

**Shree Manibhai Virani and Smt. Navalben Virani Science College (Autonomous). Rajkot**  
Affiliated to Saurashtra University, Rajkot

**SEMESTER END EXAMINATION NOVEMBER – 2017**

**B.Voc. Medical Laboratory & Molecular Diagnostic Technology**

**MLMDT 3.3 – CLINICAL BIOCHEMISTRY**

*Duration of Exam – 2.30 hrs*

*Semester – III*

*Max. Marks – 70*

**Que. 1 Answer the following Questions**

**[20]**

1. What is glycogenolysis?
2. What is diabetic ketoacidosis?
3. Define polyphagia and polydipsia.
4. Write normal range of triglyceride in human blood.
5. What are the functions of cholesterol in the body?
6. What is coronary artery disease?
7. What is homogentisic acid?
8. Define gout.
9. What is Paget disease?
10. Define GFR
11. Write anatomic location of Liver.
12. Define jaundice. Write its types.
13. Enlist the enzymes in heart diseases.
14. Write full form of CPK and write its isoenzymes.
15. Enlist major symptoms of nephropathy.
16. What is natriuretic peptide?
17. What is acidosis? Write its types.
18. Which gland is involved in the regulation of Calcium and phosphorous?
19. Enlist the biochemical tests for Metabolic bone disease?
20. What is the role of ADH in water balance?

**Que. 2 (A) – Answer the following Questions (Any Three)**

**[6]**

1. Enlist the hormones involved in diabetes mellitus
2. Role of LDL in atherosclerosis
3. Write the signs and symptoms of Gout.
4. Enlist clinical manifestation of nephritic syndrome
5. What is dehydration?
6. Give at least two causes of hypocalcemia.

**Que. 2 (B) Answer the following Questions (Any Three)**

**[09]**

1. Write about the complications of diabetes mellitus.
2. Discuss risk factors of gout
3. What are the indications for RFT and classify battery of tests in RFT.
4. Write the role of CPK enzyme in cardiac disease.
5. What are the functions of Magnesium in the body?
6. Write the role of kidney in phosphorous metabolism

**Que. 2 (C) Answer the following Questions (Any Two)**

**[10]**

1. Differentiate between Nephrotic and Nephritic syndrome.
2. How diabetes mellitus can be diagnosed?
3. Write a note on phenyl ketonuria. Discuss its diagnosis.
4. Write a note on rickets and osteoporosis
5. Write in brief about the enzymes used as diagnostic markers

**Que. 3 (A) – Answer the following Questions (Any Three)**

**[06]**

1. Write the difference between diabetes mellitus and diabetes insipidus.
2. Write modifiable risk factors for coronary artery disease.
3. Write the causes of alkaptonuria
4. Enlist types of cirrhosis.
5. Write the significance of SGOT and SGPT
6. What are troponins? Write its significance.

**Que. 3 (B) Answer the following Questions (Any Three)**

**[09]**

1. Write the role of liver in glucose regulation.
2. Write Biochemical basis of atherosclerosis
3. Write a note on Maple syrup urine disease.
4. Write on Bilirubin Metabolism.
5. Brief of isoenzymes of LDH
6. Which mechanisms exist for regulation of acid-base balance?

**Que. 3 (C) Answer the following Questions (Any Two)**

**[10]**

1. Write a note on ischemic heart disease and its diagnosis.
2. Detail Note on proteinuria and its types.
3. Discuss mechanisms of regulation of pH by buffer system
4. Describe in Brief on Hepatitis.
5. Discuss metabolic bone diseases.