



## BRAINWARE UNIVERSITY

Term End Examination 2023

Programme – B.Optomety-2019/B.Optomety-2020/B.Optomety-2021

Course Name – Ocular Anatomy

Course Code - BOPTO201

( Semester II )

Full Marks : 60

Time : 2:30 Hours

[The figure in the margin indicates full marks. Candidates are required to give their answers in their own words as far as practicable.]

### Group-A

(Multiple Choice Type Question)

1 x 15=15

1. Choose the correct alternative from the following :

- (i) Volume of the orbital cavity is
- |          |          |
|----------|----------|
| a) 25 ml | b) 30 ml |
| c) 35 ml | d) 40 ml |
- (ii) Lens Placode is developed from
- |                   |                  |
|-------------------|------------------|
| a) Prosencephalon | b) Telencephalon |
| c) Deincephalon   | d) Mesencephalon |
- (iii) Development of optic nerve takes place in \_\_\_\_\_
- |             |              |
|-------------|--------------|
| a) 5th Week | b) 7th Week  |
| c) 9th Week | d) 11th Week |
- (iv) Cornea is developed from
- |                     |                 |
|---------------------|-----------------|
| a) Surface Ectoderm | b) Mesoderm     |
| c) Endoderm         | d) None of them |
- (v) Which wall is the thickest in orbital cavity?
- |             |             |
|-------------|-------------|
| a) Lateral  | b) Medial   |
| c) Superior | d) Inferior |
- (vi) Which one is the orbital muscle?
- |                     |                     |
|---------------------|---------------------|
| a) Muscle of Müller | b) Sphincter Muscle |
| c) Dilator muscle   | d) None of them     |
- (vii) How many bones are present in orbit?
- |      |      |
|------|------|
| a) 5 | b) 6 |
| c) 7 | d) 9 |
- (viii) Major arterial circle of iris is formed by

- a) Long posterior ciliary artery  
c) Both a & b
- (ix) How many vortex vein are present ?  
a) 2  
c) 4
- (x) Radius of curvature of the anterior surface of the cornea is  
a) 6.5 mm  
c) 7.8
- (xi) Corneal thickness in the center is  
a) 0.5-0.6 mm  
c) 0.8-1.2 mm
- (xii) Wing cell is present in \_\_\_\_\_.  
a) Corneal Epithelium  
c) Corneal Endothelium
- (xiii) Keratocytes are found in \_\_\_\_\_.  
a) Corneal Epithelium  
c) Corneal Endothelium
- (xiv) Dua's layer present in between ---  
a) Epithelium and Bowman's layer  
c) Stroma and Descemet's
- (xv) Average axial length of the eye ball is \_\_\_\_\_.  
a) 22 mm  
c) 26 mm
- b) Anterior ciliary artery  
d) None of them
- b) 3  
d) 5
- b) 7.0 mm  
d) 8.6 mm
- b) 0.7-0.8 mm  
d) None of them
- b) Corneal Stroma  
d) None of them
- b) Corneal Stroma  
d) None of them
- b) Descemet's and endothelium  
d) Bowman's and Stroma
- b) 24 mm  
d) None of them

#### Group-B

(Short Answer Type Questions)

3 x 5=15

2. Sketch a label diagram of visual pathway. (3)
3. Write down the many retinal cell types in alphabetical order. (3)
4. Explain each component of the lacrimal system by name. (3)
5. List the many anterior chamber angle structures by name. (3)
6. Discuss briefly various parts of the conjunctiva with a diagram. (3)

OR

Discuss the structure of the ciliary processes with a diagram. (3)

#### Group-C

(Long Answer Type Questions)

5 x 6=30

7. Explain the cornea's nerve supply and the endothelium's microscopic structure. (5)
8. Infer about the origin, insertion, and nerve supply of the particular muscle that helps in extorsion, elevation and abduction. (5)
9. Explain about the Superior rectus muscle's origin, insertion, and nerve supply. (5)
10. Explain the various parts of the visual pathway. (5)
11. Describe how the extraocular muscles are innervated neurologically. (5)
12. Draw a diagram to illustrate the main pathway for drainage of aqueous humor (AH) out of the eye (5)

OR

Discuss various structures of the anterior chamber angle with a diagram. (5)