

LAIKIPIA



UNIVERSITY

# UNIVERSITY EXAMINATIONS

**1<sup>ST</sup> SEMESTER 2025/2026 ACADEMIC YEAR**

## **EXAMINATIONS FOR THE POSTGRADUATE DIPLOMA IN EDUCATION**

**PGDE 713: EDUCATIONAL TECHNOLOGY**

***STREAM: R***

***TIME: 2 HRS***

***DAY: THURSDAY (11.30-13.30)***

***DATE: 29/01/2026***

**THIS QUESTION PAPER CONSISTS OF THREE (3 PAGES)**

**PLEASE DO NOT OPEN UNTIL THE INVIGILATOR SAYS SO.**

**INSTRUCTIONS:**

Answer Question ONE (Compulsory) and any other TWO questions.

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

- a) Define the following key terms used in educational technology:
- i. Instructional media **(1 mark)**
  - ii. Learning Resource Centre (LRC) **(1 mark)**
- b) Identify three characteristics of effective communication in classroom teaching. **(3 marks)**
- c) Discuss two barriers to effective classroom communication and suggest one remedy for each. **(4 marks)**
- d) State four factors to consider when selecting instructional media for teaching and learning. **(4 marks)**
- e) Draw and label the communication cycle and explain its key elements. **(5 marks)**
- f) Explain two audio-visual instructional formats used in teaching. For each, give one advantage and one disadvantage. **(4 marks)**
- g) Explain one role of feedback in instructional communication and describe two ways teachers can provide effective feedback in the classroom. **(3 marks)**
- h) Explain the meaning of transactional communication in the classroom and discuss two ways it enhances teaching and learning. **(3 marks)**
- i) Define the term multimedia system as used in educational technology and give one example of its use in teaching. **(2 marks)**

**QUESTION TWO (15 MARKS)**

- a) List the six sequential steps involved in systematic planning for the use of instructional media and explain the purpose of each step in relation to classroom instruction. **(9 marks)**
- b) State three principles of media utilization. **(3 marks)**
- c) Explain briefly three merits of the ASSURE model. **(3 marks)**

**QUESTION THREE (15 MARKS)**

Instructional materials play a vital role in facilitating understanding and learner engagement. Explain three merits and two demerits of using each of the following instructional materials during classroom instruction:

- a) Realia (5 marks)
- b) Specimens (5 marks)
- c) Models (5 marks)

**QUESTION FOUR (15 MARKS)**

A Learning Resource Centre (LRC) is central to enhancing teaching and learning in schools.

- (a) Describe three distinct types of Learning Resource Centres in Kenya, highlighting their primary focus and target users. (6 marks)
- (b) Explain three key ways in which an LRC supports teachers and learners in achieving effective learning outcomes. (6 marks)
- (c) Describe three strategies teachers can adopt to integrate community-based resources into classroom teaching, applying the “school-to-community” approach. (3 marks)

**QUESTION FIVE (15 MARKS)**

- a) Explain two models of communication used in education and discuss their relevance in classroom instruction. (5 marks)
- b) Discuss five factors that affect learners’ field of experience and explain how each factor influences teaching and learning. (10 marks)