

NAME .....INDEX NO.....

SCHOOL.....SIGNATURE.....

**443/2**  
**AGRICULTURE**  
**PAPER 2**  
**JUNE -2016**  
**TIME: 2 HOURS**

**CENTRAL YEARLY MEETING OF FRIENDS (CYMF) -2016**  
*Kenya Certificate of Secondary Education (K.C.S.E)*

**443/2**  
**AGRICULTURE**  
**PAPER 2**

**INSTRUCTIONS TO CANDIDATES**

- a) Write your name, school and index number in the spaces provided above
- b) Sign and write the date of the examination in the spaces provided above
- c) This paper consists of THREE sections A,B and C
- d) Answer all the questions in section A,B and any TWO in the section C
- e) All the questions should be answered in the spaces provided

**For examiners use only**

SECTION	QUESTION	MAXIMUM SCORE	CANDIDATES SCORE
A	1 -19	30	
B	20 – 23	20	
C	24-25	40	
<b>TOTAL SCORE</b>		<b>90</b>	

*This paper consists of 12 printed pages. Candidates should check the question paper to ensure that all pages are printed as indicated and no questions are missing.*

**SECTION A:30 MARKS**

*Answer ALL questions in this section in the spaces provided*

1. Name two camel breeds (1mk)

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2. Why are goats suited to dry parts of Kenya (1 ½ mks)

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3. State three practices that make ranching an improved system of pastoral nomadism (1½ mks)

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4. (a)Give four precautions taken by farmers when using tools for farm operations (2mks)

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- (b)Give examples of plumbing tools (1mk)

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5. State three factors that influence the digestibility of food in livestock (1 ½ mks)

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6. Give two properties of pye-grease make it suitable for controlling ticks in livestock (1mk)

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7. (a)What is embryo transplant (1mk)

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(b)Give two advantages of embryo transplant (2mks)

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8. How does docking sheep help prevent spread of diseases in sheep management (1mk)

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9. State three reasons of feeding calves on colostrum (1 1/2mks)

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10. List two types of calf pens (1mk)

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11. State two reasons for lubricating tractor (2mks)

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12. Outline any three digestive processes that occur in the rumen of cattle (1 1/2mks)

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13. State three properties of concrete that make it popular in construction of farm structures (1 1/2mks)

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14. State four roles of worker bees in a colony (2 mks)

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15. Give two symptoms observed from a carcass of an animal that dies from anthrax (2mks)

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16. State four advantages of battery cage system over deep litter systems in poultry management (1mk)

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17. Why is it not advisable to feed a lactating cow on potato vines and Mexican marigold (1mk)

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18. (a) Name two machines whose engines operate on the mechanism of two –stroke cycle (1mk)

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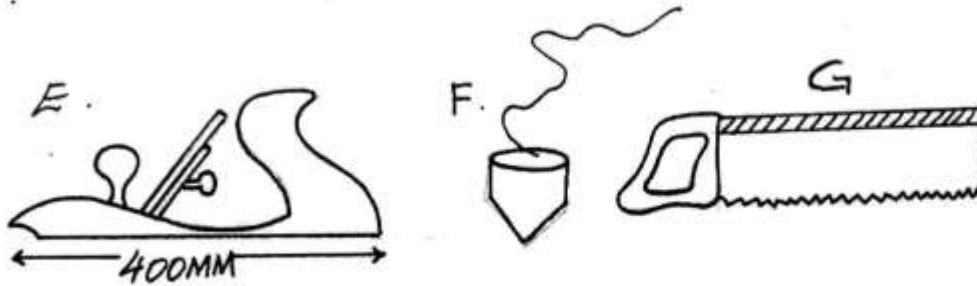
(b) State two structural differences between four stroke –cycle engines and two stroke-cycle engines (1mk)

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**SECTION B (20 MARKS)**

**Answer all questions in this section in the spaces provided**

19. Below is an illustration of farm tools and equipment. Study them and answer the questions that follow



(i) Identify the tool labeled E,F and G (2mks)

E.....

F.....

G.....

(ii) State the functions of the tools labeled F and G (2mks)

F.....

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G.....

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(iii) Give three maintenance practices of the tool labeled E (3mks)

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(iv) State the functional differences between drenching gun and bolus gun (2mks)

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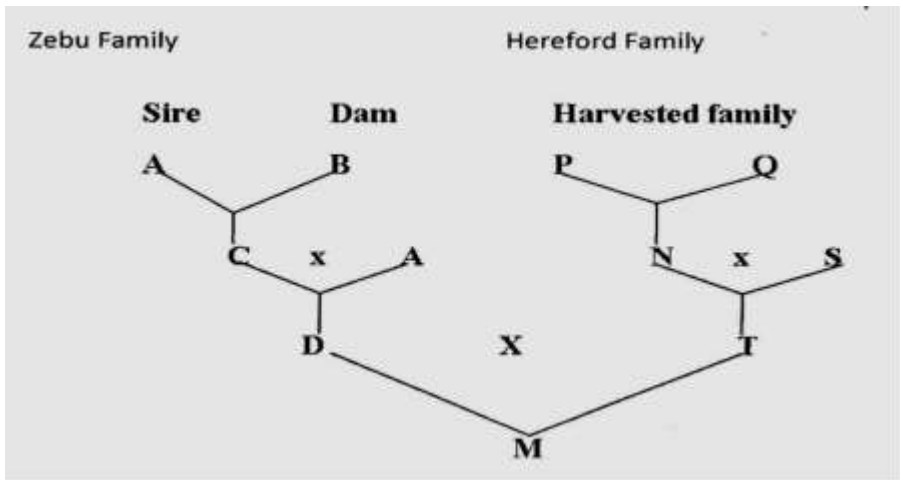
20. (a) Define the term digestive crude protein (DCP) (1/2 mk)

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(b) A farmer wanted to prepare a 200kg of calf rearing ration containing 20% DCP. Using the Pearson Square Method, calculate the amount of maize containing 10% DCP and Sunflower containing 35% DCP the farmer would need to prepare the ration (show your work) (4mks)

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21. The illustration below show different livestock families. Use it to answer questions that follow



(a) Identify the breeding system between

(i) C and A (1mk)

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(ii) D and T (1mk)

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(b) state two advantages of the breeding system identified in a (ii) above (2mks)

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(c) why is the breeding system identified in a (i) not recommended in dairy cattle (1mk)

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22. The following diagram illustrates a diseases symptom in cattle. Study it carefully and answer the questions that follow



(a) Identify the diseases in cattle with the shown symptoms (1mk)

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(b) Give two other causes of the diseases named in (a) above (2mks)

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(b) Describe the tools used and their functions during the construction of a rabbit hutch

(5mks)

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(c) State the structural requirements of a calf pen

(5mks)

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24. (a) How can a tractor be maintained on a farm

(10mks)

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25. Describe the procedure of processing honey using the heat method (8mks)

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(b)State the differences between ruminant and non-ruminants (6mks)

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(c) Describe the management practices carried out to ensure maximum harvesting of fish from a fish pond (6mks)

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