Reg. No .....

Name .....

# M. Sc DEGREE END SEMESTER EXAMINATION - OCTOBER 2019 SEMESTER 3 : ZOOLOGY

#### COURSE : 16P3ZOOT09 : ANIMAL PHYSIOLOGY

(For Regular - 2018 Admission and Supplementary - 2016/2017 Admissions)

Time : Three Hours

Max. Marks: 75

### Section A Answer any 8 (2 marks each)

- 1. Mention the role of leptin in adipogenesis.
- 2. Define 'haemopoeisis'.
- 3. Explain the significance of 'Compliance Diagram' of lungs.
- 4. Write a brief note on Peritoneal dialysis.
- 5. Define the term 'neuromodulators' with examples
- 6. In what way does the visual pathway of the rods differ from the cones?
- 7. What are the functions of 'Somatic sensory area I'?
- 8. What do you mean by Synchronous Flight muscle?
- 9. Comment on the role of skin in thermoregulation.
- 10. Comment on Ecdysone.
- 11. What are gonadotropins? Mention their functions
- 12. Mention the role of FSH.

 $(2 \times 8 = 16)$ 

# Section B Answer any 7 (5 marks each)

- 13. Explain the role of hormones in food intake and obesity.
- 14. Elucidate the principle and significance of ECG.
- 15. Distinguish between Acute and Chronic Mountain sickness.
- 16. Differentiate between electrical and chemical transmission.
- 17. Write an explanatory note on the primary sensations of taste.
- 18. Illustrate the structure of a Mysoin molecule. Label the various parts.
- 19. Explain the role of hypothalamus in regulating the body temperature.
- 20. Describe the structure and functions of thyroid hormones.
- 21. Comment on the physiological changes during pregnancy.
- 22. Describe the anatomy of 'Graffian Follicle'.

# Section C Answer any 2 (12 marks each)

- 23. Discuss the mechanics of pulmonary ventilation. Briefly explain the process involved in inspiration and expiration.
- 24. Explain the physiology of Urine formation in humans. What are the regulatory mechanisms involved?
- 25. Give a detailed description of the physiology of taste.
- 26. Write an essay on the mode of action of different chemical classes of hormones.

 $(12 \times 2 = 24)$