

Fourth Semester Online Examination 2020
M.Sc. Zoology
Paper – II
Animal Physiology

Max Marks 80

Part A and B of each question in each unit consist of very short answer type questions which are to be answered in one or two sentences. **Part C** (Short answer type) of each question should be answered in **200-250** words. **Part D** (Long answer type) of each question should be answered within the word limit **400-450**.

UNIT-I

- Q.1 A. Why Blood group **O negative** is considered as universal donor? (2)
B. What is double circulation? (2)
C. Write note on Baroreceptors. (4)

OR

Write note on Anemia.

- D. Write Composition and functions of blood in brief. (12)

OR

What is Lymph? Describe lymphatic circulation.

UNIT-II

- Q.2. A. Write name of six structures that form Airways in Respiratory system. (2)
B. Write four differences between Innate and Aquired Immunity. (2)
C. Describe the Physical barriers in short that forms Innate Immunity. (4)

OR

How Respiration is controled by Chemicals.

- D. Describe the transportation of O₂ and CO₂ gases. (12)

OR

Give a account on Immunoglobulin.

UNIT –III

- Q.3. A. Define acidosis. (2)
B. Define Micturition. (2)
C. Describe RAAS (4)

OR

Write note on Cystometrogram.

- D. Explain the mechanism of Urine formation with suitable diagrams. (12)

OR

Describe Bioluminescence with its chemical basis and significance

UNIT-IV

- Q.4. A. Write the difference between Membrane potential and Action potential. (2)
B. Write any four differences between Striated and Non striated muscle. (2)
C. Write a brief note on structure of Neuron. (4)

OR

Explain Muscle fatigue

D. Describe the Sliding theory of Muscle contraction.

(12)

OR

Describe the Nerve impulse conduction under following heads -

- (a) Change in Membrane potential
- (b) Synaptic transmission