

BACHELOR OF OPTOMETRY (B. OPTOM)
SEMESTER -II EXAMINATION, JUNE-2026
(BOPT202) HUMAN PHYSIOLOGY -II

[Time allotted: Three Hours]**[Max Marks: 100]****Note:** Read all the instructions carefully

Answer all questions in serial order, Draw suitable diagrams wherever necessary

Q. 1. Objective type questions: (Attempt All)**(10 x 02 = 20)**

(Very short/ Short answer/ MCQ/ One liners/ Fill in the blanks/ True/False)

- a. Define reflex. (CO2)
- b. Where are the visual and auditory areas of brain located? (CO3)
- c. What are the functions of Fovea centralis of eye? (CO3)
- d. Define synapse. (CO2)
- e. Olfactory receptor neurons are located in which part of nasal cavity? (CO3)
- f. The audible range of sound frequency is Hz? (CO3)
- g. The normal intraocular pressure (IOP) is mm of Hg? (CO3)
- h. The normal temperature of the body is? (CO2)
- i. Chronic Kidney Disease leads to anemia. **(True or False)** (CO1)
- j. Undescended testis can lead to infertility. **(True or False)** (CO4)

Q. 2. Short notes/ Short answer type questions (Attempt any Five)**(05 x 04 = 20)**

- a. Functions of testosterone. (CO4)
- b. Visual acuity. (CO3)
- c. Micturition. (CO1)
- d. Photoreceptors. (CO3)
- e. Functions of ovary. (CO4)
- f. Primary taste sensations. (CO3)
- g. Functions of hypothalamus. (CO2)

Q. 3. Structured questions (Attempt any Three)**(03 x 10 = 30)**

- a. Draw a labelled diagram of visual pathway. What are the effects lesions in visual pathway on the field of vision? (5+5) (CO3)
- b. Enumerate the excretory and non-excretory functions of kidney. What are the differences between cortical and juxtamedullary nephrons? (6+4) (CO1)
- c. What are the functions of different parts of the ear? Describe the mechanism of hearing. ? (5+5) (CO3)
- d. Define hormone? Discuss the control of pituitary gland by the hypothalamus? (2+8) (CO5)

Q. 4. Long Answer/ Essay type questions (Attempt any Two)**(02 x 15 = 30)**

- a. Describe the errors of refraction with their corrections with suitable diagrams? (CO3)
- b. Describe the cyclical changes occurring in the uterus and ovary during the menstrual cycle with the help of suitable diagrams? (CO4)
- c. Enumerate the hormones produced by pancreas and what is diabetes mellitus? (CO5)