasting? (3mks)

SECTION B

Answer question 6 and any other TWO questions from this section.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

6. Study the map of Migwani 1:50,000 (sheet 151/1) provided and answer the following questions.

(a (i) What is the altitude of the lowest contour shown on the map?   (1 mark)

(ii)Give the six-figure grid reference of Mboni dam.   (2 marks)

(iii)What is the length in Kilometres of the All Weather Road Bound Surface C94 from the junction with the Dry Weather Road D502 to Northing 84? (2 marks)

(b)   Draw a rectangle measuring 10 cm by 8 cm to represent the area enclosed by Eastings 90 and 00 and Northings 62 and 70.   (1 mark)

On the rectangle, mark and name the following features:

(i)   Musengo school

(ii)   Road E742

  (iii)   Kitui Hills

                                                                                    (3 marks)

(c) (i) Citing evidence from the map, identify four social services offered in Mutitu (Ndooa) township.   (4 marks)

   (ii) Describe the relief of the area covered by the map.   (6 marks)

(d)Describe the characteristics of the long profile of river Ikoo.   (6 marks)

7. (a)(i) Define the term Aridity   (2marks)

ii) Name three types of deserts in term of appearance   (3marks)

(b) List two factors that contribute to the development of deserts.   (2marks)

   (c)Explain three factors influencing wind transportation   (6marks)

   (d) Describe how the following desert features are formed.

(i) Rock pedestal   (3marks)

(ii) Zeugen   (3marks)

(e) State any six significance of desert feature to human activities.   (6marks)

8. a) i) Distinguish between soil profile and soil catena.   (2mks)

ii) State two importance of minerals (inorganic matter) in the soil.   (2mks)

iii) Give three importance of humus in the soil   (3 mks)

b. i) Explain how the following factors influence soil formation:

a)   Climate   (3mks)

b)   Living organism   (3mks)

c) Describe calcification as a leaching process in soil formation.   (3mks)

d) i) What is soil degeneration?   (1mk)

ii) Identify two types of soil degeneration.   (2mks)

e) Explain three ways in which vegetation protects the soil from degeneration.   (6mks)

9. (a)(i) What is a rock? (2 marks)

(ii) State two reasons why sedimentary rocks are wide spread in the coastal plain. (2 marks)

b) (i) State four changes that may occur in sedimentary rocks when they are subjected to intense heat and pressure.   (4 marks)

(ii) Describe three processes through which sedimentary rocks change into metamorphic rocks.
                                                                    (6 marks)

c) Describe how coral rocks are formed.   (5 marks)

d) Suppose you were to carry out a field study of rocks within your school vicinity.

   i) Name three secondary sources of information you would use to prepare for the field study.
                                                                    (3 marks)

  ii) State three activities you would carry out during the field study.   (3 marks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

10.(a) (i) Differentiate between a spring and a well .   (2 marks)

     (ii) State four conditions favouring formation of artesian well.   (4 marks)

  b.(i) What is a Karst scenery?   (2 marks)

   (ii) Name five features formed on the surface in a Karst area.   (5 marks)

  c. With the aid of well labeled diagrams describe how a limestone pillar is formed. (6 marks)

  d) Explain the significance of Karst scenery to human economic activities.   (6 marks)

FORM 4 ENDTERM 1 EXAMS
GEOGRAPHY

NAME………………………………………………**ADM**……….**CLASS**……………

CLASS : ……………………**SIGNATURE**……………………**DATE:** …………………………

312/2

END OF TERM 1

PAPER 2

INSTRUCTIONS TO CANDIDATES.

1. ANSWER ALL QUESTIONS IN SECTION A.
2. ALL ANSWERS MUST BE WRITTEN IN THE SPACES PROVIDED.
3. ANSWERS SHOULD BE WRITTEN IN ENGLISH.
4. IN SECTION B ANSWER QUESTION 6 AND ANY OTHER 2 QUESTIONS.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION A: ANSWER ALL THE QUESTIONS

1. (a) Name two areas where gold is mined in South Africa   (2 mks)

    (b)State 3 ways in which mining create employment in Kenya   (3 mks)

2. (a)Define the following terms;

    (i)   land reclamation

    (ii)   Land rehabilitation

    (iii)   Irrigation   (3 mks)

    (b) Give 2 methods that are used to drain swamps in Kenya   (2 mks)

3. (a)Name 2 physical factors that influence growth of palm oil in Nigeria (2 mks)

    (b)State 3 uses of palm oil tree in Nigeria   (3 mks)

4. (a)Give 3 benefits of delta plan project of reclaiming land in Netherlands (3 mks)

    (b)State 2 reasons for planting reeds while reclaiming land in Netherlands (2 mks)

5. (a)Define the term wildlife   (2 mks)

    (b)Identify 3 factors that influence distribution of wildlife   (3 mks

SECTION B: ANSWER QUESTION 6 AND ANY OTHER 2 QUESTIONS FROM THIS SECTION

6. (a) The table below shows the methods used in land reclamation by sub counties

Method of land reclamation	Number of sub counties
irrigation	70
Drainage of swamps	80
Tsetse fly control	45
afforestation	15
others	30
total	240

(i)Using a scale of 1cm represent 15 sub counties draw a divided rectangle to represent the data above   (8 mks)

(ii)State 3 disadvantages of using the above method to present the data   (2 mks)

(b)Describe 3 methods of controlling tsetse flies in Kenya   (6 mks)

(c)Outline 4 methods of rehabilitating land in Kenya   (4 mks)

(d)Outline the steps followed when reclaiming land in Netherlands   (5 mks)

7. (a)Describe 3 factors that influence fishing in Japan   (6 mks)

   (b)Describe the Lampara method of fishing   (6 mks)

   (c)Explain 4 ways in which fishing promotes the development of industries   (8 mks)

   (d)A field study was conducted on fishing in Lake Naivasha

       (i)List 3 common fish species the study would have noted   (3 mks)
       (ii)Give 2 main problems the study would have noted facing fishing in Lake Naivasha
       (2mks)

8. (a)(i)Name 2 provinces where forests are found in Canada   (2 mks)

       (ii)Give 3 tree species found in Canada   (3 mks)

   (b)Explain 3 ways in which the transportation of logs in Canada differs from Kenya   (6 mks)

   (c)Explain 4 problems that face forestry in Canada   (8 mks)

   (d)A form 4 class conducted a field study in a forested region in the area around their school.

    (i)Identify 2 main categories of hypotheses that the students would have formulated   (2mks)

    (ii)Give 4 activities that the students would have been involved in during the study   (4 mks)

   9. (a)Explain 3 human factors that led to the establishment of Mwea-Tebere irrigation scheme (6
                                                                                         mks)

   (b)(i)Apart from rice,name 3 other crops that are grown in Mwea irrigation scheme   (3 mks)

      (ii)Explain 2 ways in which pests and diseases as a problem facing the irrigation scheme

        Can be solved. (4 mks)

   (c)Explain 3 benefits of Perkerra irrigation scheme   (6 mks)

   (d)State 6 problems facing Perkerra irrigation scheme   (6 mks)

10.(a)Identify 3 areas in Kenya where maize is grown on large scale   (3 mks)

   (b)Explain how the following factors favour wheat growing

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

(i)Climate (4 mks)

(ii)labour (4 mks)

(c)Explain 3 ways in which harvesting of wheat in Kenya differ from that of Canada   (6 mks)

 (d)A field study was conducted on wheat growing by an exchange programme of Kenyan

students in Canada.

