

Roll No.

Total No. of Pages : 02

Total No. of Questions : 09

**B.Sc. (MLS) (Sem.-4)**  
**CLINICAL BIOCHEMISTRY-I**

**Subject Code : BMLS-405**

**M.Code : 48120**

**Date of Examination : 11-07-22**

**Time : 3 Hrs.**

**Max. Marks : 60**

**INSTRUCTION TO CANDIDATES :**

1. **SECTION-A** is **COMPULSORY** consisting of **TEN** questions carrying **TWO** marks each.
2. **SECTION-B** contains **FIVE** questions carrying **FIVE** marks each and students has to attempt any **FOUR** questions.
3. **SECTION-C** contains **THREE** questions carrying **TEN** marks each and students has to attempt any **TWO** questions.

**SECTION-A**

**1) Answer briefly :**

- a) What is the basic principle of disposal of lab wastes?
- b) What is sandwich ELISA?
- c) Explain the terms precision and sensitivity.
- d) What is the role of sodium in our body?
- e) How mean is different from mode?
- f) What is esterified cholesterol?
- g) What are essential factors for a standardized lab?
- h) Which is the best test to check renal function?
- i) What are the different precautionary measures against fire?
- j) By which process uric acid is produced in our body?

## SECTION-B

- 2) Explain briefly hazards and safety measures in clinical biochemistry lab.
- 3) Describe the principle and method of determination of creatinine in a blood sample. What is its normal value?
- 4) What are radioactive isotopes? List some of them with their application. Discuss RIA in detail.
- 5) Write short notes on standard deviation.
- 6) Write a short note on laboratory organization and maintenance of records.

## SECTION-C

- 7) Discuss various methods for the estimation of bilirubin in a blood sample. Explain the significance of direct and indirect bilirubin for the diagnosis.
- 8) What is quality control and quality assurance? Describe in detail how internal and external quality control is helpful in achieving quality.
- 9) Describe in detail the principle and procedure for determining the level of potassium in a clinical sample.

**NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.**