

Rajiv Gandhi University of Health Sciences, Karnataka
II Year B.Sc. Optometry Degree Examination - 08-May-2025

Time: Three Hours

Max. Marks: 100

VISUAL OPTICS (RS-4)

Q.P. CODE: 3347

Your answers should be specific to the questions asked
Draw neat, labeled diagrams wherever necessary

LONG ESSAYS (Second Question Choice)

2 x 10 = 20 Marks

1. What is accommodation? Explain NPA, range of accommodation and amplitude of accommodation with example. Write a short note measurement of NPA
2. Define convergence. Write a short note on types of convergence. Write a short answer on measurement of NPA

OR

Define and classify astigmatism. Mention clinical features and treatment option available for astigmatism

SHORT ESSAYS (Question No 5 & 10 choice)

10 x 5 = 50 Marks

3. Write on etiology, clinical feature and treatment of convergence insufficiency
4. Name different types of dynamic retinoscopy. Explain MEM
5. List different method of measurement of AC/A ratio. Explain any one with example

OR

Characteristics of retinoscopic reflex

6. Write in details about sign convention
 7. Define different kind of aberration and mention its application
 8. Write a note on theories of color vision
 9. Write the classification of astigmatism based on principal meridian
 10. Write a note on cornea is an optical element of eye
- OR**
- Mention etiology, clinical feature and treatment of hypermetropia
11. Write about different methods of presbyopic correction
 12. Name the test / chart available for pediatric visual acuity assessment as per different age group

SHORT ANSWER

10 x 3 = 30 Marks

13. Mention the significance of padical retinoscopy
14. Mention the significance of convert 6/36 into LogMAR
15. Explain spherical equivalent with example
16. Mention the indication of red and green filter
17. Mention the etiology, clinical feature accommodative excess
18. Enlist the etiology of refractive anomalies
19. Enlist the chart available for measurement of contrast sensitivity
20. Mention the difference between axial and refractive ametropia
21. Explain the signs of aphakia
22. Mention the advantages and disadvantages of phoropter