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(20516)

Roll No. ....

(2)

B. Sc. (Micro)-III

**3504**

**B. Sc. (Micro) Examination, May 2016**

**Immunology**

(B-301)

*Time : Three Hours*

*[Maximum Marks : 50*

*Note : Attempt any five questions. All questions carry equal marks.*

1. Write short notes on any two of the following:  $5 \times 2 = 10$

- (i) Autoimmune disease
- (ii) Rheumatoid Arthritis
- (iii) Hashimoto's Thyroiditis.

2. What are Immunoglobulins? Draw diagram and detailed account of antibody IgG. 10

3. What is the difference between cell mediated and humoral immunity? 10

4. Describe the types of immunity and what is non-specific defence mechanism. 10

5. What is monoclonal antibodies? Write a detailed account of production of monoclonal antibodies. 10

6. Write short notes on any two of the following:  $5 \times 2 = 10$

- (ii) ELISA
- (iii) Immunodiffusion.

(3)

7. Write an essay upon antigen-antibody reaction. 10
8. What is Vaccination ? How many types of vaccines are found of different generations? 10