

This question paper contains 2 printed pages]

NY—116—2023

FACULTY OF SCIENCE

M.Sc. (First Year) (Second Semester) EXAMINATION

NOVEMBER/DECEMBER, 2023

(CBCS/New Pattern)

BIOTECHNOLOGY

Paper BT-VI

(Immunotechnology)

(Friday, 8-12-2023)

Time : 10.00 a.m. to 1.00 p.m.

Time—Three Hours

Maximum Marks—75

N.B. :— (i) Attempt all questions.

(ii) All questions carry equal marks.

(iii) Represent your answers with well labelled diagrams.

1. Define lymphoid organs. Describe in detail structure and functions of primary and secondary lymphoid organs. 15

Or

Describe in detail properties and biological roles of different classes of Antibody.

2. Describe in detail mechanism of degranulation of mast cells. 15

P.T.O.

WT

(2)

NY—116—2023

Or

Describe in detail classical complement activation pathway.

3. Describe in detail organ specific autoimmune diseases and its treatments. 15

Or

Define graft. Describe in detail mechanism of graft rejection.

4. Describe in detail secondary immunodeficiency disease HIV. 15

Or

Write notes on :

- (a) Western blotting
- (b) Flow cytometry.
5. Write notes on any *three* : 3×5=15
- (a) Lymphocytes
- (b) Alternative pathway
- (c) SLE
- (d) Agglutination reactions
- (e) Vaccines.

NY—116—2023

2