

## ADMISSION NUMBER

## **School of Biomedical Science**

Bachelor of Science in Clinical Nutrition and Dietetics Mid Term Examination - Nov 2023

**Duration : 90 Minutes Max Marks : 50** 

## Sem I - Q1UF104C - Molecular Biology

General Instructions
Answer to the specific question asked
Draw neat, labelled diagrams wherever necessary
Approved data hand books are allowed subject to verification by the Invigilator

1)	How will you distinguish between a nucleotide and a nucleoside?	K2 (2)
2)	What do you mean by linking number and in what conditions, it doesn't change?	K1 (3)
3)	Identify the important roles of telomeres.	K2 (4)
4)	Explain the different structures of DNA that are found in nature.	K2 (6)
5)	Describe the structure of nucleosome.	K3 (6)
6)	Inspect the importance of telomerase enzyme, while explaining itsmechanism of action.	K3 (9)
7)	Elaborate the meaning of histone code and its importance in the condensation and decondensation of the chromosomes.	K4 (8)
8)	Enlist the states in which an interphase chromatin exists. Explain the mechanism of condensation of chromatin.	K4 (12)
OR		
	Elaborate each of the three types of bacterial DNA polymerases.	K4 (12)