(i)   Identify 2 ports through which wheat harvested in Canada is exported through, the students would have noted. (2mks)

(ii)Name 2 varieties of wheat that the students would have noted (2mks)

(iii)Give 2 reasons why the students would have made use of sampling technique (2mks)

(iv)Name 2 wheat growing provinces the students would have visited (2mks)

FORM 4 ENDTERM 1 EXAMS
HISTORY &GOVERNMENT

NAME…………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

311/1

HISTORY AND GOVERNMENT

PAPER 1

TIME: 2½ hours

NAME _____Adm. No _____

Instructions to candidates

a)   This paper consists of three sections: A,B and C

b)   Answer <u>all</u> the questions in section A,<u>THREE </u>questions from section B and two questions from section C.

C)   Answers to all the questions **<u>must</u>** be written in the answer booklet provided.

d)   Candidates should check the question paper to ascertain that no questions are missing.

e)   Candidates should answer the questions in English.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION A(25MKS)

Answer all the questions in this section in the answer booklet provided.

1. Identify one branch in the study of History and Government of Kenya. (1mk)

2. Name two Bantu groups in Kenya which settled in Mount Elgon area before migrating to their present Homeland. (2mk)

3. Give two reasons why Kenyan communities fought against each other during the pre-colonial period. (2mks

4) State two duties of the Orkoiyot among the Nandi. (2mks)

5) Give two evidences which shows that the early visitors reached the Kenyan coast before the 15th century. (2mks)

6) Give two reasons why slave trade increased during the time of Seyyid Said. (2mks)

7) Name one person who qualifies for citizenship by registration in Kenya. (1mk)

8 Name the documents which contains the right of citizen in Kenya. (1mk)

9 Give two ways the education system in Kenya promotes national Unity. (2mks)

10 State two provisions of the independence constitution of Kenya. (2mk)

11 State two rights of a child as contained in children Act. (2mks)

12 Name the treaty which marked the spheres of influence in East Africa in 1886. (1mk)

13 Identify the MAIN features' of the system of education in Kenya during the colonial period. (1mk)

14 Give one role of welfare organization in Kenya during the colonial period. (1mk)

15) Name one African political party whose leaders attended the 2nd Lancaster House Conference in 1962. (1mk)

16) What was the main contribution of Thomas Joseph Mboya to the history of Kenya? (1mk)

17 Give one special court in Kenya. (1mk)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION B. (45MKS)

Answer any three questions from this section in the answer booklet provided.

18(a) Why did the highland Nilotes migrate from their original homeland during the pre-colonial period   (5mks)

(b)   Describe the socio-political organization of the Borana in Kenya during the pre-colonial period.   (10mks)

19(a) Give three factors which contributed to the development of trade between the Kenyan coast and the outside world by the 16th century.   (3mks)

(b)   Describe the effects of long distance trade in Kenya during the 19th century.
                                                                     (12mks)

20(a) Identify <u>three</u> terms of the Devonshire White Paper.   (3mks)

(b)   Explain <u>six</u> Negative effects of colonial land policies in Kenya during the colonial period. (12mks)

21(a) State five demands made by the East African Association (EAA) to the British colonial Government in Kenya.   (5mks)

(b)   Describe five roles played by Thomas Joseph Mboya in the development of trade union movement in Kenya.   (10mks)

SECTION C (30MKS)

22(a) State five circumstances that can make a Kenyan citizen to be denied the right to life. (5mks)

(b)   Describe the process of resolving a conflict.   (10mks)

23(a) What are the functions of the defence forces in Kenya?   (5mks)

(b)   Why should there be separation of powers between the legislature,Executive and Judiciary in Kenya.   (10mks)

24(a) What five situations can make a registered voter in Kenya be denied the right to vote?
                                                                     (5mks)

(b)   Explain the rights of an accused person during trial in a court of Law.   (10mks)

FORM 4 ENDTERM 1 EXAMS
HISTORY &GOVERNMENT

NAME……………………………………………………ADM……….CLASS……………

CLASS : …………………….SIGNATURE…………………….DATE: …………………………

HISTORY AND GOVERNMENT PAPER 2

TERM I

SECTION A:

ATTEMPT ALL QUESTIONS IN THIS SECTION   (25 MARKS)

1. Identify two characteristics of a government   (2mks)

2. Give two demerits of oral traditions as source of History and Government   (2mks)

3. Identify the main features in development of man during the middle stone age period
                                                                                    (1mk)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

4. Name two countries that were colonized by the Portuguese in Africa in the 19th century
(2mks)

5. Name two communes in Senegal where the policy of Assimilation was successful
(2mks)

6. Name the British engineer who pioneered the construct of tarmac Roads   (1mk)

7. State two uses of the wheel in the ancient Mesopotamia   (2mks)

8. Identify two trade goods for North Africa during the Trans-Sahara trade
(2mks)

9. State two major contributions of religion in the maji maji uprising   (2mks)

10. State two inventions which contributed to the Agrarian Revolution in U.S.A   (2mks)

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11. Give the main cause of the cold war   (1mk)

12. Give the main function of the golden stool in the Asante Empire in the pre-colonial era
                                                                                     (1mk)

13. Identify two ways in which Industrial Revolution contributed to colonization of Africa by
    the Europeans   (2mks)

14. State two types of early Roads   (2mks)

15. Define the term Pan-Africanism   (1mk)

SECTION B (45 MARKS)

Answer any three questions from this section

16 (a) Name three South African leaders who have been awarded the Nobel Peace prize
       (3mks)

   (b) Explain six challenges faced by African Nationalist in their struggle for Independence
                                                                                     (12mks)

17 (a) State five characteristics of Industrial Revolution in Europe   (5mks)

(b) Explain five factors that hinders Industrialization in developing countries (10mks)

18(a) State three duties of the Omanhene of the Asante Kingdom   (3mks)

(b)   Explain six results of Buganda collaboration with the British in the 19th Century
                                                                        (12mks)

19(a) State three conditions Africans had to fulfill to become fully assimilated in French
West Africa   (3mks)

(b) Explain six factors which undermined the application of the French Policy of
assimilation in West Africa   (12mks)

SECTION C (30 MARKS)

Answer any two questions from this section

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

20   (a)   State five features of the cold war   (5mks)

      (b)   What were effects of the cold war on international relations?   (10mks)

21.   (a)   Give three reasons why non-aligned movement was formed   (3mks)

      (b)   Explain six factors that affected the performance of NAM   (12mks)

22.   (a)   List five Achievements of the league of Nations   (5mks)

       (b)   Explain 5 reasons why the league of Nations failed to maintain world peace
                                                                    (10mks)

FORM 4 ENDTERM 1 EXAMS

AGRICULTURE

NAME………………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

AGRICULTURE

PAPER 1

TIME: 2 HOURS

INSTRUCTIONS TO CANDIDATES:

a) Write your name and index number in the spaces provided above.
b) Sign and write the date of examination in the spaces provided above.
c) This paper consists of THREE sections A, B and C.
d) Answer all questions in section A and B.
e) Answer any TWO in section C.
f) All answers must be written in the spaces provided.
g) This paper consists of 9 Printed pages.
h) Candidates should check the question paper to ascertain that all the pages are printed as indicated and that no questions are missing.

