

Reg. No.:.....

**Second Year B.Sc Optometry Degree Supplementary Examinations
February 2023**

Nutrition, Biochemistry & Pharmacology

(2014 scheme)

Time: 3 hrs

Max marks: 80

- Answer all questions to the point neatly and legibly • Do not leave any blank pages between answers • Indicate the question number correctly for the answer in the margin space
- Answer all parts of a single question together • Leave sufficient space between answers
- Draw table/diagrams/flow charts wherever necessary
- Write Section A and Section B in separate answer books. Do not mix up questions from Section A and Section B

Q.P. Code: 211013

Marks: 40

Section A: Nutrition & Biochemistry

Essay

(10)

1. Discuss in detail the dietary sources, daily requirement and biochemical effects of Vitamin D. Add a note on rickets (1+1+6+2)

Short notes

(3x5=15)

2. Metabolic derangements in Diabetes mellitus
3. Significance of HMP shunt pathway
4. Protein energy malnutrition

Answer briefly

(5x2=10)

5. Essential fatty acids
6. Coenzymes
7. Metabolic acidosis
8. An example for key gluconeogenic enzyme is
9. Van den Bergh test

Fill in the blanks

(5x1=5)

10. The enzyme of electron transport chain inhibited by cyanide is.....
11. An example of sulphur containing aminoacid is.....
12. The glycosaminoglycan that does not contain uronic acid is.....
13. Scurvy is caused due to deficiency of.....
14. The normal blood urea level in humans is.....

(P.T.O)

Section B: Pharmacology

Essay **(10)**

1. Describe the factors affecting permeability of ocular drugs. Add a note on different routes of administration of ocular drugs

Short notes **(3x5=15)**

2. Antiglaucoma drugs
3. Antifungal agents and its ophthalmic uses
4. Non-steroidal anti-inflammatory drugs (NSAIDs)

Answer briefly **(5x2=10)**

5. Antiseptics used in ophthalmology
6. Anticoagulants
7. Therapeutic uses and contraindications of Atropine
8. Frusemide or Furosemide.
9. Antihistamines

Fill in the blanks **(5x1=5)**

10. Name one astringent
11. Fluorescein is used in the diagnosis of.....
12. Name one topical local anesthetic.....
13. One side effect of topical steroid eye drops.....
14. Name one drug for relief of dry eye symptoms.....
