# Rajiv Gandhi University of Health Sciences, Karnataka MBBS Phase - I Degree Examination - 07-Apr-2025

Time: Three Hours Max. Marks: 100 Marks

### ANATOMY - PAPER - I (RS3) Q.P. CODE: 1075

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

LONG ESSAYS 2 x 10 = 20 Marks

- 1. Describe the sulci and gyri on superolateral surface of brain. Add a note on the functional areas on the superolateral surface of brain.
- 2. Describe the mammary gland and add a note on its applied anatomy.

SHORT ESSAYS  $10 \times 5 = 50 \text{ Marks}$ 

- 3. Right atrium of heart
- 4. Microscopic structure of large artery
- 5. Blood supply of scalp.
- 6. Notochord.
- 7. Sub-occipital triangle
- 8. Posterior mediastinum
- 9. Intrinsic muscles of larynx
- 10. Intermuscular spaces around scapula
- 11. Flexor retinaculum of hand
- 12. Ansa cervicalis

SHORT ANSWERS 10 x 3 = 30 Marks

- 13. Fertilization
- 14. Features in the interior of nasopharynx.
- 15. Erb's paralysis
- 16. Major openings of diaphragm
- 17. Wrist drop.
- 18. External jugular vein
- 19. Blood supply of thyroid gland
- 20. Draw a neat labelled diagram of histology of serous salivary gland
- 21. Pericardial sinuses.
- 22. Coracoid process of scapula

# Rajiv Gandhi University of Health Sciences, Karnataka MBBS Phase - I Degree Examination - 09-Apr-2025

Time: Three Hours Max. Marks: 100

### ANATOMY - PAPER - II (RS-3) Q.P. CODE: 1076

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

LONG ESSAYS 2 x 10 = 20 Marks

- 1. Describe the articulating surfaces, relations and movements of hip joint. Add a note on its applied anatomy
- 2. Describe the parts, relations, blood supply and development of Pancreas

SHORT ESSAYS  $10 \times 5 = 50 \text{ Marks}$ 

- 3. Popliteal fossa
- 4. Microscopic structure of Kidney
- 5. Lesser sac
- 6. Sex chromosomes
- 7. Second part of duodenum
- 8. Inferior vena cava
- 9. Extra hepatic Biliary apparatus
- 10. Development of uterus
- 11. Ischiorectal fossa
- 12. Fallopian tube

SHORT ANSWERS 10 x 3 = 30 Marks

- 13. Pouch of Douglas
- 14. Dorsalis pedis artery
- 15. Blood supply of suprarenal gland
- 16. Down's syndrome
- 17. Histology of vas deferens
- 18. Bare area of liver
- 19. Inguinal ligament
- 20. Microscopic structure of appendix
- 21. Derivatives of Mesonephric duct
- 22. Deep peroneal nerve

### Rajiv Gandhi University of Health Sciences, Karnataka MBBS Phase - I Degree Examination - 11-Apr-2025

Time: Three Hours Max. Marks: 100 Marks

PHYSIOLOGY - I (RS3) Q.P. CODE: 1077

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

LONG ESSAYS 2 x 10 = 20 Marks

1. Describe the composition, functions and regulation of gastric juice secretion.

2. Define cardiac cycle. Describe the mechanical events of cardiac cycle.

SHORT ESSAYS  $10 \times 5 = 50 \text{ Marks}$ 

- 3. Cardiovascular changes during muscular exercise
- 4. Describe the phases of deglutition.
- 5. Rh incompatibility
- 6. Classify Hypoxia. Explain any two of them.
- 7. Describe the conducting system of the heart.
- 8. Micturition reflex
- 9. Immunoglobulins
- 10. Artificial respiration
- 11. Intercellular communication
- 12. Intrinsic mechanism of blood coagulation

SHORT ANSWERS 10 x 3 = 30 Marks

- 13. Three special features of coronary circulation
- 14. Herring Breuer reflexes
- 15. Non excretory functions of kidneys
- 16. Define GFR and give its normal value and name factors affecting it.
- 17. Name two anticoagulants. Give their mechanism of action.
- 18. Define Tidal volume and residual volume. Give their normal values.
- 19. List the functions of bile.
- 20. Laboratory classification of Anaemia
- 21. Cyanosis
- 22. Define transport maximum for glucose. Give its normal value.