FOR EXAMINERS USE ONLY

SECTION	Question	Maximum score	Candidate's score
A	1-17	30	
B	18-21	20	
C	22-24	40	
TOTAL SCORE		90	

SECTION A

ANSWER ALL QUESTIONS INTHIS SECTION IN THE SPACES PROVIDED.

1. State two roles of soil micro-organisms that are beneficial to plants.(1mk)

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    ……………………………………………………………………………………

    ……………………………………………………………………………………

2. State two forms in which Nitrogen is available to plants.(1mk)

    ……………………………………………………………………………………

    ……………………………………………………………………………………

3. Name three negative parts that can be used to propagate pineapples.(1½mks)

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4. State four factors that can increase the seed rate in crop production.(2mks)

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    ……………………………………………………………………………

5. State four reasons for deep ploughing during land preparation.(2mks)

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    ………

    …………………………………………………………………………

6. What is meant by the following terms;
    a. Mixed cropping.(1mk)

    ………

    ………………………………………………………

    b. Mixed farming.(1mk)

    ……………………………………………………………………………………………

    ……………………………………………………………………………………………

7. Give two situations in which opportunity cost is equal to zero.(2mks)

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8. State four qualities of crops which are used for green manure.(2mks)
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9. Give four farming practices which can lead to increase in amount of light falling on leaves.(2mks)

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10. State four factors which determine the stage and time of harvesting crops.(2mks)

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11. Give the reason of using the following materials when preparing compost manure.
    i.   Wood ash ½mk

    ....

    ii.   Top soil½mk
    ....
    iii.   Dung ½mk

    ....

12. State five importance of mulching in crop production .(2½mks)

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13. Give four roles of trees in soil and water conservation.(2mk)
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14. List down the three types of land reform which have taken place in Kenya.1½mk)
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15. State three effect of excess Nitrogen in tomato production.(1½mk)

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16. Name two diseases of cabbages.(1mk)

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17. Give four reasons of conserving forage crops.(2mk)

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18. Differentiate between the following;
Top dressing and topping in pasture management. (1mk)

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SECTION B
Answer all the questions in the spaces provided.

19. The diagram below illustrates a final seedbed after tertiary done during land preparation.

(a) Name the tertially operation carried out on the seedbed.(1mk)

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(b) Give three reasons for carrying out the operation.(3mks)

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(c) Apart from the above operation name any other tertially operation.(1mk)

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....

20. The following diagram represent a method of crop propagation .Study it carefully and answer the question that follows.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

Roots develop here
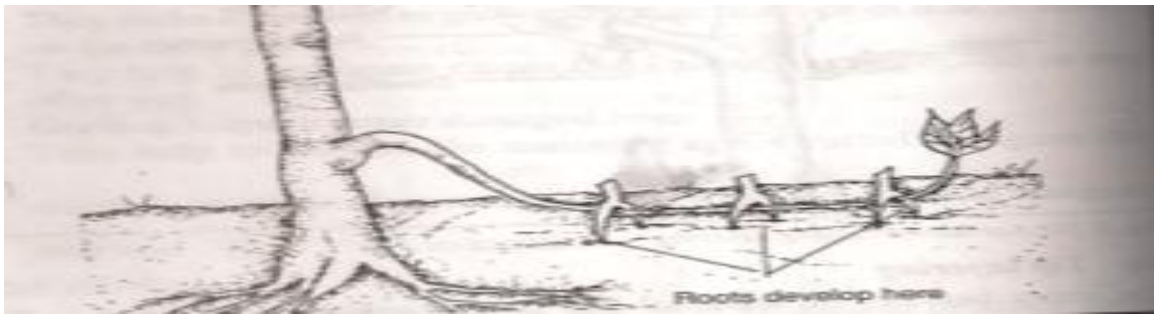
a. Identify the method of propagation.(1mk)

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b. What is the importance of the above method of crop propagation?(1mk)

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c. State three factors which influence rooting of cutting materials in vegetative propagation.(3mks)

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21. A form four student was advised to apply a compound fertilizer 30:20:10 in a cabbage plot measuring 10 m long by 5 m wide at a rate of 300kg per hectare.

a. State the percentage of Phosphorus.(P_2O_5) .(1mk)

....

b. Calculate the amount of the fertilizer the student would require for the plot.(Show your working)3mks

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22. The following is a photography showing maize crop growing in the filed .Study it clearly and answer the questions below.

a. Identify the field practices which have been carried out at point A.(1mk)

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…………………………………………………………

b. Give three reasons as to why it is important to carry out the practices.(3mks)

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………………………………………………………………………

c. Apart from the crop above name any other two crops which require the practices in (a) above.(2mks)

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SECTION C

Answer any two questions from this section in the booklet provided.

23. (a) Explain five natural factors that influence soil erosion .(10mks)

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(b) State and explain five factors which may influence the spacing of crops.(10mks)

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FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

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24. (a) Give five cultural methods of weed control.(5mks)

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(b) Outline five ways in which pest influence agricultural production.(5mks)

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(c)Describe the importance of any five nursery management practices.(5mks)

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(d)(i) What is the meaning of economic injury level as it is used in pest management.(1mk)

(ii) Describe four physical measures of pest control in crop production.(4mks)

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25. (a) Explain the effects of land fragmentation in agricultural production.(5mks)

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b) Describe the process of gulley formation.(4mks)

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(c) Outline the factors influencing crop rotation.(6mks)

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(d) Describe the importance of drainage in crop production.(5mks)

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FORM 4 ENDTERM 1 EXAMS
AGRICULTURE

NAME………………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

FORM 4 AGRICULTURE PAPER 2

END OF TERM 1

SECTION A: 30MKS

SECTION B: 20MKS

SECTION C: 3 ESSAY QUESTIONS STUDENTS TO ANSWER 2 EACH CARRYING 40MKS.

SECTION A (30MKS)

ANSWER ALL QUESTIONS IN THIS SECTION

1. State two importance of litter in a poultry house. (1mk)

2. Give three ways by which infections livestock disease can be spread on a farm. (1 ½ mks)

3. Distinguish between Wessex saddlebacks & Berkshire breeds of pigs. (1mk)

4.a) Give two uses of a planter. (1mk)

b) State two ways of connecting a planter onto a tractor. (1mk)

5. Name two bacterial diseases which are not vector-transmitted. (1mk)

6. State two types of mowers. (1mk)

7. State how each of the following practices controls livestock diseases

a) Quarantine (1mk)

b) prophylaxis (1mk)

8. List four farm structures used in the control of livestock parasites. (2mks)

9. State two effects of mange mites on goats. (1mk)

10. Name four cattle breeds that originated from England. (2mks)

11. State two functions of the crop in the digestive system of poultry. (1mk)

12. Give two reasons why a dairy should be white washed but not oil painted. (1mk)

13. Below is a table showing animals of different ages and sexes. Give the name that describes the animals in the respective columns. (2 ½ mks)

Description	Cattle	Pigs	Poultry
Young from hatching/birth to weaning			
Young female before1st birth/k			
Mature male for breeding			

14. Give the functional difference of the following pair of tools. (2mks)

a) Bastard file and Rasp file

b) Copying saw and hacksaw. (1mk)

15. Why are the following conditions maintained during artificial incubation of eggs in poultry production.

a) Proper ventilation. (1mk)

b) Relative humidity at 60%. (1mk)

16. Give two reasons for rearing indigenous cattle in marginal areas of Kenya. (1mk)

17. State four limitations of using hydroelectric power on the farm. (2mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

SECTION B: (20MKS)

