

Roll No: _____

Enrollment No: _____

PARUL UNIVERSITY

Faculty of Physiotherapy

1st Year BPT first Internal Examination 2016-17

Year: I

Date: 24.01.2017

Subject Code: 07101102

Time: 3 Hour

Subject Name: HUMAN PHYSIOLOGY

Total Marks: 70

Instructions:

1. All questions are mandatory
2. Figures to the right indicate full marks.
3. Draw Diagram wherever necessary.
4. Write separate sections on separate answer sheets.

SECTION- A

Q.1 Describe in detail the mechanism of passive transport of substances through the cell membrane. [15]

OR

Q.1 Define Erythropoiesis. Describe in detail the different stages of erythropoiesis. Describe factors necessary for erythropoiesis. [15]

Q.2 Write Short Notes (3 out of 4) (5 Marks each) [15]

(a) Oedema

(b) Simple muscle curve

(c) Phagocytosis

(d) Homeostasis

Q.3 Multiple Choice Question (5 out of 5) (1 Marks each) [5]

(1) The power house of cell is

a. Centriole

b. Centrosome

c. Lysosomes

d. Mitochondria

(2) Life span of R.B.C is

a. 100 days

b. 102 days

c. 120 days

d. 135 days

(3) Increase in RBC count is called

a. Anemia

b. Leukocytosis

c. Polycythemia

d. Leukemia

(4) Resting membrane potential in a motor nerve is

a. -90 mv

b. -70 mv

c. 70 mv

d. 90 mv

- (5) The neurotransmitter at neuromuscular junction is
- Acetylcholine
 - Epinephrine
 - Dopamine
 - GABA

SECTION- B

Q.4 What is Anemia? Describe the different type of Anemia in detail with suitable examples. [15]

OR

Q.4 Describe the structure of neuromuscular junction with the help of a diagram & explain the mechanism of transmission of nerve impulse across it. [15]

Q.5 Write Short Notes (3 out of 4) (5 Marks each) [15]

- Functions of WBC
- Functions of skeletal muscles
- Osmosis
- Plasma proteins

Q.6 Multiple Choice Question (5 out of 5) (1 Marks each) [5]

- (1) Structural and functional unit of muscle is
- Sarcomere
 - Sarcotubular system
 - Sarcoplasmic retinaculum
 - Sarcolemma
- (2) Bleeding time is prolonged in
- Fibrinogenemia
 - Hemophilia
 - Chrismal disease
 - Purpura
- (3) Individual with O blood group has
- A antigen
 - B antigen
 - Both
 - None
- (4) The chief component of cell membrane is
- Phospholipids
 - Proteins
 - Cholesterol
 - Carbohydrate
- (5) The number of Lipid layer present in the cell membrane is
- One
 - Two
 - Three
 - Four

