

Paro College of Education  
Royal University of Bhutan  
Spring Semester Examination 2021

**Module:** EAS202 Supporting Mathematical Thinking

**Programme:** Diploma in ECCD

**Level:** II

**Writing Time:** 2 hours

**Full mark:** 70

---

**DIRECTION:** *There are **nine** questions in this exam paper. Answer only **seven** questions. All questions carry equal marks. Intended marks for all the questions and sub-questions are given in brackets alongside.*

---

**(7 x 10 = 70 marks)**

**Question 1**

Design an appropriate activity to support young children at your ECCD centre to develop the concepts and skills of some of the basic measurement aspects such as *length, time, area, volume, mass, and capacity*. [10]

**Question 2**

Explain using relevant examples how your use of language with children at the ECCD centre play an important role in the development of young children's mathematical language and understanding. [10]

**Question 3**

- a. Describe briefly how children at your play centre engage meaningfully in geometrical experiences in the various play areas. [5]
- b. Explain your views on the use of ICT in the ECCD program. Cite relevant instances and/or examples from your own experience or of others'. [5]

**Question 4**

Explain each of the five counting principles briefly with suitable examples. [10]

**Question 5**

Based on the following pre-number ideas describe a short activity each in context of early years mathematical learning experiences at your ECCD centre. [4 x 2.5 = 10]

- i. Matching
- ii. Sorting
- iii. Comparing
- iv. Ordering

**Question 6**

Give an account of how the different play areas at your ECCD centre cater to developing mathematical skills and concepts for the young children. [10]

**Question 7**

- a. Write an example sentence of everyday events that describe each of the following terms. [5]
- i. Unlikely
  - ii. Always
  - iii. Never
  - iv. Even Chance
  - v. Likely
- b. Describe about your knowledge, skills and competency in dealing with the mathematical experiences that you provide to support the children at the ECCD centre. [5]

**Question 8**

- a. Explain briefly how you support young children at your centre with respect to the development of pattern concept and skills. [5]
- b. Describe the continuum of chance/probability using all the common terms using illustrations/diagrams. [5]

**Question 9**

Describe how you either used or plan to use the family connections with respect to supporting young children's development of mathematical knowledge and skills at your centre. [10]