ANSWER ALL QUESTIONS

18.a) State the class of each of the following feedstuffs. (1mk)

i) Molasses-

ii) Maclick super-

b) The diagrams below represent livestock parasites

Z
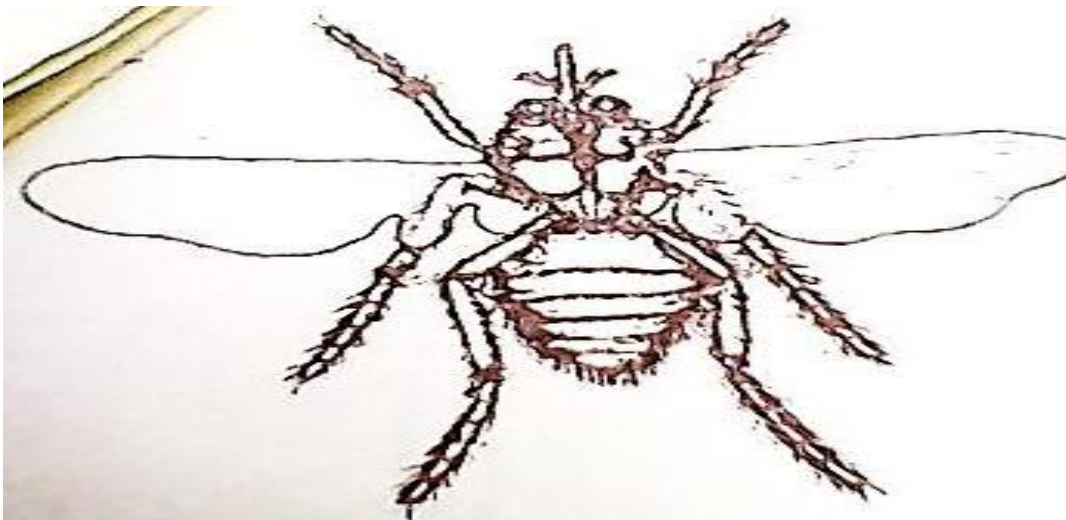
Y

i) Identify the parasites. (1mk)

Y-

Z-

ii) In which organs in livestock is parasite Z found? (1mk)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

iii) How is parasite Z passed from livestock to human beings? (1mk)

18.c) Give two control measures of each parasite. (2mks)

i) Y

ii) Z

1`9.a) State two functions of a hypodermic syringe and a needle. (1mk)

b) Distinguish between closed and open methods of castration. (1mk)

c) Give two importance of progeny testing method of selection over mass selection method. (2mk)

20.a) Study the diagram below and answer the questions that follow
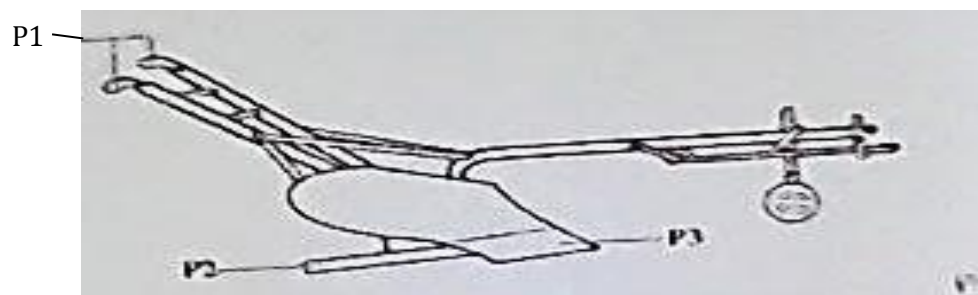
i) Name the type of plough shown above. (1mk)

ii) Identify the parts labeled P1,P2,and P3. (1 ½ mks)

p1-

p2-

p3-

iii) State two ways through which a farmer would increase the depth of cultivation when using the implement. (1mk)

b) Study the farm tools illustrated in the diagrams below
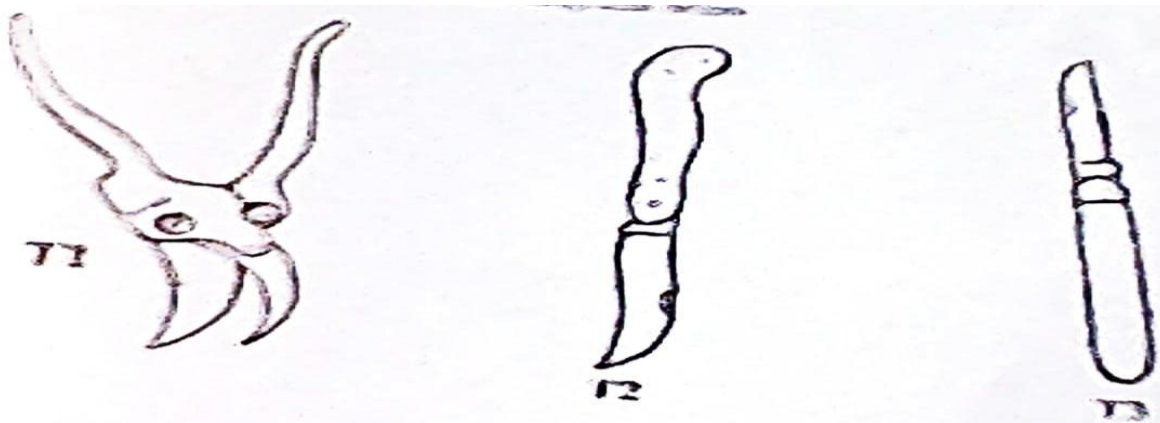
i) Identify each of the farm tools illustrated in the diagrams above. (1 ½ mks)

T1-

T2-

T3-

ii) State one use of the tool labeled T1. (1/2mk)

c) State two uses of green houses on the farm. (1mk)

d) Name two chemicals used in wood preservation. (1mk)

21.a) State four factors that cause swarming of bees. (2mks)

b) Define a fingerling. (1/2mk)

SECTION C: 40MKS

ANSWER ONLY TWO QUESTIONS

22.a) Outline the procedure followed when hand spraying cattle to ensure effective use of acaricides to control ticks. (8mks)

b) Outline the daily maintenance practices that should be carried out on a farm tractor. (7mks)

c) State the reasons for maintaining farm tools equipment and machinery in good working conditions. (5mks)

23.a) Discuss cannibalism in poultry rearing under the following sub-headings

i) Definition of cannibalism. (1mk)

ii) Types of cannibalism. (2mks)

iii) Causes of cannibalism. (8mks)

iv) Control of cannibalism. (9mks)

24.a) Explain ten factors considered when selecting livestock for breeding. (10mks)

b) Describe the working of a four stroke cycle petrol engine. (10mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

FORM 4 ENDTERM 1 EXAMS
BUSINESS STUDIES

NAME..ADM..........CLASS..............

CLASS : ....SIGNATURE........................DATE: ....

565/1
BUSINESS STUDIES
PAPER 1

TIME: 2 HOURS

Instructions for candidates
a. Write your name and index number in the spaces provided above.
b. Sign and write the date of examination in the spaces provided above.
c. Answer all the questions.
d. All answers should be written in the spaces provided.
e. This paper consists of five printed pages.
f. Candidates should answer all the questions in English.

