

THE TAMIL NADU DR. M.G.R. MEDICAL UNIVERSITY

[MBBS 0123]

JANUARY 2023

Sub. Code :5056

M.B.B.S. DEGREE EXAMINATION

(For the candidates admitted from the Academic Year 2018-2019)

FIRST YEAR

PAPER VI – BIOCHEMISTRY - II

Q.P. Code: 525056

Time: Three hours

Maximum : 50 Marks

Answer All Questions

I. Essay: **(1 x 10 = 10)**

1. Explain the process of replication in a prokaryotes with suitable diagram. Add a note on the differences between bacterial and Mammalian DNA polymerase.

II. Write notes on: **(5 x 4 = 20)**

1. Disorders of urea cycle.
2. Describe the products derived from tyrosine.
3. Metabolic acidosis.
4. Phase I Detoxification reactions.
5. Write about the factors affecting calcium absorption and add a note on functions of calcium.

III. Short answers on: **(10 x 2 = 20)**

1. Zinc deficiency diseases.
2. Isoelectric pH.
3. Products derived from Methionine.
4. Name the detoxification functions of the liver.
5. Formula for calculating creatinine clearance.
6. Write the normal pH of blood and mention buffers in body fluids.
7. Types of chromatography.
8. Name the enzyme deficient in Lesch Nyhan syndrome and mention two clinical features.
9. Name four hormones that act via intracellular receptors.
10. Any four synthetic nucleotide analogues.
