



NATIONAL UNIVERSITY OF SCIENCE AND TECHNOLOGY
FACULTY OF SCIENCE AND TECHNOLOGY EDUCATION
DEPARTMENT OF ART, DESIGN AND TECHNOLOGY EDUCATION
PDT 6122 DESIGN MATERIALS AND TECHNOLOGIES

Examination Paper

November 2024

This examination paper consists of 2 pages

Time Allowed: 3 hours
Total Marks: 100
Special requirements: None
Examiner's Name: Manokore. K (Mr)

INSTRUCTIONS

1. Answer question **ONE** and any **THREE** questions.
2. All questions carry equal marks.
3. Begin each question on a fresh page and put all parts of the same question together.

MARK ALLOCATION

QUESTION	MARKS
1.	25
2.	25
3.	25
4.	25
5.	25
6.	25
TOTAL	100

QUESTION 1

Evaluate how properties of materials impact product design decisions.

[25 marks]

QUESTION 2

Justify the use of composite materials in Art, Design and Technology.

[25 marks]

QUESTION 3

Discuss the principles and application of green design concept in your area of specialisation.

[25 marks]

QUESTION 4

Examine three key factors to consider when selecting appropriate technology for product design.

[25 marks]

QUESTION 5

Assess the significance of polymers in product design, considering their environmental implications.

[25 marks]

QUESTION 6

Critique the importance of experiential and performance qualities of materials in Art, Design and Technology.

[25 marks]

END OF EXAMINATION