For Examiner's use only

Question	1	2	3	4	5	6	7	8	9	10	11	12	13
Marks													

Question	14	15	16	17	18	19	20	21	22	23	24	25	26
Marks													

TOTAL MARKS

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

1. Outline any four functions of an office in an organization. (4 mks)

2. Name the document used for the purposes described below in home trade. (4 mks)
   (i) A document requesting a potential seller to supply the goods specified in it –

   (ii) A document signed by the buyer after receiving goods to ascertain that he/she has received the goods and in good condition and order –

   (iii)Document issued by seller to the buyer to correct an undercharge –

   (iv)Document used by a potential buyer to seek for more information from a potential seller –

3. State any four factors that may limit entrepreneurship in an area. (4 mks)

4. Record the following transactions in the sales journal. (5 mks)
2006:
January 2: Sold goods on credit to Wanje Shs. 4,000 invoice No. 001
        3: Credit sales to Yusuf Shs. 10,000 invoice No. 002
        4: Cash sales to Mutune Shs. 1,000 receipt No. 020
        5: Credit sales to Cheruiyot shs. 15,000 invoice No. 003
        7: Credit sales to Abdalla shs. 6,000 invoice No. 004

5. Outline any four features of subsistence production. (4 mks)

6. List down any four environments that constitute an external business environment. (4 mks)

7. Highlight any four challenges that an overpopulated country may face. (4 mks)

8. Highlight any four ways in which a government can create an enabling environment for business. (4 mks)

9. Juma and Oliech wants to start a business as a partnership. However, their contributions are not enough to raise the required capital. Advice them on other alternative sources of capital for their business. (4 mks)

10. Give four benefits of a bonded warehouses to an importer. (4 mks)

11. Ollin enterprises sells it/s goods at a margin of 20%. The following details were available for the year ended 30th April, 2014.

	Shs.
Purchases	500,000
Net sales	950,000
Closing stock	200,000
Net profit is 15% of sales	

Calculate:-

a) Gross profit (2 mks)

b) Total expenses (3 mks)

12. The following information was extracted from the books of Almach enterprises for the year 2014. (3 mks)

	Shs.
Capital on 1/01/2014	203,000
Drawings during the year	13,000
Additional investment during the year	20,000
Net loss during the year	24,000

Determine the capital of the business at the end of the year 2012.

13. State any four services that are offered by the post office. (4 mks)

14. Highlight any four factors that may make communication to be effective. (4 mks)

15. Karibu Emporion Company owns a chain of supermarkets in several major towns in Kenya. Advice the owners on any four insurance policies that it can use for it's supermarkets. (4 mks)

16. Outline any four circumstances under which air transport is suitable over other means of transport. (4 mks)

17. Write down whether the following factors cause a shift of the demand curve or movement along a demand curve. (4 mks)

Factor	Effect
a) A change in consumers income	
b) An increase in the sales tax of a product	
c) Change in price of the commodity	
d) Future expectations that price will increase	

18. The diagram below shows a demand curve in a certain product market.
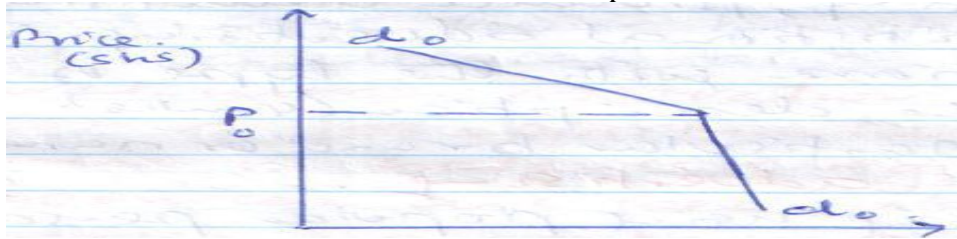
a. Give the name of the demand curve represented by $d_0 d_0$. (1 mk)

b. Name the type of product market that experiences such a curve. (1 mk)

c. Outline any three features of an oligopoly market. (3 mks)

19. Outline any four benefits to a consumer if the channel used to distribute a certain commodity is short rather than a long channel. (4 mks)

20. The following are types of advertising primary demand advertising, product advertising, celebrity advertising, institutional advertising. Match the following descriptions with the type of advertising that best suits the description.
    (4 mks)
    (i) Advertising a particular brand or name of a specific product –

    (ii) Advertising using popular personalities –

    (iii) It aims at popularizing new products to potential customers –

    (iv) It aims at making an organization more popular –

21. One of the major services of commercial banks is lending money to their customers. Outline any three ways in which commercial banks lend money.   (3 mks)

22. Define the following terms as used in National income.   (4 mks)
    (i) National income –

    (ii) Gross domestic product –
    (iii) Per capita income –

    (iv) Gross national product –

23. Outline any four benefits to a country as a result of delocalization of firms.   (4 mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

24. Give four reasons why the government may prefer borrowing funds from internal sources rather than borrowing externally. (4 mks)

25. List down the types of expenditures that are included in the measurement of national income using the expenditure method. (4 mks)

FORM 4 ENDTERM 1 EXAMS

BUSINESS STUDIES

NAME…………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

565/2

BUSINESS STUDIES

PAPER 2

PAPER 2

2¹ᐟ² HOURS

INSTRUCTIONS TO CANDIDATES

   I.   This paper consists of six questions.
  II.   Answer any five questions.
 III.   Write your answers in the answer booklet provided
  IV.   All questions carry equal marks.

1   (a) Describe any **five** characteristics of human wants. (10mks)

(b) Explain **five** ways in which commercial banks help in facilitating business activities in a community.(10mks)

2   a) Quails traders intends to construct a warehouse .Explain **five** measures that Quails   Traders should take to ensure smooth functioning of the warehouse. (10mks)

b) Sambaza, an island country in Indian Ocean, has been experiencing low national income   Discuss **five** reasons that may have contributed to this problem .(10mks)

3   (a) Explain **five** factors that have contributed to the popularity of containers in transport. (10mk)

B) Kamwe Company limited prefers to sell its products direct to consumers. Highlight **five** circumstances under which this manufacturer may sell direct to consumer. (10mks)

4   (a) Ndathi has realized that his brother's one year old business is growing fast. Explain **five** reasons that could be contributing to this scenario. (10mks)

(b)Miciri a young entrepreneur has first won a lottery worth ksh.500; 000.He is torn between putting up a soap producing firm and a milk bar. Explain to Miciri **five** factors that he needs to consider before making a decision or what to produce. (10mks)

5   (a) Wamutira a newly employed teacher has joined Tajirika savings and credit co-operative society (SACCOs) ltd. Explain the **five** benefits that she may get from being a member of that SACCO.(10mks)

(b) Yegon had the following transaction in the month of June 2003.(10mks)

> June 2   Started business with sh .100, 000 cash and furniture (from home) sh.3000.
>
> > 3   Opened a bank account with sh. 7000.
> >
> > 6   Bought goods from kamanda on credit sh.500.
> >
> > 7   Sold stock sh.800 and was paid by cheque.
> >
> > 8   Yegon took away sh.100 cash from the business for his daughters fare back to school.
> >
> > > Required:
> > >
> > > > I.   Record the following transactions in the relevant ledger accounts and balance them off. (10mk)

6   (a) Explain **five** ways in which the government can provide an enabling environment can provide an enabling environment for business enterprise. (10mks)

(b) The following is the trial balance Mwingi West shop as at 31st March 2013.(10mks)

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

	DR SHs	CR SHs
Stock 1 April 2012	181,600	
Sales and Purchases	691,850	923,400
Carriage inwards	4,200	
Carriage outwards	15,700	
Return outwards		6,400
Wages and salaries	102,400	
Rates and Rent	30,150	
Communication expense	6,240	
Commission Payable	2,160	
Insurance	4,050	
Sundry expenses	3,180	
Buildings	200,000	
Debtors and creditors	143,200	32,640
Outstanding Expenses		48,960
Fixtures	28,500	
Cash at bank	29,700	
Cash at hand	1,150	
2 years loan		80,000
Loan from k Ball		20,000
Drawings	79,200	
Capital		408,880
	1,520,280	1,520,280

Prepare:

I. A trading profit and loss a/c for the year ended 31st March 2013.
II. Balance sheet as at 31st March 2013.

FORM 4 ENDTERM 1 EXAMS

KISWAHILI

NAME..ADM..........CLASS..............

