



KISII UNIVERSITY
UNIVERSITY EXAMINATIONS

SECOND YEAR EXAMINATION FOR THE AWARD OF THE
DEGREE OF BACHELOR OF EDUCATION SCIENCE
SECOND SEMESTER 2022/2023
[SEPTEMBER-DECEMBER, 2022]

BOTA 241: TAXONOMY OF HIGHER PLANTS

STREAM: Y2S2

TIME: 2 HOURS

DAY: FRIDAY, 3:00 – 5:00 PM

DATE: 23/12/2022

INSTRUCTIONS

- 1. Do not write anything on this question paper.*
- 2. Answer ALL the questions in Section A and any TWO in Section B.*

SECTION A: ANSWER ALL QUESTIONS (40 MARKS)

1. a) Mention ways of identifying plants. (4 Marks)
2. a) Differentiate between scientific names and common names. (4 Marks)
b) State the disadvantages of common names. (4 Marks)
3. Mention and explain the classification systems for plants. (4 Marks)
4. a) What are the functions of a herbarium? (3 Marks)
b) What rules should be followed in collecting of herbarium specimens. (5 Marks)
5. When is it necessary to change scientific names. (4 Marks)
6. Explain why virtual herbariums are preferred over physical herbarium. (5 Marks)

7. a) Why do family names end with –aceae. (2 Marks)

b) Write short notes on Cucurbitaceae family. (5 Marks)

SECTION B: ANSWER ANY TWO QUESTIONS (30 MARKS)

8. Describe a set of characters that places plants in Solanaceae family.
(15 Marks)

9. Discuss how you would go about identifying classifying and naming a peculiar plant species discovered at the shores of Lake Victoria.
(15 Marks)

10. Discuss how you would go about constructing and using of identification keys.
(15 Marks)