

NATIONAL OPEN UNIVERSITY OF NIGERIA Plot 91, Cadastral Zone, Nnamdi Azikiwe Expressway, Jabi - Abuja **FACULTY OF HEALTH SCIENCES**

2023_2 EXAMINATIONS

Course Code: EHS 308

Course Title: Environmental Biotechnology

Course Unit: 3 Credit Units Time Allowed: 2 Hours **Total Score: 70 Marks**

ANSWER ALL

5 marks Q1 (a)What is Traditional biotechnology? (b) Define Modern biotechnology 2 marks (c)List five (5) contributions of biotechnology to human development 5 marks (d) Mention three (3) Institutions that play vital roles in Biotechnological Development in Nigeria

Q2 (a) Highlight eleven (11) preventive methods involved in taking precautionary measures to prevent pathogens and pollutants reaching the body fluids. 11 marks

3 marks

(b) List the ten (10) common microbes involved in bio-augmentation 5 marks

- Q3 (a) Mention seven (7) major moral and ethical concerns expressed about biotechnology 14 marks
- (b) Enumerate five classes of Biotechnology using Application-based approach **5marks**
- Q4 Define the following (2 marks each)
 - i. Bio-power
 - Bio-energy ii.
 - iii. Bioremediation
 - Biotechnology ίV.
 - Genetic Engineering V.
 - **Bioinformatics** vi.
- Nanotechnology vii.
- viii. Cell Therapy
- ix. Biopreservation
- Х. agro-remediation 20 marks