CHUKA



UNIVERSITY

# **RESIT/SPECIAL EXAMINATION**

### EXAMINATION FOR THE AWARD OF DEGREE OF BACHELOR OF SCIENCE IN

#### **BOTA 361: PLANT ECOLOGY**

**STREAMS:** 

TIME: 2 HOURS

8.30 A.M - 10.30 A.M

DAY/DATE: TUESDAY 02/11/2021

# **INSTRUCTIONS:**

### Answer ALL questions in section A and any other TWO in section B

#### Section A (30 marks)

1.	Differentiate between r and K- strategies	(5 marks)
2.	Describe the effects of light on plant growth and development	(5 marks)
3.	Classify plants based on position of perenating buds	(5 marks)
4.	Elaborate using a diagram how energy flows through an ecosystem	(5 marks).
5.	Explain how plants are adapted to fire	(5 marks)
6.	Outline the various adaptation of tropical rain forest vegetation	(5 marks)
Section B (40 marks)		
7.	With the aid of a diagram, discuss the nitrogen cycle	(20 marks)
8.	Discuss biotic interrelationships in plants giving examples in each case	(20 marks)
9.	Discuss the following:	
	i. Methods of sampling plant communities	(10 marks)
	ii. Parameters of characterizing plant communities	(10 marks)