CLASS : ....SIGNATURE.......................DATE: ....

102/1

Kidato cha nne

Karatasi ya kwanza

Insha

Muda: saa 1 ¾

TATHIMINI YA PAMOJA

Kiswahili

Karatasi 1

Maagizo

(a) Andika insha mbili.
(b)   Insha ya kwanza ni ya lazima kisha uchague insha nyingine moja kati ya hizi tatu zilizosalia.
(c) Kila insha isipungue maneno 400.
(d)   Kila insha ina alama 20.

Maswali

1. Kumekuwepo na ongezeko la visa vya ufisadi, wewe kama mkazi wa jimbo la Kirinyaga mwandikie mhariri wa gazeti la Taifa Leo barua ukilalamikia suala hili.

2. Eleza sababu tano zinazochangia matumizi ya mihadarati miongoni mwa wanafunzi huku ukipendekeza njia mwafaka za kukabiliana na tatizo hilo.

3. Andika insha itakayomalizia kwa maneno haya.
   " ………… alianza kubabaika, kijasho kikamtiririka kwapani.
   Nikatambua moja kwa moja kuwa yeye ndiye mkosi.

4. Mgala muue na haki umpe.

FORM 4 ENDTERM 1 EXAMS

KISWAHILI

NAME………………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

102/2

KISWAHILI

Karatiasi ya 2

Muda: 2½

MAAGIZO

(a) Jibu maswali yote

(b) Majibu yote yaandikwa katika nafasi ulizoachiwa katika kijitabu hiki cha maswali

<u>Kwa matumizi ya mtahini</u>

Swali	Upeo	Alama
1		
2		
3		
4		
JUMULA		

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

1. UFAHAMU (ALAMA 15)

<u>Soma kifungu kifuatacho kasha ujibu maswali</u>

Gari lake kuukuu lilikuwa linapambana na barabara yenye mashimo yaliyoshiba na kutapika maji ya mvua ambayo sasa ilikuwa inaanza kupusa. Japo daima alipambana na usukani kunako mashimo haya yaliyotosha kuitwa magenge, alishukuru kwa hali hii. Vipi angeweza kulidhibiti gari lake hili kwenye barabara iliyosakafiwa nayo ikhitimu? Magurudumu haya yaliyong'ara kama upara wa shaibu aliyekula chumvi hadi ikamwogopa yangetii uelekezi wake? Mara ngapi gari hili limetaka kumwasi barabarni? Haya yalikuwa baadhi ya maswali yaliyompitikia akilini. Hakujitakilifu kutaka kuyapa mji maana mara ile mawazo yake yalitekwa na kubwagwa katika nchi ya mbali-nchi ambayo sasa aliiona kama sinema alilini mwake.

Alipofika nymbani aliliegesha gari lake na kufuliza ndani. Siku mbili zilikuwa zimepita akiwa pale kazini. Madaktari kama yeye hawakuwa wengi. Alikuwa miongoni mwa madaktari wenye ujuzi katika hospitali hii ya kitaifa. Wenzake wengi walikuwa wamehamia ughaibuni walikokwenda kutafuta maisha. Mshahara wao wa mkia wa mbuzi uliwasukuma na kuwatema nje ya nchi yao. Wengi wa waliohamia ng'ambo waliona vigumu kubaki katika ajira ambayo kivuno chake kilishindwa kumvusha mtu hata nusu ya kwanza ya mwezi. Malalamishi ya kulilia ujira wa heshima yaligonga kwenye masikio yaliyotiwa zege. Na kweli wana vyosema, mwenye macho haambiwi tazama. Basi walitazama hapa na pale wakaona penye mianya ya matumaini nao wakaiandama.

Hadi leo hii hamna la mno lililofanyika. Ndiyo maana Daktari Tabibu anarudi nymbani tangu kuingia kazini hiyo juzi alfajiri. Hafanyi kwa kuwa katosheka, maana pia yeye ana dukuduku. Ana shaka ya mustakabli wake ikiwa mazingira ni haya ya kumsoza, maana umri nao unazidi kumla. Japo anatia na kutoa, mizani ya hesabu yake imeasi ulinganifu.

Daktari Tabibu waama ni mfungwa. Ametekwa na kuzuiwa katika kupenda na kuchukia mambo. Ni kama mti uliodumaa. Anatamani barabara nzuri za lami. Anatamani mshahara wa kumwezesha kukidhi mahitaji yake na kutimiza majukumu yake ya kimsingi. Jana amesema na

rafiki yake aliye ng'ambo kwa simu ambayo sasa imetulia mkabala naye. Ingawa mwenzake huyu alikuwa mchangamfu na kumdokelea hali ya maisha ya kuridhisha kule ugenini kama vile wanataaluma kuenziwa, yapo vile vile yaliuomtia unyonge moyoni. Upweke ndio ulomtia fukuto kuu. Licha ya hela zote hizo za kupgiwa mfano, watu hawana muda wa kutembeleana na kujuliana hali au hata kukutana tu mkahawani wakashiriki mlo. Eti ni kila mtu na hamsini zake. Halafu ipo changamoto ya hali ya hewa. Baridi ya ng'ambo haifanyi mzaha katika kumtafuna mtu. Ni hali tofauti na ile aliyoizoea.

Daktari Tabibu alizitia kauli za rafiki yake kwenye mizani ya moyo wake. Akawaza ikiwa kweli si bora kulemazwa na mzizimo ugenini badala ya kuishi katika kinamasi cha kuumbuliwa nyumbani. Kisha punde lilimjia wazo la marehemu nyanyake na wengine kama yeye waliofadhili masomo yake kupitia kwa serikali na njia ya kodi. He, si usaliti huu? Vipi aikimbie nchi kabla ya kuihudumia ilhali imemjenga hadi kuwa daktari? Na je, wafanyakazi wake wa nyumbai watakwenda wapi? Atawaambiaje kuwa sasa hahitaji huduma zao kwa kuwa anakimbia nchi yake?

Mawazo yake yalikatizwa na simu iliyolia na kumshtua. Alipoitazama alijona imeng'ara kwa mwangaza ulioweka wazi jina la mpigaji. Alifahamu kuwa leo hii tena dharura nyingine ilikuwa inamwalika hospitalini. Mwili wake ulimsaliti ingawa moyo wake ulimkumbusha kuwa lisilo budi hutendwa. Hapo ndipo alipoiinua ile simu tayari kusema na mwenzake upande wa pili.

"Haloo!" Sauti nyororo kutoka upande wa pili iliita
"Haloo!"
"Naam! Dharura nyingine tena daktari. Unaombwa kuokoa maisha mengine tena!"
"Haya. Ila mwanzo nitahitaji kujimwagia maji", na pale pale akaikata ile simu.

