

# ZOOLOGY

2019

Time: 1 Hours 45 Minutes

Marks: 36

## SECTION 'B' (SHORT-ANSWER QUESTIONS)(22)

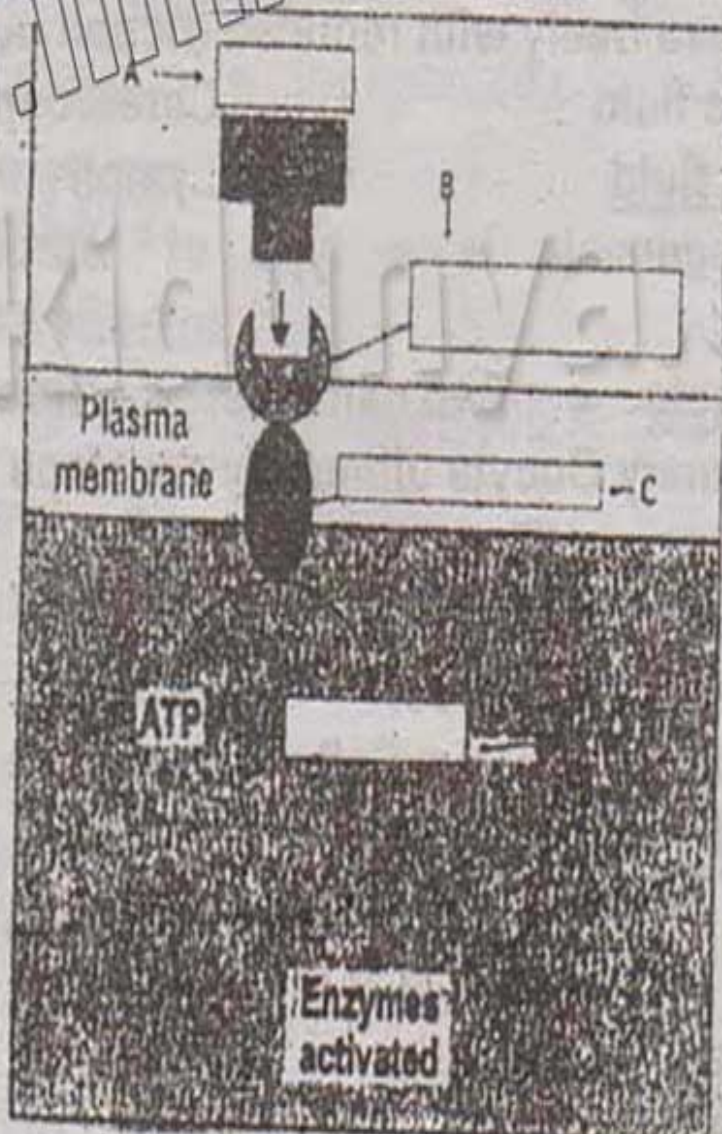
NOTE: Answer 11 questions in all. Select six questions from Reasoning questions and five from Non-Reasoning questions.

### REASONING QUESTIONS:

- 2.(i) How does Osmoregulation take place in Trout fish?
- (ii) Why do skeletal muscles show fatigue after heavy exercise?
- (iii) How does Abnormal development take place in man?
- (iv) Why is Archaeopteryx considered a link between Raptiles and Birds?
- (v) How is Ozone layer being depleted?
- (vi) Why is DNA fingerprinting performed?
- (vii) Why are identical twins exactly similar while Fraternal twins are dissimilar?
- (viii) Why is Nervous co-ordination called the quickest way of communication within the body?
- (ix) How does pancreas regulate the amount of blood sugar?

### NON-REASONING QUESTIONS:

- (x) What are Vestigial organs? Write their examples.
- (xi) Write a note on Smooth muscles or Cardiac muscles.
- (xii) Write a note on Lithotripsy.
- (xiii) Define Receptors. Classify them with examples on the basis of stimuli.
- (xiv) Label the marked parts in the given diagram:



- (xv) State the significance of Genetically engineered bacteria
- (xvi) What are the three main causes of Skeletal deformities? Give one example of each with symptoms.
- (xvii) Draw labeled diagrams of different stages of Spermatogenesis or Oogenesis.

## SECTION 'C' (DETAILED-ANSWER QUESTIONS)

NOTE: Answer 2 questions from this section(14)

3. Explain the Regulatory functions of the human Kidney and draw a labeled diagram of nephron.

OR Describe the structure and functions of different parts of the human Brain. (Diagram is not required).

4. Describe the mechanism of contraction in Skeletal muscle fibre and draw neat and labeled diagram of contraction and relaxation.

5. Explain the various steps involved in Recombinant DNA technology and draw neat and labeled diagram.

OR Describe with the help of labeled diagram the human Female reproductive system