



**ELIZADE UNIVERSITY,  
ILARA-MOKIN, NIGERIA**

**FACULTY: BASIC & APPLIED SCIENCES**

**DEPARTMENT: BIOLOGICAL SCIENCES**

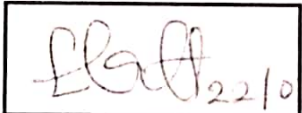
**FIRST SEMESTER EXAMINATION**

**2020/2021 ACADEMIC SESSION**

**COURSE CODE: EMT 505**

**COURSE TITLE: PRINCIPLES OF ANALYSIS OF TOXICANTS**

**COURSE UNITS: 3 UNITS**

 22/03/2021

**DURATION: 2 HOURS**

**HOD's SIGNATURE**

**NAME:.....**

**MAT. No:.....**

**INSTRUCTION: ANSWER ANY 4 QUESTIONS**

## SECTION A

1. (a) Mention four (4) types of toxicants and their characteristics in the environment  
(b) List and explain types of toxic entities
2. (a) List the components of staplex air sampler  
(b) What can you use to sample soil and water?
3. (a) Mention the sample preservation methods for aqueous samples.  
(b) Enumerate the sample collection techniques for air and water samples?
4. (a) Mention and discuss five (5) methods for the analysis of toxicants.  
(b) Explain the following terms:
  - (i) Instrumental Neutron Activation Analysis (INAA)
  - (ii) Activation analysis
5. Describe method of operation of the following equipments
  - (i) Auto analyzer
  - (ii) Gas analyzer
6. What do you understand by the following:
  - (i) Quality assurance of analytical data
  - (ii) Interpretation of data
  - (iii) Statistical treatment of data