Daktari Tabibu aliingia hamamuni huku kajifunga taulo kiunoni tayari kuoga. Aliyafungulia maji lakini ule mfereji uligoma kutapika maji. Ulikuwa umekauka kabisa. Daktari Tabibu aliduwaa pale. Aliufunga ule mfereji kabla ya kuiaga bafu.

(a) Eleza sababu nne zinazowafanya wataalamu kuhamia nchi za nje (al.4)

....

....

....

....

(b) "Hakuna masika yasiyokuwa na mbu" Thibitisha kauli hii kwa kurejelea hali ya waliohamia ng'ambo. (al.3)

....

....

....

....

(c) Fafanua athari tatu zinazoikumba nchi ya msimulizi kutokana na uhamiaji ng'ambo wa wataalamu (al.3)

....

....

....

....

(d) Eleza mchango wa teknolojia kwa kurejelea kifungu (al.3)

....

....

....

....

(e) Eleza maana za msamiati ufuatao kulingana na taarifa (al.2)

(i) Kuyapa mji

....

(ii) Fukuto

....

UFUPISHO (ALAMA 15)

Soma kifungu kifuatacho kasha ujibu maswali

Binadamu amekuwa akitumia majina tangu jadi. Mtoto hupewa jina azaliwapo na kutarajiwa kulitumia hadi kifoni. Je, umewahi kuwazia maisha bila jina? Watu wangetofautishwa vipi katika hali kama hiyo? Majina hugawika katika makundi mawili makuu: kijamii na kidini. Jamii zote duniani huwa na mifano mbalimbali ya majina. Dini hutoa majina kwa waumini wake k.m. majina katika dini ya Kikristo ni tofauti naya Kiislamu. Waafrika hutumia majina yaliotolewa na wageni sambamba na yenye asili ya Kiafrika

Kinyume na majina ya viumbe vingine, yale ya binadamu huwa na uwezo wa kukua, kutukuka na hata kukumbukika. Adinasi mashuhuri walioishi miaka mingi ilyopita husifiwa kwa kuwa "walijijengea" majina. Mitaani, si nadra kuwafumania waja wakiulizana, "una jina jamani."

Swala nyeti zaidi linalokanganya ni uwezo wa mwanadamu kubadilisha majina yake kwa mengine tofutti kabisa. Hali hii yaweza kusababishwa na mambo kadha wa kadha. Imani katika dini kama ya kikatoliki humlazimu Baba Mtakatifu mteule kuliaga jina lake la awali. Mifano ya hivi karibuni ni Bendedict XVI aliyejulikana kama Joseph Ratiozinger na marehemu John Paul II mwenye jina la utotoni Karol Josef Wojtyka

Katika Biblia, Saulo alilibadili jana lake likawa Paulo.

Mother Theresa (1910 – 1997) aliyezaliwa mjini Macedonia aliyatupilia mbali majina Agnes Gonxha Bojaxhia alipoanza kazi ya utawa. Aliguria India alipopata uraia mnamo mwaka wa 1948. Mama Theresa alikianzisha kikundi cha kuwasaidia maskini kijulikanacho kama Missionaries of Charity huko Calcutta. Alijishindia tuzo la Nobel mwaka wa 1979.

Wanasiasa hufaulu sana katika matumizi ya majina mapya. Jomo Kenyatta 91899 – 1978) aliyapa kisogo majina Johnstone Kamau Ngengi alipojibwaga ulingoni wa siasa. Jitihada zake za kuleta uhuru nchini zilimfanya kuwa rais wa kwanza wa Kenya huru.

Kwa kufuatilia sera zake za kisiasa, Mobutu Sese Seko (1930 – 1997) alidinda jina lake Joseph Desire' kama hatua moja ya kuvipa vitu sura ya Kiafrika na kuondoa ile ya Kifaransa.

Oginga Odinga aliyebatizwa "Adonija' alilichukua 'Jaaramogi' lenye maana ya kiongozi wa viongozi katika jamii ya waluo.

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

Ufalme kwa kiwango kikubwa na jina jipya. Mfalme Haille Selassie (1892 – 1975) wa Ethiopia alijulikana kama Raj Tafari Makonnen katika ujana wake. Aliheshimiwa sana na kikundi la Rastafarian lililoamini alitoka kwa ukoo wa mfalme Suleimani na malkia Sheba.

Malkia Elizabeth II wa Uingereza aliitwa Elizabeth Alexandria Mary tangu utotoni hadi aliporithi cheo na kuamua kutumia jina la Malkia Elizabeth I aliyetawala kati ya 1558 – 1603.

Shuguhuli au kazi huleta mabadiliko. Wanamziki na waigizaji mashuhuri hupendelea kutumia majina mapya mapya yanayowatambulisha kwa mashabiki wao. Mfano mzuri ni mwigizaji Copolla aliyetupilia mbali majina Nicholas Cage.

Wahalifu wengi hutumia majina ambayo hufichana mienendo yao. Nchini Kenya, tuna akina Wanugu, Wacucu na Rasta. Wanapotia for a zaidi, huyachukulia kama kwamba ndiyo majina halisi kama vile Carlos the Jackal.

(a) Fafanua hali zozote zinazomfanya mwanadamu kubadilisha jina (Maneno 40 – 45)

(al.)

Matayarisho:

………
………
………
………
………
………………………………………………………………………………………………

Nakala safi :

………
………
………
………
………
………………………………………………………………………………………………

(b) Fupisha aya mbili za mwanzo (Maneno 65-70)

Matayarisho:

....

....

....

....

....

....

Nakala safi :

....

....

....

....

....

....

3.   <u>MATUMIZI LA LUGHA (Alama 40)</u>

   (a) (i)   Andika sauti moja ya kipasuo kwamizo   (al. 1)

   ....

   ....

   (ii)   Onyesha sifa bainigu za sauti zifuatazo: (al.2)
             f/v

   (b) Bainisha aina za virai vilvyopigiwa mistari   (al.2)
       <u>Yule mzembe</u> alifika   <u>leo asubuhi</u>

(c) Eleza matumizi ya "kwa" katika sentensi ifuatayo   (al 4)

Walivuka barabara kwa haraka wakienda kwao na sita kwa kumi wakagongwa kwa gari

……

…………………………………………………………

(d) Tunga sentensi mbili ukitumia neno 'kucha' kama   (al.2)

(i)   Nomino

……

…………………………………………………………

(ii)   Kitenzi

……

…………………………………………………………

(e) Tungia kiunganishi 'maadamu' sentensi   (al.1)

……

…………………………………………………………

(f) Tunga sentensi kuonyesha matumizi ya Kivumishi cha pekee cha kusisitiza   (al. 1)

……

…………………………………………………………

(g) Andika katika usemi halisi. Rukia alimwambia Juma kuwa shughuli yao ingemalizika siku

iliyofuata   (al.2)

……

…………………………………………………………

(h) Tambua aina za nomino katika sentensi

Kuongoza kwa mtawala huyo kumewaletea wasomali dhiki kuu   (al.2)

……

…………………………………………………………

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

(i) Eleza huku ukitoa mifano matumizi mawili ya Kiambishi 'ji'   (al.2)

(i) ………………………………………………………………………………

………………………………………………………………………………...

(ii) ………………………………………………………………………………

………………………………………………………………………………...

