

Rajiv Gandhi University of Health Sciences, Karnataka

**II Semester B.O.T Degree Examination – 13-
Nov-2025**

Time: Three Hours

Max. Marks: 100

PHYSIOLOGY – II (OS/RS)

Q.P. CODE: 3416

Your answers should be specific to the questions asked

Draw neat, labeled diagrams wherever necessary

LONG ESSAYS (Answer any Two)

2 x 10 = 20 Marks

1. Describe visual pathway with a labelled diagram. Describe the effects of lesions at various levels in the pathway
2. Describe the steps in the biosynthesis, storage and release of thyroid hormones. Describe the regulation and functions of thyroid hormones. Add a note in hypothyroidism
3. Describe the structure of neuromuscular junctions and the mechanism of transmission of impulse across neuromuscular junction of skeletal muscle

SHORT ESSAYS (Answer any Ten)

10 x 5 = 50 Marks

4. Classification of nerve fibres and their functions
5. Describe the taste pathway and mechanism of taste perception
6. Enumerate the actions of aldosterone. How is its secretion regulated?
7. Describe the actions of estrogen on non pregnant uterus. Name two sources of estrogen
8. Name the hyperglycemic hormones. Explain the mechanism of action of any one of them
9. Composition of semen and its use as a diagnostic tool
10. Describe briefly the functions of middle ear
11. Describe the formation, circulation and functions of CSF. Add a note on hydrocephalus
12. Describe the features and physiological basis of parkinsonism
13. Define isometric and isotonic muscle contractions. Describe the differences between isotonic muscle contractions
14. Acromegaly and its features
15. Explain the sliding filament mechanism of muscle contraction

SHORT ANSWERS (Answer any Ten)

10 x 3 = 30 Marks

16. Accommodation reflex
17. Tests for ovulation
18. What is anosmia? Give one cause
19. Parturition reflex
20. List six secondary sexual characteristics in males
21. Explain the functions of oxytocin
22. List the functions of calcium in the body
23. List any four functions of hypothalamus
24. Refractory period in skeletal muscle
25. Name the ascending tracts and sensation carried by them
26. Electromyogram
27. Define learning and memory
