QP Code: 22/PT/14/VIIIA

POST-GRADUATE COURSE

Term End Examination — June, 2022/December, 2022

ZOOLOGY

Paper-8A : PARASITOLOGY AND PUBLIC HEALTH

Time : 2 hours] [Full Marks : 50

Weightage of Marks : 80%

Special credit will be given for precise and correct answer. Marks will be deducted for spelling mistakes, untidiness and illegible handwriting. The figures in the margin indicate full marks.

1. Answer *two* questions : $9 \times 2 = 18$

   a) Name the causative organism of PAM. Describe its life-cycle stages and pathogenicity caused by the organism. 1 + 5 + 3

   b) What is Myiasis ? Classify myiasis on the basis of the sites infected. 2 + 7

   c) Describe the ELISA technique. Mention different types of ELISA. State the utility of ELISA in clinical parasitology. 3 + 3 + 3

   d) What is antigenic variation ? State the molecular basis of antigenic variation in African trypanosomes. 2 + 7

2. Answer *three* questions : $6 \times 3 = 18$

   a) Draw and describe the trophozoite and cystic stage of *Giardia intestinalis*. 3 + 3

   b) Give an idea on different viral, bacterial and protozoan diseases and their control measures in live stocks. 3 + 3

   c) Briefly describe the B-cell and T-cell with diagram and mention their functions. 4 + 2

d) What is obligatory myiasis ? Cite two examples. State the role of myiasis in medical and forensic science. 2 + 2 + 2

e) Write a short note on epidemiology of Filariasis.

f) Describe the general morphology of Flea. State its role in transmission of human diseases. 2 + 4

3. Answer *two* questions : 4 × 2 = 8

a) What is bird flue ? State the causative organism, symptoms and control measures of bird flu. 1 + 1 + 2

b) Describe the structure of IgG.

c) Describe the structure and function of NK cells. 2 + 2

d) State the economic importance of parasitic zoonosis.

4. Answer *two* questions : 3 × 2 = 6

a) Define Propagative, cyclopropagative and cyclical vectors. 1 + 1 + 1

b) Describe the histological structure of the thymus gland with suitable diagram. 2 + 1

c) Distinguish between Anthropozoonosis and Zooanthroponosis with suitable examples.

d) Give an idea on the 'Ranikhet' disease and mention its control measures. 2 + 1