(j) Tambua vishazi na uonyeshe ni vya aina gani   (al.2)

Rudisha atapendwa na wengi ikiwa atashinda leo

………………………………………………………………………………

………………………………………………………………………………...

(k) Bainisha aina ya viwakilishi katika sentensi zifuatazo   (al 2)

(i) wewe ulimpiga Yule ………………………………………………………

………………………………………………………………………………...

(ii) Mfupi ana vitatu ………………………………………………………

………………………………………………………………………………...

(l) Nyambua vitenzi vifuatavyo katika kauli zilizowekwa katika mabano (al.2)

(i)   Lia (kutendeshwa) …………………………………………………

…………………………………………………………………………………………

(ii)   Lia (kutendea) …………………………………………………………...

…………………………………………………………………………………………

(m)   Kanusha sentensi ifuatayo   (al.2)

Amekuja kukuona na ataondoka kesho

………………………………………………………………………

………………………………………………………………………...

(n) Eleza matumizi ya kiambishi 'ku' katika sentensi ifuatayo   (al.1)

Tulimwona na kumsalimia

……………………………………………………………………………………

……………………………………………………………………………………..

(o) Ainisha vihusishi katika sentensi hii: (al.2)

Ng'ombe watatu kwa saba ndio wamechinjwa hadi saa

……………………………………………………………………………………

…………………………………………………………………………………….…

(p) Eleza matumizi mawili ya ritifaa kisha uyatolee mifano   (al. 2)

(i)   ……………………………………………………………………………

……………………………………………………………………………

(ii)   ……………………………………………………………………………

……………………………………………………………………………

(q) Geuza sentesni iwe katika wakati uliopita, hali timilifu: (al.2)

Aliomba msamaha kwa kuchelewa.

……………………………………………………………………………………

……………………………………………………………………………………..

(r) Bainisha vielezi na ueleze ni vya aina gani   (al.2)

(i)   Ngozi imenyoka twa

……………………………………………………………………………

(ii)   Aursi iliahirishwa hadi baadaye

…………………………………………………………………………….…

(s) Kanusha bila kutumia 'amba   (al.2)

Nitavaa nguo ambayo ni safi

....

(t) Unda nomino mbili mbili kutokana na vitenzi hivi   (al.2)

   (i)   Tibu ....

   (ii)   Zaa..

(u) Nomino mapenzi i   katika ngeli gani?   (al. 1)

....

4.   **ISIMU JAMII: (Alama 10)**

Huku ukitoa mifano mwafaka, onyesha mambo yanayodhibiti matumizi ya lugha katika jamii.

....

....

....

....

....

FORM 4 ENDTERM 1 EXAMS

ENGLISH

NAME……………………………………………………ADM……….CLASS……………

CLASS : ……………………SIGNATURE……………………DATE: …………………………

101/1
ENGLISH
PAPER 1
(FUNCTIONAL SKILLS)

END OF TERM 1 EXAM
TIME: 2 HOURS

INSTRUCTIONS TO CANDIDATES
Write your name and admission number in the spaces provided above
Answer **ALL** the questions in this paper in the spaces provided
This paper consists of 5 printed pages.
Candidates should check to ensure that all pages are printed as indicated and no questions are missing

FOR EXAMINER'S USE ONLY

QUESTION	MAXIMUM SCORE	CANDIDATE'S SCORE
1	20	
2	10	
3	30	
TOTAL SCORE	60	

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

1. **FUNCTIONAL WRITING**
a) Imagine you are the secretary of Uzalendo Youth group. You have planned for several peace reconciliation initiatives across the country. However, you are in a financial crisis hence the group has decided to organize for a funds drive. Design an invitation card inviting Mr Baraka, a business man to join you during the occasion. (8marks)

b) Using the above information, write an internal memo to a all members of the Uzalendo Youth group requesting them to attend the funds drive planning meeting. (12 marks)

2. **CLOZE TEXT**

Read the passage below and fill in each blank space with an appropriate word.(10 mks)

Local dramas(1)………………come along way production-wise. No doubt directors are better than they were ten years ago. (2)…………………we have a long way to go before we catch (3)…………………with Hollywood, or even Nollywood. Several new local dramas have (4)………………me hooked to the silver screen. I however have to (5)……………………a way to stop cringing with (6)…………………static acting. And it is extremely difficult to get used to the long rigid (7)…………………between conversations in certain programmes.

We also need to have script (8)……………………to stop using words like," whatever you say may be used against you…"Which policeman says this in Kenya? What is that (9)…………………..?But I will still choose to watch local productions (10)………………the latin American soaps.

3. **ORAL SKILLS**
a) **Read the following oral poem and answer the questions that follow**.

DEATH IS A WITCH

(Solo)Ah, What shall I do, Abaluya

It's wrong

(Chorus)Today I will say

Death is a witch, my people

It snatched my child

I will remain alone

(Solo)Ah, what shall I really do, Abaluya

It's very wrong!

(Chorus)Today I will say

FOR MARKING SCHEMES CALL/TEXT/WHATSAPP 0705525657

Death is a witch, my people

It snatched my child

I will remain alone.

(All)My child, my child, I cry

What shall I do? I cry

What shall I do ?I cry(2)

QUESTIONS

i.   Identify three features of oral performance that make this performance memorable.
(3mks)

ii. If you were to perform this poem to an audience, what preparation would you consider to ensure that your presentation is effective.   (4mks)

iii. How would you perform the first line of the chorus.
(3mks)

b) Give another word that is pronounced the same as the following
   (4mks)

Heal

Elicit

Beach

Moor

c) To get to Jamaa college of Agriculture, walk straight along this path for about two hundred metres and you will see a huge mango tree to your left. Turn right and walk on the murram road for about one kilometer. The road passes through a maize farm but it is quite safe. You will then get to a junction. Turn left and you will see St. Peter's primary school to your right. Walk straight on until you cross a wide river. You will then walk for about 100 metres and get to the college.

i. If you were the one receiving the directions above what would make you get to the desired location? (2mks)

d) When you are in a group discussion, how would you know that its your turn to speak. (3mks)

e) Cut your cloth according to your size.
i. Name the genre above. (1mk)

ii.   Describe one economic activity practiced by the community in which the genre in (e) (i) has been taken.   (2mks)

iii.   Describe a situation in which the genre in (e) (i) would apply.   (2mks)

iv.   Give one function and one characteristic of the genre in (e) (i) above.   (1mk)

f)   Imagine that the English teacher catches you reading a magazine during a class lesson. The teacher summons you after the lesson and the following is part of the conversation between you and him.

Fill in the missing parts.   (5mks)

Teacher(Holding out the magazine)Why were you reading this kind of trash during the lesson? An innuendo, I guess.

You:………
………………………………… (1mks)

Teacher: My question is why? You were reading, not what you did, not intend to do!

You:………
……………………………………………..(1mk)

Teacher: A what? You have nerve to dismiss it as a ……………

You: Sir,Imean…………………………………………………………………………………………………
…………………………………….. (1mk)

Teacher: (Walking away)Follow me to the discipline's master's office. There you can explain better what you mean by calling it oversight.

You:(pleadingdesperately)…………………………………………………………………………………
………………… (1mk)

Teacher: I just can't get myself to sort anything with you. Do as I say.

You:……
……………………………………..   (1mk)

Teacher: Alright then. But be careful not to promise that which you can't keep. Last pardon, and just as you said, bring your updated notebook latest four o'clock this evening.

FOR PAPER 2&3

CONTACT MR ISABOKE
0705525657