

CHUKA



UNIVERSITY

**UNIVERSITY EXAMINATIONS
EXAMINATION FOR THE AWARD OF BACHELOR OF EDUCATION ARTS
PRIMARY OPTION**

PECI 121 : INTRODUCTION TO BASIC MATHEMATICS CONCEPTS

STREAMS: BED ARTS PRY PT

TIME: 2 HOURS

DAY/DATE: THURSDAY 07/08/2025

2.30 P.M. – 4.30 P.M

INSTRUCTION

- **ANSWER QUESTION ONE AND ANY OTHER TWO.**
- **DO NOT WRITE ON THE QUESTION PAPER.**

QUESTION ONE. (30 MARKS)

- Discuss six number systems that are applied in a mathematics lesson with the help of examples (12 Marks)
- Discuss four categories in which mathematical content can be separated (8 Marks)
- Discuss the role of a teacher in a mathematics lesson (10 Marks)

QUESTION TWO. (20 MARKS)

- Discuss six objectives of teaching mathematics at primary school level (12 Marks)
- Discuss four types of figures based on dimensions (8 Marks)

QUESTION THREE. (20 MARKS)

- Explain five pre number activities that nature the spatial reasoning, logical deductions and quantitative reasoning skills (10 Marks)
- Explain how a teacher should illustrate teaching sequence corresponding to instructional events in Robert Gagnes theory for an objective, recognize an equilateral triangle (10 Marks)

QUESTION FOUR. (20 MARKS)

- a) Discuss six basic symbols used in mathematics highlighting with examples how they are applied (12Marks)
 - b) Discuss four strategies for teaching mathematics (8 Marks)
-