PAPER -101(ANIMAL DIVERSITY: NON-CHORDATES & CHORDATES)

1. Answer the following questions.

1. A sponge can be distinguished from other animals by the presence of

- a) Hollow body
- b) coelenteron
- c) choanocytes
- d) dermal papillae

2. Animal of phylum Porifera are characterised by

- a) Diploblastic organisation
- b) canal system
- c) coelom
- d) coelenteron
- 3. Larva of sponge is known as
- a) planula larva
- b) trochophore larva
- c) glochidium larva
- d) amphiblastula larva
- 4. Gemmules are helpful in
- a) digestion
- b) sexual reproduction
- c) Secretion of spicules
- d) Survival in drought
- 5. Most of the sponges are
- a) solitary
- b) colonial
- c) fresh water forms
- d) cold water inhabitants
- 6. Choanocytes in sponges are present
- a) on the external body surface
- b) line the gastric cavity
- c) in the mesodermal layer
- d) located between the outer and inner layers
- 7. Sycon belong to the class
- a) Calcarea
- b) porifera
- c) Desmospongia
- d) Hexactinellida
- 8. Bath sponge belongs to the class
- a) porifera
- b) Desmospongia

[1 mark]

c) Hexactinellida

- d) Calcarea
- 9. Parazoa includes
- a) Cnidaria
- b) Acidaria
- c) Porifera
- d) None of these

10. Most common method of reproduction in sponges is

- a) binary fission
- b) budding
- c) multiple fission
- d) sexual reproduction
- 11. Skeleton of sponges is produced by
- a) Pinacocytes
- b) thescocytes
- c) choanocytes
- d) sclerocytes
- 12. The only fresh water species of sponges is
- a) Scypha
- b) Euspongia
- c) Spongilla
- d) Oscarella
- 13. Venus's flower basket is a
- a) Sea anemone resembling a flower basket
- b) sponge resembling a flower basket
- c) glass rope sponge
- d) ornamental mollusc
- 14. Common <u>bath sponge</u> is
- a) Euplectella
- b) Spongilla
- c) Syon
- d) Euspongia
- 15. Digestion in sponges is
- a) intracellular
- b) intercellular
- c) both a and b
- d) extracellular

Answers:

1- c	2- b	3-d	4-d	5-b
6-b	7-a	8-b	9-c	10-b
11-d	12-с	13-b	14-d	15-a

2.Answer the following questions within 2-3 sentences.

[1.5 mark]

- 1. Name the disease caused by *Entamoeba histolytica*. Also mention the mode of its transmission.
- 2. Give the symptoms of leishmaniasis.
- 3. Name some species of Plasmodium that causes malaria.
- 4. Name the protozoan that causes diarrhoea. Also state the mode of infection.
- 5. What is canal system in sponges?
- 6. Give the course of water current in asconoid type canal system .
- 7. Name different type of canal system found in sponges along with examples.
- 8. What is coral reef?
- 9. What is trimorphism in coelenterate ?
- 10.Define dimorphism giving suitable examples.
- 11. Write short note on polyp and medusa .
- 12.Describe briefly about Taeniasis.
- 13. Give the significance of metamerism in annelids.
- 14. What is ommatidia?
- 15.Define torsion in gastropoda.
- 16. What is water vascular system in echinoderms ?
- 17. Give a brief account on reproduction in echinoderms.
- 18.Mention 3 subphyla of protochordata.
- 19.Name accessory respiratory organs in fishes.
- 20. What is photophore ?
- 21. What are characteristics of mammalian dentition.
- 22.Mention general characters of Prototheria.
- 23.State some features of metatheria.
- 24.Mention flight adaptations in birds.
- 25. Why do birds have pneumatic bones?

3. Answer the following questions within 75-100 words.

[2 marks]

- 1. Give the symptoms of Amoebiasis.
- 2. Write a short note on trypanosomasis.
- 3. Give some measures for prevention and control of protozoan diseases.
- 4. Name some protozoan diseases.
- 5. What is the significance of canal system in sponges.
- 6. Give the course of water current in syconoid type canal system.

- 7. Give the course of water current in lueconoid type canal system.
- 8. Give the significance of coral reef.
- 9. What are the different types of coral reefs?
- 10. What is polymorphism in coelenterata?
- 11. What is the importance of polymorphism in caelenterata?
- 12. What are gastrozooids and gonozooids ?
- 13.State about the disease caused by helminth parasites Taenia and Ancylostoma ?
- 14. What type of metamerism is found in annelids ?
- 15. What are the characteristics feature of metamerism in annelids ?
- 16. What are the two types of vision in insect eyes?
- 17. What is phototopic and scotopic vision?
- 18. What is significance of torsion in gastropods ?
- 19. What are the function of watervascular system in echinoderms ?
- 20.Name the different larval forms in echinoderms .
- 21. Give some general characters of Urochordata .
- 22. Give a brief account on cyclostome .
- 23. Give some general features of Hemichordata .
- 24. Give some general features of Protochordata.
- 25.Mention some features of Cephalochordata.

4. Answer the following questions within 500 words.

- 1. What are the different protozoan diseases in Man?
- 2. Describe canal system in sponges .
- 3. Write a short note on the formation of coral reef and its significance .
- 4. What do you understand by polymorphism in coelenterates ?
- 5. Give an account on helminth parasites Taenia and Ancylostoma .
- 6. Write about metamerism and segmentation in annelids .
- 7. Give a detailed account on insect vision.
- 8. What is torsion in gastropods?
- 9. Elaborate nervous system in Cephalopods.
- 10. Write about water vascular system in Echinoderms .
- 11.Explain reproduction and development in Echinoderms with evolutionary significance .
- 12. Write the general characters and affinities of Cyclostoma.
- 13. What are the general characters and interrelationship of Protochordates.
- 14. What are accessory respiratory organs in fishes ?
- 15.Write short note on luminous organs in fishes.
- 16. Give an account on origin and ancestry of Amphibia.
- 17.Explain adaptive radiation in reptiles.
- 18. Classify reptiles based on their skull pattern.
- 19. What are the different flight adaptations in birds ?
- 20. Give the general characters of Prototheria & Metatheria .
- 21.Explain the adaptive radiation in Mammals.
- 22. Give a detailed account on dentition in mammals.

[6marks]