### Rajiv Gandhi University of Health Sciences, Karnataka MBBS Phase - I Degree Examination - 15-Apr-2025

Time: Three Hours Max. Marks: 100 Marks

PHYSIOLOGY - II (RS3) Q.P. CODE: 1078

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

LONG ESSAYS 2 x 10 = 20 Marks

1. Describe the origin, course, termination and function of corticospinal tract. List two signs of hemiplegia and basis for it.

2. What is normal serum calcium level? Describe the hormonal regulation of serum calcium level. What are the clinical features of tetany?

SHORT ESSAYS 10 x 5 = 50 Marks

- 3. Excitation contraction coupling in skeletal muscle fiber
- 4. Cushing's Syndrome
- 5. Referred pain.
- 6. List the functions of prefrontal lobe
- 7. Organ of corti
- 8. Explain three properties of synapse.
- 9. Explain the refractive errors and their corrections
- 10. Wallerian degeneration
- 11. Describe the phases of menstrual cycle.
- 12. Functions of estrogen.

SHORT ANSWERS 10 x 3 = 30 Marks

- 13. Describe the nerve action potential.
- 14. Mention any three functions of thyroxine.
- 15. What is saltatory conduction? What is its importance?
- 16. Write any three functions of testosterone.
- 17. What are Somatomedins? What are its actions?
- 18. Functions of skin
- 19. List six features of cerebellar disease.
- 20. Primary taste sensations.
- 21. Accommodation reflex
- 22. What is impedance matching?

# Rajiv Gandhi University of Health Sciences, Karnataka MBBS Phase - I Degree Examination - 17-Apr-2025

Time: Three Hours Max. Marks: 50 Marks

#### BIOCHEMISTRY - PAPER I (RS3) Q.P. CODE: 1079

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

(Note: Both QP Codes 1079 and 1080 are to be, answered within total duration of three hours)
(Use separate Answer books for QP Code 1079 & 1080)

LONG ESSAYS 1 x 10 = 10 Marks

1. Define Glycogenesis and Glycogenolysis. Write the reactions of Glycogenesis and Glycogenolysis in the Liver.

SHORT ESSAYS 5 x 5 = 25 Marks

- 2. Formation and utilization of ketone bodies
- 3. What are Isoenzymes? Briefly explain Isoenzymes with examples.
- 4. Describe the secondary structures of Proteins with examples.
- 5. How is Urea synthesized in the body?
- 6. What is Oxidative Phosphorylation? Explain Chemiosmotic theory.

SHORT ANSWERS  $5 \times 3 = 15 \text{ Marks}$ 

- 7. Active transport.
- 8. Write any three tumour markers along with its diagnostic significance.
- 9. What are free radicals? Name any four antioxidants in the body.
- 10. Lactose intolerance.
- 11. Essential fatty acids.

# Rajiv Gandhi University of Health Sciences, Karnataka First Phase MBBS Degree Examination - 17-Apr-2025

Time: Three Hours Max. Marks: 50 Marks

#### BIOCHEMISTRY - PAPER II (RS3) OP Code: 1080

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

(Note: Both QP Codes 1079 and 1080 are to be, answered within total duration of three hours) (Use separate Answer books for QP Code 1079 & 1080)

LONG ESSAYS 1 x 10 = 10 Marks

 Describe the source, RDA, biochemical functions, synthesis and deficiency manifestation of Vitamin D.

SHORT ESSAYS 5 x 5 = 25 Marks

- 2. Name the plasma buffers and role of buffers in maintaining the acid base balance.
- 3. Formation and fate of bilirubin.
- 4. Define Basal Metabolic Rate. Explain the factors affecting BMR.
- 5. What is clearance test? Which is the ideal substance used for determination of Glomerular Filtration Rate and why? Explain.
- 6. Dietary fibre.

SHORT ANSWERS 5 x 3 = 15 Marks

- 7. Applications of Polymerase chain reaction.
- 8. Name four synthetic analogues of nucleotides. Mention their therapeutic importance.
- 9. Name the inhibitors of replication and their clinical importance.
- 10. Name the selenium containing enzyme. What is its clinical importance?
- 11. What you mean by abnormal hemoglobins. Explain briefly. Give examples.