| **University of Kerala** | | |
| --- | --- | --- |
| Discipline: Zoology |  | Time: 1 Hour 30Minutes (90Mins.) |
| Course Code: UK1DSCZOO102 |  | Total Marks: 42 |
| CourseTitle: Diversity of Non-Chordates |  |  |
| Type of Course: DSC |  |  |
| Semester:1 |  |  |
| AcademicLevel:100-199 |  |  |
| Total Credit:4, Theory: 3 Credit+ Practical : 1 Credit  (Applicable for 4 Credit Course with 1 Credit Practical Also) |  |  |

Part A .6 Marks. Time: 6 Minutes

Objective Type. 1 Mark Each. Answer All Questions

(Cognitive Level: Remember/Understand)

| **Qn.**  **No.** | **Question** | **Cognitive**  **Level** | **Course**  **Outcome(CO)** |
| --- | --- | --- | --- |
| 1. | Which of the following is a bioluminescent protist?  A) Euglena  B) Paramecium  C) Noctiluca  D) Trichonympha | Remember | 2 |
| 2. | Which of the following is NOT a characteristic of annelids?  A) Metamerism  B) Polyp Stage  C) Setae  D) Parapodia | Understand | 2 |
| 3. | Which phylum includes the pearl oyster and cuttlefish?  A)Annelida  B)Arthropoda  C)Mollusca  D)Echinodermata | Understand | 1 |
| 4. | What is the exoskeleton of arthropods made of?  A) Collagen  B) Chitin  C) Keratin  D) Cellulose | Remember | 4 |
| 5. | The group of animals to which Sycon belongs can be best described as?  A)Multicellular having tissue organization, but not a body cavity  B)Unicellular or acellular  C)Multicellular with a gastrovascular cavity  D)Multicellular without any tissue organization | Understand | 2 |
| 6. | The Five-Kingdom classification was proposed by  A)Earnest Haeckel  B)R H Whittaker  C)T.H.Morgan  D)Carolus Linnaeus | Understand | 1 |

Part B. 8 Marks. Time: 24 Minutes

Short Answer. 2 Marks Each. Answer All Questions

(Cognitive Level: Understand/Apply)

| **Qn.**  **No.** | **Question** | **Cognitive**  **Level** | **Course**  **Outcome(CO)** |
| --- | --- | --- | --- |
| 7. | Match the following   | **A** | **B** | | --- | --- | | a.Euplectella | 1. Heparin | | b. Physalia | 1. Slipper animalcule | | c. Leech | 1. Pneumatophore | | d. Paramecium | 1. Venus Flower Basket | | Understand | 2 |
| 8. | What is Sacculina, and explain how it affects its host? | Apply | 4 |
| 9. | Compare and contrast the body plans of Radiata and Bilateria. | Understand | 1 |
| 10. | Explain how the anatomical features of earthworms, make them suitable for soil aeration and nutrient cycling. | Apply | 2 |

Part C. 28 Marks. Time: 60 Minutes

Long Answer. 7marks each. Answer all 4 Questions, choosing among options within each question.

(Cognitive Level: Understand/Apply/Analyse/Evaluate/Create)

| **Qn.**  **No.** | **Question** | **Cognitive**  **Level** | **Course**  **Outcome(CO)** |
| --- | --- | --- | --- |
| 11. | (a)What advantages do polymorphism provide to cnidarians in terms of reproduction and survival in changing environments?  **OR**  (b)Describe the life cycle of *Taenia solium* and discuss its pathogenicity in man . | Understand | 5 |
| 12. | (a)With neat sketches describe the larval forms of *Penaeus*  **OR**  (b)Explain the economic importance of Molluscs with examples. | Apply | 4 |
| 13. | (a)Explain *Wuchereria bancrofti* and its role in lymphatic filariasis.  **OR**  (b)Briefly describe the classification of Phylum Porifera up to its classes, highlighting key characteristics of each class. | Apply | 3 |
| 14.  . | (a)With suitable diagrams explain the life cycle of*Plasmodium vivax.*  **OR**  (b)Compare and contrast the characteristics of Acoelomata, Pseudocoelomata, and Eucoelomata, focusing on their body cavities. | Understand | 1 |

| **Cognitive Level** | **Marks** | **Percentage** |  | **Course Outcomes** | **Marks** | **Percentage** |
| --- | --- | --- | --- | --- | --- | --- |
| Remember | 2 | 4.76 |  | 1 | 11 | 26.19 |
| Understand | 22 | 52.38 |  | 2 | 7 | 16.66 |
| Apply | 18 | 42.86 |  | 3 | 7 | 16.66 |
|  |  |  |  | 4 | 10 | 23.82 |
|  |  |  |  | 5 | 7 | 16.66 |
| **TOTAL** | **42** | **100** |  | **TOTAL** | **42** | **100** |