



ALUPE UNIVERSITY

COLLEGE

... Bastion of Knowledge ...

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OFFICE OF THE DEPUTY PRINCIPAL
ACADEMICS, STUDENT AFFAIRS AND RESEARCH

UNIVERSITY EXAMINATIONS

2019 /2020 ACADEMIC YEAR

THIRD YEAR SECOND SEMESTER REGULAR EXAMINATION

FOR THE DEGREE OF BACHELOR OF SCIENCE IN MICROBIOLOGY

COURSE CODE: BOT 314

COURSE TITLE: PHYCOLOGY



DATE: 6TH NOVEMBER, 2020

TIME: 9.00 AM – 12.00 PM

INSTRUCTIONS TO CANDIDATES

- SEE INSIDE

THIS PAPER CONSISTS OF 3 PRINTED PAGES

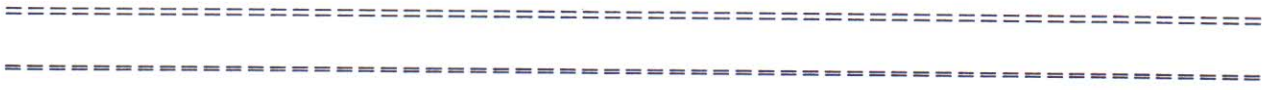
PLEASE TURN OVER

REGULAR – MAIN EXAMS

BOT 314: PHYCOLOGY

STREAM: BSc. MICROBIOLOGY

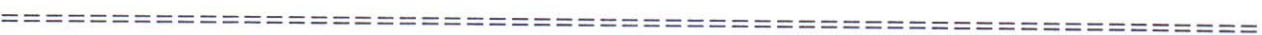
DURATION: 3 Hours



INSTRUCTION TO CANDIDATES

Answer **ALL** questions from section A and any **THREE** from section B.

Duration of the examination: 3 hours



SECTION A (24 MARKS)

QUESTION ONE

- a) Answer the following;
- i. A thick-walled vegetative cell rich in food material is called? (2 Mark)
 - ii. Which algae has the ability to fix the atmospheric nitrogen? (1 Mark)
 - iii. Water bloom is generally caused by; (1 Mark)
 - iv. Name the algae which is the source of Iodine (1 Mark)
 - v. The algae found on snow or ice are called (1 Mark)
 - vi. How many divisions were recognized in algae by Smith? (1 mark)
- b) List the different reserve food materials found in the following classes of algae (6 Marks)
- 1. Chlorophyceae
 - 2. Xanthophyceae
 - 3. Bacillariophyceae
 - 4. Phaeophyceae
 - 5. Rhodophyceae
 - 6. Cyanophyceae

QUESTION TWO

- a). Describe features of the algal class Chlorophyceae (7 Marks)
- b). Write general characteristics of algae (5 Marks)

SECTION B (36 MARKS)

QUESTION THREE

Explain the economic importance of algae

(12 Marks)

QUESTION FOUR

Describe diverse habitat found in algae

(12 Marks)

QUESTION FIVE

Highlight the pigment composition of classes of algae as categorized by F.E. Fritsch (12 Marks)

QUESTION SIX

Discuss vegetative reproduction in algae

(12 marks)

QUESTION SEVEN

Explain thallus organization in algae (Use diagrams where necessary)

(12 Marks)

