



# MACHAKOS UNIVERSITY

University Examinations for 2023/2024 Academic Year

SCHOOL OF EDUCATION

DERPARTMENT OF EDUCATIONAL PSYCHOLOGY AND SNE

FOURTH YEAR, SEPTEMBER/DECEMBER SEMESTER 2023/2024 EXAMINATION

FOR BACHELOR OF EDUCATION (SPECIAL NEEDS EDUCATION)

ESN 455: AUDIOLOGY AND ELECTROACOUSTICS

**DATE :** \_\_\_\_\_ **TIME :** \_\_\_\_\_

**INSTRUCTIONS: Answer Question ONE and any other TWO questions**

## **QUESTION ONE (COMPULSORY) (30MARKS)**

- a) Discuss the auditory system using specific examples. (3marks)
- b) Explain the importance of wax in the ear canal (4marks)
- c) Discuss acoustic feedback of a hearing aid (2marks)
- d) Explain the function of a ear mould in a hearing aid. (4marks)
- e) Identify four sources of sound that can destruct learning on your school. (2marks)
- f) Explain the function of a ear mould in a hearing aid. (4marks)
- g) Identify four sources of sound that can destruct learning on your school. (2marks)
- h) Explain the main function of a microphone in a hearing aid (5marks)
- i) Describe the role of audiology in human growth and development. (4marks)

## **QUESTION TWO (20MARKS)**

Explain how a cochlea implant functions giving specific significance to a hearing- impaired learner.

## **QUESTION THREE (20MARKS)**

Discuss eight types of individual hearing aids giving specific examples.

## **QUESTION FOUR (20MARKS)**

Discuss eight types of individual hearing aids giving specific examples.

## **QUESTION FIVE (20MARKS)**

Discuss how conduction of sound takes place through the ear using specific illustration.