Avinashilingam Institute for Home Science and Higher Education for Women

(Deemed to be University Estd. u/s 3 of UGC Act 1956, Category A by MHRD)
Re-accredited with 'A++'Grade by NAAC. Recognised by UGC Under Section 12B
Coimbatore - 641 043, Tamil Nadu, India

Continuous Internal Assessment Test I –February 2025

SEMESTER- II

Class: I B Ed | Max. Marks: **60** | Time: **2 Hrs**

23BEDP12 - Methods and Techniques of Teaching Physical Science

Course outcomes

CO1 Apply the micro teaching skills in their teaching sessions
CO2 Investigate the distinctive characteristics of various instructional methods suitable for teaching physical science
CO3 Apply appropriate techniques and methods for teaching varied context and content of physical science
CO4 Understand the different approaches in planning for instruction
CO5 Design different individualised instruction modules

PART – A

Choose the correct answer **6 x 1 = 6**

1. What is the typical duration of a lesson in a micro-teaching session? CO1K1
   a. 2-3 hours b. 60-90 minutes c. 10-20 minutes d. 30-45 minutes

2. Who provides the feedback after a micro-teaching session? CO1K1
   a. The students in the class
   b. A school principal
   c. Peer teachers, mentors, or supervisors
   d. Only the teacher themselves

3. Which of the following is an example of a student-centered teaching method? CO2K1
   a. Demonstration Method
   b. Problem-Based Learning
   c. Drills and Repetitions
   d. Lecture Method

4. Which of the following best describes the role of the teacher in the Heuristic Method? CO2K1
   a. The teacher provides direct instructions and explanations
   b. The teacher acts as a facilitator and guide
   c. The teacher evaluates students' written work
   d. The teacher assesses the students' memorization skills

5. "Brainstorming" is a technique used primarily for: CO3K2
   a. Generating a wide range of ideas in a group setting
   b. Conducting detailed research and writing reports
   c. Creating formal presentations for an audience
   d. Memorizing key facts and formulas

6. In teaching Physical Science, the use of models and simulations is primarily aimed at: CO3K2
   a. Helping students memorize formulas
   b. Providing real-world applications of scientific concepts
   c. Encouraging students to memorize facts
   d. Limiting student involvement in learning

PART – B

Answer ALL questions **3 x 6= 18**

Each answer should not exceed 200 words

7. a. What is microteaching, and how does the microteaching cycle support the improvement of teaching skills? CO1K4

(OR)

7. b. How does the skill of stimulus variation enhance classroom engagement and improve student learning? CO1K4

8. a. What are the benefits and challenges of using student-centered methods compared to traditional teacher-centered approaches? CO2K5

(OR)

8.	b.	What are the advantages of using the textbook method in terms of structure and consistency in teaching?	CO2K4
9.	a.	What role does collaborative learning play in teaching physical science, and how can it be effectively incorporated into classroom activities?	CO3K5
		(OR)	
9.	b.	What role do student presentations play in a symposium, and how can they enhance learning and critical thinking skills?	CO3K5

PART – C

Answer ALL questions **3 x 12 = 36**

Answer should not exceed 800 words

10.	a.	Define microteaching and explain its importance in teacher training.	CO1K4
		(OR)	
10.	b.	How can microteaching and its phases be effectively utilized to enhance teaching skills and improve the overall learning experience?	CO1K5
11.	a.	How do demonstration techniques in physical science teaching help students visualize and grasp abstract scientific principles?	CO2K5
		(OR)	
11.	b.	How do teacher-centered and student-centered methods differ in terms of their approach to teaching, student engagement, and classroom dynamics?	CO2K6
12.	a.	What are the benefits of using real-world applications and examples in teaching physical science, and how can teachers incorporate them into lessons?	CO3K6
		(OR)	
12.	b.	What are some effective techniques for teaching physical science that encourage hands-on learning and foster student curiosity?	CO3K5

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