P515/2

Principles and Practices of Agriculture

Paper 2

August 2024

3 Hours



ASSOCIATION OF SECONDARY SCHOOLS HEADTEACHERS OF UGANDA (ASSHU)- NTUNGAMO

NTUNGAMO DISTRICT JOINT MOCK EXAMINATIONS 2024

Uganda Advanced Certificate of Education

PRINCIPLES AND PRACTICES OF AGRICULTURE

(THEORY)

PAPER 2

3 HOURS

INSTRUCTIONS TO CANDIDATES:

- This paper consist of Sections A,B,C,D and E
- Answer question 1 in Section A and four other questions, selecting one from each of Sections B,C,D and E
- Any additional question(s) attempted will not be marked.

Page 1

SECTION A (20MARKS)

Question 1 is Compulsory

 An experiment was carried out on maize seeds to find out changes in starch and sugar contents of the seeds during germination in darkness.
 The results of the experiment are shown in Table 1.
 Study the table and answer the questions that follow

Table 1

Days from start of experiment	Sugar content (g)	Starch content (g)
	5	35
4	10	30
6	20	20
8	35	15
10	34	5
12	31	2.5

(a) On the same axis, plot a graph of changes in starch content against days from start of the experiment (06marks)
(b) Describe the shape of each curve on your graph (04marks)
(c) Explain the relationship between the two curves (04marks)
(d) What is the role of water in germination? (06marks)

SECTION B (20MARKS) CROP PRODUCTION

Answer one question from this Section

2.	(a)	Explain ways through which the soil becomes acidic	(04marks)
	(b)	State the benefits of lime in the soil	(07marks)
	(c)	Explain the factors considered before applying lime to	
		the soil	(09marks)
3.	(a)	State the advantages of controlling weeds by cultivation	
			(10marks)
	(b)	Explain the environmental factors that cause diseases in	
		plants	(10marks)
			٠.
		SECTION C (20MARKS)	
		ANIMAL PRODUCTION	
		Answer one question from this Section	
4.	(a)	Explain why housing is important in poultry production	26 (21.2)
			(06marks)
	(b)	Describe the requirements of a good deep litter house	(09marks)
	(c)	State the importance of litter in a poultry house	(05marks)
5.	. (a)	Explain the factors that predispose farm animals to dise	ase

infections (07marks)
(b) In what ways are pathogens transmitted to farm animals

(07marks)

(c) Suggest the ways of caring for sick animals

(06marks)

SECTION D (20MARKS)

AGRICULTURAL ENGINEERING

Answer one question from this Section

6.	(a)	State the qualities of a good Yoke for draught animals	(08marks)
	(b)	Explain how a farmer can improve efficiency of draught	
		animals	(12marks)
7.	(a)	Explain the factors considered when selecting a source	
		of power to use in agricultural production	(12marks)
	(b)	State the factors that limit efficiency of manual power	
		in agricultural production	(08marks)

SECTION E (20MARKS)

AGRICULTURAL ECONOMICS

Answer one question from this Section

8.	8. (a) Distinguish between economic efficiency and technical				
	:	Efficiency The second of the s	(03marks)		
	(b)	Why is it necessary to assess the efficiency of a farm			
÷		from time to time?	(05marks)		
	(c)	Suggest the ways of improving efficiency of a farm	(12marks)		
9.	(a)	What is Agricultural development?	(02marks)		
	(b)	Explain the role of government in promoting	V., 30		
		agricultural development	(12marks)		
	(c)	State the roles of extension workers in rural			
		agricultural development	(06marks)		

END