

[LS 150]

NOVEMBER 2020
(OCTOBER 2020 SESSION)
M.D. DEGREE EXAMINATION

Sub. Code: 2045

BRANCH XIII – BIOCHEMISTRY

PAPER III – INTERMEDIARY METABOLISM, MACRO AND MICRO
NUTRIENTS AND INBORN ERRORS OF METABOLISM

Q.P. Code: 202045

Time: Three Hours

Maximum: 100 Marks

I. Essay Questions:

(2 x 15 = 30)

1. Discuss in detail the sources, biochemical function, metabolism, recommended dietary allowances, deficiency manifestations and toxicity symptoms of folic acid.
2. Glycogen synthesis and its regulation.

II. Short notes:

(10 x 5 = 50)

1. Classification of enzymes with examples.
2. Functions of Vitamin A
3. Mitochondrial transport systems
4. Metabolic functions of Erythrocytes
5. Glycolytic pathway and its significance.
6. Mechanism of action of anticoagulants
7. Conjugation reactions of Xenobiotics
8. Non – enzymatic antioxidants.
9. Vitamin K cycle and its clinical significance
10. Metabolism of Xenobiotics.

III. Reasoning Out:

(4 x 5 = 20)

1. Role of minerals in membrane transport.
2. Acetyl CoA is the meeting point of major metabolic pathways.
3. Beneficial effects of HDL.
4. Transport functions of Hemoglobin
