

**Total No. of Pages : 02**

**B.Sc.(MLS) (2014 to 2017) (Sem.-3)**

**Subject Code : BMLS-305**

**M.Code : 48110**

**Max. Marks : 60**

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 have to attempt any **FOUR** questions.
3. **SECTION-C** contains **THREE** questions carrying **TEN** marks each and students have to attempt any **TWO** questions.

## SECTION-A

**1) Answer briefly :**

- Give applications of column chromatography.
- What is a standard graph?
- What is monochromatic light?
- Give applications of agarose gel electrophoresis.
- List some limitations of thin layer chromatography.
- What is a cation?
- Define Excited State of an atom.
- Explain the term absorbance.
- What is the full form of SDS-PAGE?
- What is mobile phase in chromatography?

### SECTION-B

- 2) What is the role of gas chromatography in a biochemistry lab? What are its limitations?
- 3) Discuss the factors affecting migration of charged particles during electrophoresis.
- 4) Write a short note on cation and anion exchangers.
- 5) Describe the principle, method and application of affinity chromatography.
- 6) What is native PAGE and what are its applications?

### SECTION-C

- 7) Give the principle, instrumentation and applications of paper electrophoresis.
- 8) Explain the principle and working of a spectrophotometer. List some of its merits.
- 9) What are different parts of a flame emission spectroscope? Describe the principle and working of this instrument.

**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.**