

Microbiology & Immunology:
Quiz 1

Question 1 (1 point)

A serological reaction is considered as:

1. *Passive immunity only*
 2. *B-lymphocytes making immunoglobulin*
 3. *An observable antigen-antibody reaction*
- A. 2 and 3 only
B. 1 only
C. 1 and 2 only
D. 3 only
E. 2 only

Question 2 (1 point)

A bacterial enzyme becomes resistant to an antibiotic. This is an example of:

- A. Combined active-passive immunity
B. Alteration of drug target
C. Humoral immune response
D. Cell-mediated immune response
E. Inactivation of the antibiotic

Question 3 (1 point)

Which of the following factors are helpful in the prevention of microbial growth on the skin?

1. *High pH between 8 and 10*
 2. *Dryness of the skin*
 3. *Inhibitory substances*
- A. 3 only
B. 2 only
C. 2 and 3 only
D. 1 and 2 only
E. 1 only

Question 4 (1 point)

The immune response best suited for an intracellular pathogen involves:

- A. Cell-mediated responses
B. Avoidance of active immunization strategies
C. Innate responses
D. Humoral responses
E. Passive immunization

Question 5 (1 point)

Resident flora can be present in the following location in the human body:

- A. Female genital tract
B. Stomach
C. Inside the eye
D. Cerebral spinal fluid
E. Blood

Question 6 (1 point)

Specific immunity includes which of the following:

- A. Skin
- B. Acid pH of the stomach
- C. Mucous membranes
- D. IgA production**
- E. Tears from the eye when viewing a sad movie

Question 7 (1 point)

Antigens are:

- A. Compounds made of carbohydrates only and trigger the production of antibodies
- B. Bacteria only triggering the production of antibodies
- C. Substances capable of inducing a specific immune response**
- D. Compounds made of proteins only and trigger production of antibodies
- E. Viruses only triggering the production of antibodies

Question 8 (1 point)

Antibodies are produced by:

- A. T-helper lymphocytes of class 1
- B. Complement proteins
- C. T-helper lymphocytes of class 2
- D. B lymphocytes**
- E. Antigen presenting cells (APCs)

Question 9 (1 point)

Exotoxins are characterized as:

- A. Being secreted by living bacteria**
- B. Only being produced by Gram-positive bacteria
- C. Being released when the outer cell wall of Gram-negative bacteria are destroyed
- D. Being thermostable
- E. Broad spectrum activity on many receptors

Question 10 (3 point)

List the three major mechanism(s) of resistance to an antibiotic by a bacterium (3 points).

- 1. Alteration of drug target**
- 2. Production of inactivating enzymes**
- 3. Decreased uptake of antibiotic**